A FAILURE OF INITIATIVE

Final Report of the Select Bipartisan Committee to Investigate the Preparation for and Response to Hurricane Katrina

U.S. House of Representatives

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Report by the
Select Bipartisan Committee
to Investigate the Preparation
for and Response
to Hurricane Katrina

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LETTER OF TRANSMITTAL

HOUSE OF REPRESENTATIVES,
Washington, DC, February 15, 2006.

Hon. J. Dennis Hastert,
Speaker of the House of Representatives,
Washington, DC.

DEAR MR. SPEAKER: By direction of the Select Bipartisan Committee to Investigate the Preparation for and Response to Hurricane Katrina, I submit herewith the committee's report to the 109th Congress.

Tom Davis,
Chairman.

"Pandemonium did not reign. It poured."

JOHN KENDRICK BANGS
American author and satirist

"Five frogs are sitting on a log. Four decide to jump off.
How many are left?
Answer: five.
Why? Because there's a difference between deciding and doing."

MARK L. FELDMAN and MICHAEL F. SPRATT
American businessmen
Five Frogs on a Log

"Don't find a fault. Find a remedy."

HENRY FORD
American automobile manufacturer

"Hurricane Katrina was a force of Nature.
What we've done after it is an Act of God."

Banner hanging in Harrison County, MS, Emergency Operations Center

In-i-tia-tive, *n.*
The power or ability to begin or follow through energetically with a plan or task;
enterprise and determination.

FEMA

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PREFACE

On September 15, 2005, the House of Representatives approved H. Res. 437, which created the Select Bipartisan Committee to Investigate the Preparation for and Response to Hurricane Katrina ("the Select Committee").

According to the resolution, the Committee was charged with conducting "a full and complete investigation and study and to report its findings to the House not later than February 15, 2006, regarding— (1) the development, coordination, and execution by local, State, and Federal authorities of emergency response plans and other activities in preparation for Hurricane Katrina; and (2) the local, State, and Federal government response to Hurricane Katrina."

The Committee presents the report narrative and the findings that stem from it to the U.S. House of Representatives and the American people for their consideration. Members of the Select Committee agree unanimously with the report and its findings. Other Members of Congress who participated in the Select Committee's hearings and investigation but were not official members of the Select Committee, while concurring with a majority of the report's findings, have presented additional views as well, which we offer herein on their behalf.

First and foremost, this report is issued with our continued thoughts and prayers for Katrina's victims. Their families. Their friends. The loss of life, of property, of livelihoods and dreams has been enormous. And we salute all Americans who have stepped up to the plate to help in any way they can.

It has been said civilization is a race between education and catastrophe. With Katrina, we have had the catastrophe, and we are racing inexorably toward the next. Americans want to know: what have we learned?

Two months before the Committee was established, former Speaker of the House Newt Gingrich testified before a Government Reform subcommittee about the need to move the government to an "entrepreneurial" model and away from its current "bureaucratic" model, so that we can get government to move with Information Age speed and effectiveness.

"*Implementing* policy effectively," Speaker Gingrich said, "is ultimately as important as *making* the right policy."

The Select Committee first convened on September 22, 2005, understanding, like Speaker Gingrich, that a policy that cannot be implemented effectively is no policy at all.

The Select Committee was created because, in the tragic aftermath of Katrina, America was again confronted with the vast divide between policy creation and policy implementation. With the life-and-death difference between theory and practice.

The Select Committee has spent much of the past five months examining the aftermath of this catastrophic disaster. It has become increasingly clear that local, state, and federal government agencies failed to meet the needs of the residents of Louisiana, Mississippi, and Alabama. It has been our job to figure out why, and to make sure we are better prepared for the future.

Our mandate was clear: gather facts about the preparation for and response to Katrina, at all levels of government.

Investigate aggressively, follow the facts wherever they may lead, and find out what went right and what went wrong. Ask why coordination and information sharing between local, state, and federal governments was so dismal.

- Why situational awareness was so foggy, for so long.
- Why *all* residents, especially the most helpless, were not evacuated more quickly.
- Why supplies and equipment and support were so slow in arriving.
- Why so much taxpayer money aimed at better preparing and protecting the Gulf coast was left on the table, unspent or, in some cases, misspent.
- Why the adequacy of preparation and response seemed to vary significantly from state to state, county to county, town to town.
- Why unsubstantiated rumors and uncritically repeated press reports – at times fueled by top officials – were able to delay, disrupt, and diminish the response.
- And why government at all levels failed to react more effectively to a storm that was predicted with unprecedented timeliness and accuracy.

We agreed early on that the task before us was too important for carping. This was not about politics. Katrina did not distinguish between Republicans and Democrats.

This was about getting the information we need to chart a new and better course for emergency preparation and response. The American people want the facts, and they've been watching. They alone will judge whether our review has been thorough and fair. Our final exam is this report.

Our report marks the culmination of 9 public hearings, scores of interviews and briefings, and the review of more than 500,000 pages of documents.

Our investigation revealed that Katrina was a national failure, an abdication of the most solemn obligation to provide for the common welfare. At every level – individual, corporate, philanthropic, and governmental – we failed to meet the challenge that was Katrina. In this cautionary tale, all the little pigs built houses of straw.

Of all we found along the timeline running from the fictional Hurricane Pam to the tragically real devastation along the Gulf coast, this conclusion stands out: A National Response Plan is not enough.

What's needed is a National Action Plan. Not a plan that says Washington will do everything, but one that says, when all else fails, the federal government must do something, whether it's formally requested or not. Not even the perfect bureaucratic storm of flaws and failures can wash away the fundamental governmental responsibility to protect public health and safety.

Still, no political storm surge from Katrina should be allowed to breach the sovereign boundaries between localities, states, and the federal government. Our system of federalism wisely relies on those closest to the people to meet immediate needs. But faith in federalism alone cannot sanctify a dysfunctional system in which DHS and FEMA simply wait for requests for aid that state and local officials may be unable or unwilling to convey. In this instance, blinding lack of situational awareness and disjointed decision making needlessly compounded and prolonged Katrina's horror.

In many respects, our report is a litany of mistakes, misjudgments, lapses, and absurdities all cascading together, blinding us to what was coming and hobbling any collective effort to respond.

This is not to say there were not many, many heroes, or that some aspects of the preparation and response were not, by any standard, successful. We found many examples of astounding individual initiative that saved lives and stand in stark contrast to the larger institutional failures. Nor do we mean to focus on assigning individual blame. Obtaining a full accounting and identifying lessons learned does not require finger pointing, instinctively tempting as that may be.

There was also an element of simple bad luck with Katrina that aggravated the inadequate response. The hurricane arrived over a weekend, at the end of the month. People on fixed incomes had little money for gas or food or lodging, making them more likely to remain in place and wait for their next check. Communicating via television or radio with families enmeshed in their weekend routines was difficult at best, as was finding drivers and other needed volunteers.

Over the past several months, we have become more than familiar with the disaster declaration process outlined in the Stafford Act. We understand the goals, structure and mechanisms of the National Response Plan. We've digested the alphabet soup of "coordinating elements" established by the Plan: the HSOC (Homeland Security Operations Center) and RRCC (Regional Response Coordination Center); JFOs (Joint Field Offices) and PFOs (Principal Federal Officials); the IIMG (Interagency Incident Management Group); and much more.

But the American people don't care about acronyms or organizational charts. They want to know who was supposed to do what, when, and whether the job got done. And if it didn't get done, they want to know how we are going to make sure it does the next time.

This report is a story about the National Response Plan, and how its 15 Emergency Support Functions (ESFs) were implemented with Katrina. We offer details on how well the ESFs were followed. Where there were problems, we've asked why. Where even flawless execution led to unacceptable results, we've returned to questioning the underlying plan.

We should be clear about the limitations of our investigation and the parameters of this report. We focused on the preparation for and response to Katrina, for the most part paring down the timeline to one week before and two weeks after the storm. We did not, at

least intentionally, delve into important, longer-term rebuilding and recovery issues that will continue to have a central place on the congressional agenda for months and years to come. In many areas — housing, education, health, contracting — "response" bleeds into "recovery," and the distinctions we've made are admittedly difficult and somewhat arbitrary.

Further, this report is only a summary of our work. We are hopeful that – indeed, certain that – more information will arise. The Select Committee has constrained its narrative and findings to those that can shed the most light, make the biggest difference, and trigger the most obvious near-term actions. Readers will note that we focus considerable attention on a handful of "key events" – evacuation plans and the execution of them; conditions and events at the Superdome, Convention Center, and highways; nursing homes and hospitals – as a means of illustrating what went right and wrong in countless other locales.

What this Select Committee has done is not rocket science.

We've gathered facts and established timelines based on some fairly rudimentary but important questions posed to the right people in both the public and private sectors.

- What did you need and what did you get?
- Where were you in the days and hours right before, during, and after the storm?
- Who were you talking to?
- What were you doing?
- Does that match what you were *supposed* to be doing? Why or why not?

In other words, the Select Committee has matched what was *supposed* to happen under federal, state, and local plans against what *actually* happened.

Our findings emerged from this process of matching.

Too often there were too many cooks in the kitchen, and because of that the response to Katrina was at times overdone, at times underdone. Too often, because everybody was in charge, nobody was in charge.

Many government officials continue to stubbornly resist recognizing that fundamental changes in disaster management are needed. This report illustrates that we have to stop waiting for the disaster that fits our response plan and instead design a scalable capacity to meet whatever Mother Nature throws at us. It's not enough to say, "We wouldn't be here if the levees had not failed." The levees *did* fail, and government and other organizations failed in turn – in many, many ways.

It remains difficult to understand how government could respond so ineffectively to a disaster that was anticipated for years, and for which specific dire warnings had been issued for days. This crisis was not only predictable, it was predicted.

If this is what happens when we have advance warning, we shudder to imagine the consequences when we do not. Four and a half years after 9/11, America is still not ready for prime time.

This is particularly distressing because we know we remain at risk for terrorist attacks, and because the 2006 hurricane season is right around the corner. With this report we hope to do our part to enhance preparation and response.

With Katrina, there was no shortage of plans. There were plans, but there was not enough plan-*ning*.

Government failed because it did not learn from past experiences, or because lessons thought to be learned were somehow not implemented. **If 9/11 was a failure of imagination, then Katrina was a failure of initiative. It was a failure of leadership.**

Tom Davis
Harold Rogers
Christopher Shays
Henry Bonilla
Steve Buyer
Sue Myrick
Mac Thornberry
Kay Granger
Charles W. "Chip" Pickering
Bill Shuster
Jeff Miller

FEMA

EXECUTIVE SUMMARY OF FINDINGS

The Select Committee identified failures at all levels of government that significantly undermined and detracted from the heroic efforts of first responders, private individuals and organizations, faith-based groups, and others.

The institutional and individual failures we have identified became all the more clear when compared to the heroic efforts of those who acted decisively. Those who didn't flinch, who took matters into their own hands when bureaucratic inertia was causing death, injury, and suffering. Those whose exceptional initiative saved time and money and lives.

We salute the exceptions to the rule, or, more accurately, the exceptions that proved the rule. People like Mike Ford, the owner of three nursing homes who wisely chose to evacuate his patients in Plaquemines Parish before Katrina hit, due in large part to his close and long-standing working relationship with Jesse St. Amant, Director of the Plaquemines Office of Emergency Preparedness.

People like Dr. Gregory Henderson, a pathologist who showed that not all looting represented lawlessness when, with the aid of New Orleans police officers, he raided pharmacies for needed medication and supplies and set up ad hoc clinics in downtown hotels before moving on to the Convention Center.

But these acts of leadership were too few and far between. And no one heard about or learned from them until it was too late.

The preparation for and response to Hurricane Katrina show we are still an analog government in a digital age. We must recognize that we are woefully incapable of storing, moving, and accessing information – especially in times of crisis.

Many of the problems we have identified can be categorized as "information gaps" – or at least problems with information-related implications, or failures to act decisively because information was sketchy at best. Better information would have been an optimal weapon against Katrina. Information sent to the right people at the right place at the right time. Information moved within agencies, across departments, and between jurisdictions of government as well. Seamlessly. Securely. Efficiently.

Unfortunately, no government does these things well, especially big governments.

The federal government is the largest purchaser of information technology in the world, by far. One would think we could share information by now. But Katrina again proved we cannot.

We reflect on the 9/11 Commission's finding that "the most important failure was one of imagination." The Select Committee believes Katrina was primarily a failure of initiative. But there is, of course, a nexus between the two. Both imagination and initiative – in other words, *leadership* – require good information. And a coordinated process for sharing it. And a willingness to use information – however imperfect or incomplete – to fuel action.

With Katrina, the reasons reliable information did not reach more people more quickly are many, and these reasons provide the foundation for our findings.

In essence, we found that while a national emergency management system that relies on state and local governments to identify needs and request resources is adequate for most disasters, a catastrophic disaster like Katrina can and did overwhelm most aspects of the system for an initial period of time. No one anticipated the degree and scope of the destruction the storm would cause, even though many could and should have.

The failure of local, state, and federal governments to respond more effectively to Katrina — which had been predicted in theory for many years, and forecast with startling accuracy for five days — demonstrates that whatever improvements have been made to our capacity to respond to natural or man-made disasters, four and half years after 9/11, we are still not fully prepared. Local first responders were largely overwhelmed and unable to perform their duties, and the National Response Plan did not adequately provide a way for federal assets to quickly supplement or, if necessary, supplant first responders.

The failure of initiative was also a failure of agility. Response plans at all levels of government lacked flexibility and adaptability. Inflexible procedures often

delayed the response. Officials at all levels seemed to be waiting for the disaster that fit their plans, rather than planning and building scalable capacities to meet whatever Mother Nature threw at them. We again encountered the risk-averse culture that pervades big government, and again recognized the need for organizations as agile and responsive as the 21st century world in which we live.

One-size-fits-all plans proved impervious to clear warnings of extraordinary peril. Category 5 needs elicited a Category 1 response. Ours was a response that could not adequately accept civilian and international generosity, and one for which the Congress, through inadequate oversight and accounting of state and local use of federal funds, must accept some blame.

In crafting our findings, we did not guide the facts. We let the facts guide us. The Select Committee's report elaborates on the following findings, which are summarized in part here, in the order in which they appear:

The accuracy and timeliness of National Weather Service and National Hurricane Center forecasts prevented further loss of life

The Hurricane Pam exercise reflected regognition by all levels of government of the dangers of a category 4 or 5 hurricane striking New Orleans

- Implementation of lessons learned from Hurricane Pam was incomplete.

Levees protecting New Orleans were not built for the most severe hurricanes

- Responsibilities for levee operations and maintenance were diffuse.
- The lack of a warning system for breaches and other factors delayed repairs to the levees.
- The ultimate cause of the levee failures is under investigation, and results to be determined.

The failure of complete evacuations led to preventable deaths, great suffering, and further delays in relief

- Evacuations of general populations went relatively well in all three states.
- Despite adequate warning 56 hours before landfall, Governor Blanco and Mayor Nagin delayed ordering a mandatory evacuation in New Orleans until 19 hours before landfall.
- The failure to order timely mandatory evacuations, Mayor Nagin's decision to shelter but not evacuate the remaining population, and decisions of individuals led to an incomplete evacuation.
- The incomplete pre-landfall evacuation led to deaths, thousands of dangerous rescues, and horrible conditions for those who remained.
- Federal, state, and local officials' failure to anticipate the post-landfall conditions delayed post-landfall evacuation and support.

Critical elements of the National Response Plan were executed late, ineffectively, or not at all

- It does not appear the President received adequate advice and counsel from a senior disaster professional.
- Given the well-known consequences of a major hurricane striking New Orleans, the Secretary should have designated an Incident of National Significance no later than Saturday, two days prior to landfall, when the National Weather Service predicted New Orleans would be struck by a Category 4 or 5 hurricane and President Bush declared a federal emergency.
- The Secretary should have convened the Interagency Incident Management Group on Saturday, two days prior to landfall, or earlier to analyze Katrina's potential consequences and anticipate what the federal response would need to accomplish.
- The Secretary should have designated the Principal Federal Official on Saturday, two days prior to landfall, from the roster of PFOs who had successfully

completed the required training, unlike then-FEMA Director Michael Brown. Considerable confusion was caused by the Secretary's PFO decisions.

- A proactive federal response, or push system, is not a new concept, but it is rarely utilized.
- The Secretary should have invoked the Catastrophic Incident Annex to direct the federal response posture to fully switch from a reactive to proactive mode of operations.
- Absent the Secretary's invocation of the Catastrophic Incident Annex, the federal response evolved into a push system over several days.
- The Homeland Security Operations Center failed to provide valuable situational information to the White House and key operational officials during the disaster.
- The White House failed to de-conflict varying damage assessments and discounted information that ultimately proved accurate.
- Federal agencies, including DHS, had varying degrees of unfamiliarity with their roles and responsibilities under the National Response Plan and National Incident Management System.
- Once activated, the Emergency Management Assistance Compact enabled an unprecedented level of mutual aid assistance to reach the disaster area in a timely and effective manner.
- Earlier presidential involvement might have resulted in a more effective response.

DHS and the states were not prepared for this catastrophic event

- While a majority of state and local preparedness grants are required to have a terrorism purpose, this does not preclude a dual use application.
- Despite extensive preparedness initiatives, DHS was not prepared to respond to the catastrophic effects of Hurricane Katrina.
- DHS and FEMA lacked adequate trained and experienced staff for the Katrina response.
- The readiness of FEMA's national emergency response teams was inadequate and reduced the effectiveness of the federal response.

Massive communications damage and a failure to adequately plan for alternatives impaired response efforts, command and control, and situational awareness

- Massive inoperability had the biggest effect on communications, limiting command and control, situational awareness, and federal, state, and local officials' ability to address unsubstantiated media reports.
- Some local and state responders prepared for communications losses but still experienced problems, while others were caught unprepared.
- The National Communication System met many of the challenges posed by Hurricane Katrina, enabling critical communication during the response, but gaps in the system did result in delayed response and inadequate delivery of relief supplies.

Command and control was impaired at all levels, delaying relief

- Lack of communications and situational awareness paralyzed command and control.
- A lack of personnel, training, and funding also weakened command and control.
- Ineffective command and control delayed many relief efforts.

The military played an invaluable role, but coordination was lacking

- The National Response Plan's Catastrophic Incident Annex as written would have delayed the active duty military response, even if it had been implemented.
- DOD/DHS coordination was not effective during Hurricane Katrina.
- DOD, FEMA, and the state of Louisiana had difficulty coordinating with each other, which slowed the response.
- National Guard and DOD response operations were comprehensive, but perceived as slow.

- The Coast Guard's response saved many lives, but coordination with other responders could improve.
- The Army Corps of Engineers provided critical resources to Katrina victims, but pre-landfall contracts were not adequate.
- DOD has not yet incorporated or implemented lessons learned from joint exercises in military assistance to civil authorities that would have allowed for a more effective response to Katrina.
- The lack of integration of National Guard and active duty forces hampered the military response.
- Northern Command does not have adequate insight into state response capabilities or adequate interface with governors, which contributed to a lack of mutual understanding and trust during the Katrina response.
- Even DOD lacked situational awareness of post-landfall conditions, which contributed to a slower response.
- DOD lacked an information sharing protocol that would have enhanced joint situational awareness and communications between all military components.
- Joint Task Force Katrina command staff lacked joint training, which contributed to the lack of coordination between active duty components.
- Joint Task Force Katrina, the National Guard, Louisiana, and Mississippi lacked needed communications equipment and the interoperability required for seamless on-the-ground coordination.
- EMAC processing, pre-arranged state compacts, and Guard equipment packages need improvement.
- Equipment, personnel, and training shortfalls affected the National Guard response.
- Search and rescue operations were a tremendous success, but coordination and integration between the military services, the National Guard, the Coast Guard, and other rescue organizations was lacking.

The collapse of local law enforcement and lack of effective public communications led to civil unrest and further delayed relief

- A variety of conditions led to lawlessness and violence in hurricane stricken areas.
- The New Orleans Police Department was ill-prepared for continuity of operations and lost almost all effectiveness.
- The lack of a government public communications strategy and media hype of violence exacerbated public concerns and further delayed relief.
- EMAC and military assistance were critical for restoring law and order.
- Federal law enforcement agencies were also critical to restoring law and order and coordinating activities.

Medical care and evacuations suffered from a lack of advance preparations, inadequate communications, and difficulties coordinating efforts

- Deployment of medical personnel was reactive, not proactive.
- Poor planning and pre-positioning of medical supplies and equipment led to delays and shortages.
- New Orleans was unprepared to provide evacuations and medical care for its special needs population and dialysis patients, and Louisiana officials lacked a common definition of "special needs."
- Most hospital and Veterans Affairs Medical Center emergency plans did not offer concrete guidance about if or when evacuations should take place.
- New Orleans hospitals, Veterans Affairs Medical Center, and medical first responders were not adequately prepared for a full evacuation of medical facilities.
- The government did not effectively coordinate private air transport capabilities for the evacuation of medical patients.

- Hospital and Veterans Affairs Medical Center emergency plans did not adequately prepare for communication needs.
- Following Hurricane Katrina, New Orleans Veterans Affairs Medical Center and hospitals' inability to communicate impeded their ability to ask for help.
- Medical responders did not have adequate communications equipment or operability.
- Evacuation decisions for New Orleans nursing homes were subjective and, in one case, led to preventable deaths.
- Lack of electronic patient medical records contributed to difficulties and delays in medical treatment of evacuees.
- Top officials at the Department at Health and Human Services and the National Disaster Medical System do not share a common understanding of who controls the National Disaster Medical System under Emergency Support Function-8.
- Lack of coordination led to delays in recovering dead bodies.
- Deployment confusion, uncertainty about mission assignments, and government red tape delayed medical care.

Long-standing weaknesses and the magnitude of the disaster overwhelmed FEMA's ability to provide emergency shelter and temporary housing

- Relocation plans did not adequately provide for shelter. Housing plans were haphazard and inadequate.
- State and local governments made inappropriate selections of shelters of last resort. The lack of a regional database of shelters contributed to an inefficient and ineffective evacuation and sheltering process.
- There was inappropriate delay in getting people out of shelters and into temporary housing – delays that officials should have foreseen due to manufacturing limitations.
- FEMA failed to take advantage of the Department of Housing and Urban Development's expertise in large-scale housing challenges.

FEMA logistics and contracting systems did not support a targeted, massive, and sustained provision of commodities

- FEMA management lacked situational awareness of existing requirements and of resources in the supply chain. An overwhelmed logistics system made it challenging to get supplies, equipment, and personnel where and when needed.
- Procedures for requesting federal assistance raised numerous concerns.
- The failure at all levels to enter into advance contracts led to chaos and the potential for waste and fraud as acquisitions were made in haste.
- Before Katrina, FEMA suffered from a lack of sufficiently trained procurement professionals. DHS procurement continues to be decentralized and lacking a uniform approach, and its procurement office was understaffed given the volume and dollar value of work.
- Ambiguous statutory guidance regarding local contractor participation led to ongoing disputes over procuring debris removal and other services.
- Attracting emergency contractors and corporate support could prove challenging given the scrutiny that companies have endured.

Contributions by charitable organizations assisted many in need, but the American Red Cross and others faced challenges due to the size of the mission, inadequate logistics capacity, and a disorganized shelter process

AP PHOTO/ERIC GAY

"We were abandoned. City officials did nothing to protect us. We were told to go to the Superdome, the Convention Center, the interstate bridge for safety. We did this more than once. In fact, we tried them all for every day over a week. We saw buses, helicopters and FEMA trucks, but no one stopped to help us. We never felt so cut off in all our lives. When you feel like this you do one of two things, you either give up or go into survival mode. We chose the latter. This is how we made it. We slept next to dead bodies, we slept on streets at least four times next to human feces and urine. There was garbage everywhere in the city. Panic and fear had taken over."

PATRICIA THOMPSON
New Orleans Citizen and Evacuee
Select Committee Hearing, December 6, 2005[1]

INVESTIGATION OVERVIEW

When Hurricane Katrina made landfall near the Louisiana-Mississippi border on the morning of August 29, 2005, it set in motion a series of events that exposed vast numbers of Americans to extraordinary suffering. Not only would Katrina become the most expensive natural disaster in U.S. history, it would also prove to be one of the deadliest.

From the marshes of Louisiana's Plaquemines Parish to the urban center of New Orleans to the coastal communities of Mississippi and Alabama, Katrina cut an enormous swath of physical destruction, environmental devastation, and human suffering.

With the overtopping and breaching of the New Orleans levees, the vast majority of the city became submerged, requiring the emergency evacuation of tens of thousands of residents who had not left prior to the storm. Lifted off roofs by helicopters or carried to safety in boats, they were taken to the Superdome, the Convention Center, a piece of high ground known as the Cloverleaf, or any other dry spot in the city.

At these locations, they were subjected to unbearable conditions: limited light, air, and sewage facilities in the Superdome, the blistering heat of the sun, and in many cases limited food and water. They feared for their safety and survival — and the survival of their city.

"You had people living where people aren't supposed to live," said Dr. Juliette Saussy, Director of New Orleans Emergency Medical Services, referring to the dire situations in the Superdome and Convention Center. "In general, people were just trying to survive. Some people acted badly. But most just wanted something to eat and drink, and wanted to feel safe."[2]

At least 1,100 Louisianans died as a result of Katrina.

Mississippians have understandably felt slighted that the devastation to their state has received less national public attention than New Orleans. Mississippi experienced a different storm than Louisiana — in essence, a massive, blender-like storm surge versus the New Orleans flooding caused by breached and overtopped levees.

By the end of the day on August 29, due largely to a storm surge that reached 34 feet in the western parts of the state — and extended inland as far as 10 miles — more than half of Mississippi was without power and had suffered serious wind and water damage. In addition to the surge, high winds and tornadoes left thousands of homes damaged and destroyed, and as many as 66,000 Mississippians were displaced from their homes.

FEMA

STAFF PHOTO

"It was the in and out of the surge that killed us. The out, in particular. It carried everything away."

Katrina completely flattened entire neighborhoods in communities such as Waveland, Bay St. Louis, and Pass Christian, but its damage was not limited to those who lived closest to the Gulf of Mexico. Even well inland, there is no debate over whether homes may be habitable or not. They just aren't there anymore. In these towns, brick walkways and front porches lead up to . . . nothing. Just a concrete slab where a house used to stand.

The storm careened upwards through the entire state with hurricane force winds and tornados, reaching Jackson, the state capital, and its northern most counties, and transforming 28,000 square miles — or 60 percent of the state — into a catastrophic disaster area. By the time the storm had passed, at least 230 people were dead and nearly 200,000 people were displaced from their homes. Agricultural, forestry, gaming, and poultry industries were severely damaged. Department of Homeland Security (DHS) reports estimate Veterinary Medical Assistant Teams disposed of over three million chickens that were destroyed by the storm.

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While winds upon landfall were not as powerful as those of Hurricane Camille in 1969, Katrina was in many ways the "perfect storm" for coastal Mississippi. The combination of high winds, extraordinarily low barometric pressure, and arrival during a high tide resulted in a storm surge nearly twice that of Camille's. Wind-whipped water flooded towns not only from the south, but from the north — not just from the Gulf, but from the bayous.

This was not a tsunami-like, single wave of destruction. This was a sustained, ever-growing high tide, one that kept coming for hours. And when the water did roar back toward the Gulf, it took everything with it — furniture, pool tables, refrigerators, 30-foot boats, countless household items. Everything that was once inside was suddenly outside.

"Even the very accurate forecasts didn't capture the magnitude and devastation," said Eddie Favre, Mayor of Bay St. Louis. "It was the in and out of the surge that killed us. The out, in particular. It carried everything away."[3]

"Our infrastructure was devastated," Gulfport Mayor Brent Warr said. "The water came in, blew off manhole covers, then receded and caused a vacuum, sucking gators and DVD players and lots and lots of sand into water and sewer pipes. You couldn't have backed a truck up to a manhole cover and dumped it in more effectively."[4]

Out on his converted shrimp boat on the evening following Katrina's landfall, Rep. Gene Taylor, whose home was destroyed, recalls seeing complete and utter devastation on the ground and a telling sight in the air. "Birds were so tired all they could do was hold their wings out and soar on the wind," he said. "Our seagulls, if I had to guess, ended up in Arkansas."[5]

Very little wildlife remains evident in the storm-ravaged areas. National Guardsman stationed in Louisiana said they rarely see any pelicans or alligators any more. There are few shrimp boats working the Gulf, and elected officials in Mississippi guess it will take two years for the state's oyster industry to begin to recover.

Areas presumed to be flood-proof, like the Diamondhead community — built after Hurricane Camille, miles north Bay of St. Louis — suffered flood damage.

Wind shifts "caused a lot of areas considered safe to be flooded, like the town of DeLisle, where my district director's brother lives," Taylor said on a tour bus with Select Committee Members in January. "His house was pancaked. When he came home and tried to crawl in to see what he could salvage, he ended up face to face with an alligator. He ended up shooting the thing. People got mad because they were hungry and he let the alligator rot in his front yard."[6]

While only two hurricane-related deaths were reported in Alabama, Katrina caused significant damage along its coast with a wave surge of 13.5 feet, exceeding the 100-year flood level of 12 feet, despite the fact that the state did not suffer a direct hit from the hurricane. Bayou La Batre and Dauphin Island received the brunt of the storm in Alabama, losing 800 and 200 homes, respectively. The storm caused wind damage as far north as Tuscaloosa County. Mobile Bay spilled into downtown and flooded large sections of the city, destroying hundreds of homes. The sheer power of the storm dislodged a nearby oil drilling platform, which became caught under the U.S. Highway 98 bridge.

The overall toll from the devastation is still being tallied. At the time this report was issued, more than 3,000 people from storm-affected states remained unaccounted for.

During the most recent fact-finding trip to the Gulf coast in late January 2006, Members and staff of the Select Committee were shocked by the level of devastation and slow pace of cleanup. So many towns, cities, and parishes remain almost entirely empty.

A throbbing metropolis of 470,000 before the storm, New Orleans had become at the time of our writing a struggling city that is home to barely 100,000 people—although officials say that figure almost doubles for now during the daytime, when contractors and employees come into the city to work.

Significant portions of the city and region remain uninhabitable. In St. Bernard Parish, a few miles east of downtown New Orleans, only four houses did not suffer catastrophic damage from wind, rain, or the sudden flood that resulted from the breaking of the levees of the Mississippi River-Gulf Outlet Canal (MR-GO). The parish, once home to nearly 70,000 people, has seen its population dip to about 7,000, with nearly all of those people living in temporary housing.

In all of the affected communities, the local economies remain on the brink of disaster, fearful of another punch that would surely be the knockout blow. In Mississippi, Hancock County lost 64 percent of its real property value. In Bay St. Louis and Waveland, the figure is estimated to be closer to 90 percent.

Investigative context: an overview

It's been said that experience is the best teacher. The unfortunate thing is that the learning process is sometimes such a painful one.

This report is the result of a five-month journey by the Select Committee to gather information from all those who learned painful lessons during Katrina. It examines how well local, state, and federal officials worked with each other and with private entities to alleviate the suffering of so many of our fellow citizens.

In crafting an investigative plan, the Select Committee faced and overcame several challenges. We had to appoint Members quickly and rely on other committees to detail staff to the Select Committee. We had to move quickly, while memories and evidence were fresh. We had to gather as much information as we could while leaving time to write and design a consensus report before our February 15, 2006 deadline. We had to remain focused on our prescribed "right-before-and-right-after-the-storm" timeframe, despite significant interest in longer-term issues and challenges. Like juggling with knives, we had to keep multiple investigative elements in play simultaneously — preparing for and holding high-profile public hearings; requesting, receiving, and reviewing documents; and conducting interviews and briefings.

And all this had to be done in a less-than-ideal political atmosphere.

FEMA

The Select Committee remains grateful to those Democrats who chose to participate in our investigation in defiance of their leadership's decision not to appoint Members officially to the panel. The refusal by the Minority Leader was self-defeating, given that the Select Committee's composition and minority subpoena authority would have given the Democrats more clout than they enjoy on any standing committee of the House.

Despite this strategy, the Select Committee's review and the creation of this report have been bipartisan endeavors in spirit and in fact.

On September 15, before the Select Committee was established by a bipartisan House vote, the Government Reform Committee held a hearing on the early lessons learned from Katrina. At that hearing, the Committee's Ranking Member, Rep. Henry Waxman, said there were "two steps we should take right away."[7]

First, he said, we should request basic documents from the agencies. And second, he said, "We need to hear from Michael Brown and Michael Chertoff. These are the two government officials most responsible for the inadequate response, and the Committee should call them to testify without delay."[8]

The Select Committee did not delay. We met and exceeded those goals. While many who so urgently called on Congress to swiftly investigate refused to participate and instead prejudged our efforts, we investigated aggressively what went wrong and what went right.

AP PHOTO/DENNIS COOK

The Select Committee continuously invited any and all interested Democrats to join our hearings, giving them full and equal opportunity to make statements and question witnesses and help guide the direction of our inquiry, including identifying and inviting witnesses. Five Democratic members did just that: Representative Charlie Melancon, Representative Gene Taylor, Representative Bill Jefferson, Representative Cynthia McKinney, and Representative Sheila Jackson Lee. Document requests submitted to federal, state, and local agencies were signed by both Chairman Davis and Rep. Melancon.

STAFF PHOTO

In addition to direct member participation, Democratic Members and staff were assigned to travel with Republican Members and staff to the affected locales, and Rep. Waxman's top Government Reform Committee investigative staff assisted Democratic participants. Finally, Democratic members were repeatedly invited to offer narrative text and findings for inclusion in this report.

The Select Committee, beyond extending these courtesies, remained focused on the job of Congress. In our system of checks and balances, the Congress has both the duty and the obligation to ask tough questions. We did not believe it was appropriate to outsource our congressional oversight responsibility. The American people did not want us to punt. They wanted answers, and they wanted them quickly. If there is a consensus down the road to establish an outside commission, which some purportedly wanted, so be it. The two were not and are not mutually exclusive. However, a commission will take months to set up, and an eternity to finish its work. We needed to begin immediately, while evidence and memories were fresh.

News reports and other statements suggested many Democrats felt the same. For example, Bloomberg News reported in November that "Some House Democrats Want [a] Larger Role in Katrina Investigation."[9] In that report,

Rep. Gene Taylor said, "It's really important that we're there. I certainly wish more of my colleagues who are interested in this would participate . . . . Mr. Davis, to his credit, has been extremely fair."

Rep. Maxine Waters, who had told Chairman Davis she wanted to participate but later said she could not, told Bloomberg, "I feel a certain void and a great absence from these discussions. I was hoping that our leaders could a find a way . . . so we could participate."[10]

Rep. Neil Abercrombie said he unsuccessfully expressed interest in serving on the committee. "The position of Ms. Pelosi and the leadership is pretty clear," he said. "I have a different view."[11]

STAFF PHOTO

Democrats who did buck their leadership have acknowledged both the value of their participation and the eagerness of the Select Committee to have them participate. Rep. Cynthia McKinney expressed her regret about the Democrats' failure to officially appoint Members to the Committee while thanking Chairman Davis for convening a hearing on December 6th featuring testimony from African-American residents and evacuees:

> I would like to thank you, Mr. Chairman, for allowing us to have this day. Because were it left up to — I will get in trouble now. But were it left up to the Democratic leadership, we would not have had this day, because we wouldn't be here. The Democratic leadership has instructed us to boycott this panel…. So I would like to thank my Chairman for giving us the opportunity to invite people who don't have the opportunity to come and testify before Congress…. We are here to serve all of the people of this country, and too rarely do we hear from all of the people.[12]

Regardless of who did or did not participate in our investigation, the Select Committee had a job to do, and we were determined to do it right.

Hearing chronology: an overview

The Select Committee held nine hearings over the course of approximately three months. Select Committee Members and staff simultaneously conducted scores of interviews and received dozens of briefings from local, state, and federal officials; non-governmental organizations; private companies and individuals who provided or offered external support after Katrina; and hurricane victims. Select Committee Members and staff traveled numerous times to the Gulf Coast. The Select Committee also requested and received more than 500,000 pages of documents from a wide array of sources.

The information gleaned from our investigation is provided in detailed, narrative form in subsequent chapters. What follows here is a brief synopsis of the topics, questions, and themes raised at each of our hearings:

"Predicting Hurricanes: What We Knew About Katrina and When"
September 22, 2005 Select Committee hearing

The Select Committee began at a logical place: a hearing to establish a record of who was told what, and when, about the nature of the hurricane in the days immediately before the storm. We explored the timeline of Katrina progressing from a tropical depression to a major hurricane, and asked when warnings were issued to the public and to federal, state, and local officials. We reaffirmed what we already suspected — at least two federal agencies passed Katrina's test with flying colors: the National Weather Service (NWS) and the National Hurricane Center.

Many who escaped the storm's wrath owe their lives to these agencies' accuracy. This hearing provided a backdrop for the remainder of our inquiry. We repeatedly tried to determine how government could respond so ineffectively to a disaster that was so accurately forecast.

How accurately?

- Storm-track projections released to the public **56 hours** before Katrina came ashore were off by **only 15 miles.** The average 48-hour error is 160 miles, and the average 24-hour error is 85 miles.
- The Hurricane Center's predicted strength for Katrina at landfall, **two days before** the storm hit, was off the mark by only 10 miles per hour.

We repeatedly tried to determine how government could respond so ineffectively to a disaster that was so accurately forecast.

- NWS Director Max Mayfield personally spoke by telephone with the governors of Mississippi and Louisiana and the mayor of New Orleans two days prior to landfall to warn them of what was coming. He also gave daily pre-storm video briefings to federal officials in Washington, including top Federal Emergency Management Agency (FEMA) and DHS brass.
- The day before Katrina hit, the NWS office in Slidell, Louisiana issued a warning saying, "MOST OF THE AREA WILL BE UNINHABITABLE FOR WEEKS…PERHAPS LONGER…HUMAN SUFFERING INCREDIBLE BY MODERN STANDARDS."

The Select Committee determined — despite more recently revised reports that Katrina was actually a strong Category 3 storm at landfall, not a Category 4 — that Katrina's strength and the potential disaster it could bring were made clear well in advance through briefings and formal advisories. Inadequate response could not be blamed on lack of advance warning.

AP PHOTO/ANDY NEWMAN

"Hurricane Katrina: The Role of the Federal Emergency Management Agency"
September 27, 2005 Select Committee hearing

This hearing featuring former FEMA Director Michael Brown attempted to construct a timeline of what FEMA did and did not do before, during, and after Katrina made landfall.

Fair or not, by the time of this hearing, FEMA in general and Brown in particular had become the symbol of all that went wrong with the government's response to Katrina.

By the September 27 hearing date, with the emergence of Hurricane Rita, the Select Committee had the ability to compare and contrast disaster response actions after the two storms. While Rita was predicted to be a very different

AP PHOTO/DENNIS COOK

storm from Katrina — a mere size Large compared to a size XXXL, and a storm that struck a far less densely populated area — it was immediately clear that governments at all levels did things differently this time around.

More supplies were stockpiled on the ground *prior* to Rita's arrival. The federal government declared Rita an "incident of national significance" *two days before* landfall, triggering our most thorough response, and named a federal officer in charge. These steps occurred *two days after* Katrina. Ten thousand National Guardsmen were called to Texas in advance of Rita; Louisiana summoned 1,500

FEMA

before Katrina. Search and Rescue operations were far better coordinated.

Even if a little rough around the edges, the massive pre-storm evacuation of Houston and surrounding locales showed improved foresight from state and local officials — and how lives can be saved when people pay attention to a coordinated message from their government.

We also attempted to clarify FEMA's role in disaster response. We were faced with the problematic reality that many Americans — and perhaps even some state and local officials — falsely viewed FEMA as some sort of national fire and rescue team. An important task for the Select Committee moving forward was defining what FEMA is — what it can and cannot do based on what it is actually charged with doing by statute.

We noted that FEMA is **not** a first responder agency with the resources to assume principal responsibility for overwhelmed state and local governments during a disaster. This is the real world, not the reel world. There is no Tommy Lee Jones character that comes in and takes charge of…well…*everything*.

But we also attempted to contextualize that discussion. In other words, before getting to what FEMA cannot do, we wanted to understand what they simply did not do. Just because they are not "first responders" does not mean they should be a second thought.

We explored the possible causes of FEMA's inadequate response, which are covered exhaustively in subsequent chapters. Among those discussed at the hearing: Inadequacies in the Stafford Act. Organizational or budgetary or grant-making shortcomings. State and local governments that didn't know how to ask for help, or simply didn't. A bureaucratic mindset that now emphasizes terrorism to the exclusion of natural disaster planning. We looked at these possibilities, and more.

We also examined why FEMA seemed unable to implement lessons that should have been learned well in advance of Katrina. There were the lessons of previous hurricanes. Further, FEMA officials participated in the now-widely-known exercise called Hurricane Pam in July 2004, an exercise that predicted with eerie similarity Katrina's impact on New Orleans, including an evacuation of a million people, overflowing levees, and the destruction of hundreds of thousands of buildings.

"Hurricane Katrina:
The Role of the Department of Homeland Security"
October 19, 2005 Select Committee hearing

AP PHOTO/LAWRENCE JACKSON

Although by this date FEMA and Michael Brown had received the most attention from Members of Congress, state and local officials, and the news media in Katrina's wake, the Select Committee sought to recognize that DHS and Secretary Michael Chertoff have primary responsibility for managing the national response to a catastrophic disaster, according to the National Response Plan (NRP).

Therefore, three weeks after hearing from Michael Brown, we turned to his boss, the man who ultimately fired him.

We needed to find out if Michael Brown had it right when he testified that FEMA had been under-funded and under-staffed, that it had become "emaciated," and that Congress had undermined FEMA's effectiveness when the agency was folded into DHS.

Michael Brown testified that he asked the Department for funding to implement the lessons learned from the Hurricane Pam exercise and that those funds were denied. He also testified about brain drain, diminished financial resources, and "assessments" of $70 to $80 million by DHS for department-wide programs. He said he had written memos to Secretary Ridge and Secretary Chertoff regarding the inadequacy of FEMA's resources. We asked Secretary Chertoff about those assertions.

We also sought to establish the Department's role and responsibilities in a disaster. What resources can the Secretary bring to bear? What triggers the decision to

deploy those resources? During Katrina, how personally involved was Secretary Chertoff in seeking, authorizing, or deploying specific resources?

Under the National Response Plan, the DHS Secretary is the federal official charged with declaring an Incident of National Significance. Part of that declaration entails naming a Principal Federal Official (PFO), to manage the response.

The government's pre-landfall decision to declare an Incident of National Significance with Rita suggested awareness that the call came too late with Katrina. And, based on some of Brown's emails, we knew that he *resented* being named the PFO by the Secretary. We needed to ask Secretary Chertoff what he thought about that, and what those comments said about the underlying NRP.

Finally, we asked Secretary Chertoff what we asked all officials during our investigation: Where were you in the days and hours right before, during, and after the hurricane? What were you doing? Who were you talking to?

New York University Professor Paul Light wrote shortly after Katrina that, "Mr. Chertoff is just about the only official in Washington who can say 'I told you so' about FEMA," based on some of the reforms he outlined in July 2005 in his Second Stage Review. We asked Secretary Chertoff if he believed FEMA's response to Katrina would have been better if the reforms had been in place on August 29.

"Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama"

October 27, 2005 Select Committee hearing

STAFF PHOTO

At this hearing we examined Department of Defense responsibilities, procedures, and coordination with the Department of Homeland Security in the event of a catastrophic disaster.

We looked at the roles of the National Guard and U.S. Northern Command in disaster response as the operational arms of DOD and the states, and we reviewed the role of the Coast Guard, a unique national asset with both military capabilities and domestic law enforcement authorities.

We sought to establish a timeline of the military's actions — what they were asked to do, when they were asked, and whether the jobs actually got done.

We acknowledged the heroic efforts that DOD, National Guard, and Coast Guard personnel made, efforts that saved many, many lives. The mobilization was massive and, at least once the call went out, swift and effective.

But we also discussed problems with the military response. The Select Committee believed even some of the successes occurred despite less-than-optimal planning, and too often officers were planning in a crisis environment.

There were problems: With situational awareness and damage assessments. With coordinating search and rescue operations. With the effective use of Defense Coordinating Officers by FEMA. With an early and persistent disconnect between DOD and state and local authorities. With inadequate telecommunications that prevented effective coordination. And, once again, with failing to learn as much as possible from previous disasters.

While we continued to emphasize that local first responders are best suited for handling local emergencies, the recurring question was: What happens when first responders are overwhelmed, as they clearly were in Katrina?

As a result, we asked whether DOD anticipated these circumstances, what preparations were made, and what actions were taken with regard to the National Response Plan's "Catastrophic Incident Annex" — the annex that authorizes federal agencies to act when state and local capacity even to know what they need is compromised by the sheer size of the calamity.

Our hearing came amid growing debate over an expanded military role in future disasters. President Bush prompted the discussion in a nationally televised address from New Orleans on September 15, saying, "It is now clear that a challenge on this scale requires greater federal authority and a broader role for the armed forces — the institution of our government most capable of massive logistical operations on a moment's notice."

Two witnesses — Paul McHale, Assistant Secretary of Defense for Homeland Defense, and Admiral Timothy J. Keating, Commander, North American Aerospace Defense Command and U.S. Northern Command — had indicated prior to the hearing that DOD was considering

training and equipping an active duty force specifically for disaster response.

Those remarks led to some confusion over specifics, and even to some outright opposition.

On October 13, the National Governors Association issued a statement reasserting their authority. "Governors are responsible for the safety and welfare of their citizens and are in the best position to coordinate all resources to prepare for, respond to, and recover from disasters," the association wrote.

An October 21 statement by Assistant to the President for Homeland Security Advisor Frances Townsend, who is leading President Bush's examination of the federal response to Katrina, also spawned negative reactions from state officials. Townsend reportedly said she was considering whether there is "a narrow band of cases" in which the President should seize control when a disaster strikes.[13] A spokesperson for Louisiana Gov. Kathleen Babineaux Blanco responded by saying she could not think of an instance in which the President should be able to unilaterally take control. "We don't believe Katrina was the time, and I don't know what another time would be," Denise Bottcher told the Times-Picayune.[14]

The Select Committee, therefore, began addressing this basic tension. On the one hand, we heard understandable caution from our Members and witnesses against over-reacting to Katrina with sweeping changes to laws or processes, caution against deviating too wildly from the locals-as-first-responders paradigm. None of us believed the best lesson to be learned from Katrina was that all answers can be found in Washington.

On the other hand, the call for increasing the military's role in domestic affairs is easy to grasp. Who else can respond the way the military can? Who else can stand up when others have fallen?

This tension was reflected in the National Response Plan *before* Katrina. The Catastrophic Incident Annex assumes that local response capabilities may be "insufficient," as they will be "quickly overwhelmed." But the NRP plan states federal resources will only be integrated into the response effort *upon a request by state and local authorities* and assumes state and local officials will be able to do the integrating themselves.

The Select Committee was left wondering if the plan as written tried to have its cake and eat it too. How can we rely on the overwhelmed to acknowledge they are

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overwhelmed, and then expect them to direct and manage the process of coming to their rescue?

We agreed we needed a closer evaluation of existing procedures for DOD under the National Response Plan, paying particular attention to DOD's role when first responders are wiped out or otherwise incapable of providing the initial response.

We agreed that Incidents of National Significance require a response on a national scale. But we also agreed the devil is in the details. We cannot expect the Marines to swoop in with MREs every time a storm hits. We train soldiers to fight wars. You can't kill a storm.

So what is the threshold? When can or should the Stafford Act's assumption that states will be able to "pull" needed federal resources to meet their needs give way to the operational imperative that federal agencies "push" assets to those who need them? What would spur the kind of enhanced or heightened military role that some have been promoting in the aftermath of Katrina? When would we pull that trigger? And finally, would it have made a difference in the response to Katrina?

The fact is, military resources are not infinite. It seems the kind of standing humanitarian force that would be needed to provide this sort of immediate assistance at a moment's notice would either threaten readiness or require an expansion of the active force and a significant boost in how well they are equipped.

Legal questions also arose. Were we talking about statutory changes? Should we revisit Posse Comitatus, the 127-year-old law that bars federal troops from

Do we need a larger DOD role — or just a smarter one?

assuming domestic law enforcement duties? Did Katrina demonstrate a need for a new exception to Posse Comitatus, one to be utilized after major disasters?

The Select Committee ultimately refocused the discussion by simplifying the question: Do we need a larger DOD role — ***or just a smarter one?***

The Select Committee tried hard to acknowledge at this hearing what an incredible job the Coast Guard did, and recognize the National Guard's clear sense of urgency. We noted for the record that Northern Command had prepared for this storm, deploying Defense Coordinating Officers to the three states before landfall and placing units on alert.

But we also had to recognize that it was unclear how much "real" support was in place before the storm arrived, and that Secretary McHale himself had acknowledged prior to our hearing the DOD response was too slow.[15]

"Hurricane Katrina: The Federal Government's Use of Contractors to Prepare and Respond"
November 2, 2005 Select Committee hearing

Local, state, and federal governments rely heavily on contractor support to prepare for and response to disasters. This hearing examined the contracts in place prior to Katrina's landfall, and procurement planning efforts that took place in anticipation of a large-scale catastrophic event. We also reviewed the rationale and process for awarding disaster relief and recovery contracts in the immediate aftermath of Katrina.

The Select Committee asked about the internal controls in place to ensure that federal acquisition laws were followed; the terms and performance of Katrina relief contracts; and the ways in which the management and oversight of disaster-related contracting can be strengthened.

A great deal of taxpayer money went out the door to private firms to help prepare for and respond to Katrina. Part of our job was to ask whether it's been money well spent. And part of that inquiry was asking what contracts should have been in place ***before*** the storm arrived, based on what everyone knew — or should have known — would be needed.

STAFF PHOTO

Was the contracting system up to the task? Were we able to get what we needed, when and where we needed it? By any measure, this was an enormous storm, described as one of "Biblical" proportions. In the face of the massive destruction caused by Katrina, acquisition personnel acted to meet pressing humanitarian needs, contacting firms in an effort to provide immediate relief to survivors and to protect life and property. And thankfully, many firms responded.

FEMA

It is true that several companies were called into action on a sole-source basis under acquisition provisions that allow the government to acquire urgently needed goods and services in emergency situations. It's also true that, contrary to many media reports, some of the immediate response efforts were provided through *existing* contracts that had been previously awarded through full and open competition.

Nevertheless, concerns were raised with respect to how FEMA awarded contracts in Katrina's immediate aftermath and regarding what contract vehicles were in place before landfall. These were legitimate concerns that affect not only our findings relative to the preparation for and response to Katrina, but also how well prepared we'll be the next time — and how willing contractors will be to step up to the plate the next time they're called.

The indirect result of inefficient contracting and misdirected, even baseless charges against contractors could be a government left with more than it can manage in-house.

In the weeks following Katrina, more than 80 percent of the $1.5 billion in initial contracts awarded by FEMA were awarded on a sole-source basis or pursuant to limited competition. Many of the contracts awarded were incomplete and included open-ended or vague terms. In addition, numerous news reports questioned the terms of disaster relief agreements made in haste.

Under the Stafford Act, prime contractors are to give preference to local subcontractors, but reports indicated that not enough local businesses were being hired. Questions were also raised about the Corps of Engineers' use of a limited competition to award contracts for debris removal and clean up.

Undoubtedly, FEMA before Katrina suffered from something Congress has grappled with government-wide for many years: a lack of sufficiently trained procurement professionals.

Prior to Hurricane Katrina, the DHS Office of Inspector General (IG) had repeatedly cited the lack of consistent contract management for large, complex, high-cost procurement programs. DHS procurement continues to be decentralized and lacking a uniform approach. DHS has seven legacy procurement offices that continue to serve DHS components, including FEMA. Notably, FEMA was not reporting or tracking procurements undertaken by disaster field offices, and the procurement office remains to this day understaffed given the volume and dollar value of its work.

The Chief Procurement Officer (CPO) had established an eighth office called the Office of Procurement Operations to meet the procurement needs of the rest of DHS. After Katrina, however, the CPO reassigned its staff to assist FEMA's procurement office.

At this hearing, we learned errors were made in the contracting process before and after Katrina. The contract oversight process is not always pretty, and decisions made under life-and-death pressure are not always as lucid as those made under less complicated conditions. But there are lessons to be learned about efficient and effective contracting, even from this, hopefully, once in a lifetime event.

That there were and will be disagreements with contractors over pricing and payment schedules should come as no surprise to anyone familiar with the administration of complex contracts in difficult circumstances.

The good news is, DHS has begun establishing a rigorous oversight process for each and every federal contract related to Katrina. Now the process needs to be fully implemented.

Shortly after the emergency needs arose, DHS's Chief Procurement Officer asked the DHS Inspector General's Office to begin overseeing the acquisition process. The DHS IG assigned 60 auditors, investigators, and inspectors and planned to hire thirty additional oversight personnel. The staff is reviewing the award and administration of all major contracts, including those awarded in the initial efforts, and will monitor all contracting activities as the government develops its requirements and as the selection and award process continues to unfold.

Undoubtedly, FEMA before Katrina suffered from something Congress has grappled with government-wide for many years: a lack of sufficiently trained procurement professionals.

To further ensure that any payments made to contractors are proper and reasonable, FEMA engaged the Defense Contract Audit Agency to help monitor and oversee any payments made — and pledged not to pay on ***any*** vouchers until each one is audited and cleared.

The Select Committee has no patience with waste, fraud, or abuse. We expect that any such instances that are proven will result in harsh punishment for the perpetrators. We also expect that, as the conditions on the ground have improved, the next generation of contracts have been and will be awarded and administered in accordance with standard acquisition procedures.

Emergency procedures are for emergencies only.

FEMA said it continues to revisit non-competitive arrangements made immediately after the storm.

"Hurricane Katrina: Preparedness and Response by the State of Alabama"
November 9, 2005 Select Committee hearing
"Hurricane Katrina: Preparedness and Response by the State of Mississippi"
December 7, 2005 Select Committee hearing
"Hurricane Katrina: Preparation and Response by the State of Louisiana"
December 14, 2005 Select Committee hearing

The three state-focused hearings we held were arguably the most important in terms of fact-gathering. After all, we understood that in the event of an emergency, state and local government officials bear primary responsibilities under both the National Response Plan and their own laws and directives. Throughout federal, state and local planning documents the general principle is for all incidents to be handled at the lowest possible organizational and jurisdictional level. Police, fire, public health and medical, emergency management, and other personnel are responsible for incident management at the local level. For federally declared emergencies or major disasters, DHS provides operational and/or resource coordination for federal support to on-scene incident command structures.

Our goal was to better understand the responsibilities and actions of state and local officials before, during, and after Hurricane Katrina made landfall. We explored state laws, policies, procedures, and how state and local officials interfaced with DHS and FEMA when they confronted Katrina — and how DHS interfaced with them.

The National Response Plan and the National Incident Management System were crafted to provide the framework and template, respectively, for the federal government to work with state and local authorities to prepare for and respond to crises. In turn, states, localities, tribal governments, and nongovernmental organizations are asked to align their plans and procedures with federal guidelines and procedures.

Did this coordinated alignment occur? By the time of these hearings, we knew in large part it had not. We sought to understand, from a state and local perspective, why.

"Hurricane Katrina: Voices from Inside the Storm"
December 6, 2005 Select Committee hearing

In mid-November, Rep. Cynthia McKinney asked Select Committee Chairman Tom Davis to focus a hearing on the "African-American voice" related to Hurricane Katrina.

With that request in mind, and having already planned a hearing featuring testimony from storm victims, the Select Committee sought to better understand the experiences of Gulf coast residents, including those forced

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this very carefully," aide Johnny Anderson wrote in an e-mail. "We are getting enough bad national press on race relations."[16] E-mails from aides to former FEMA Director Michael Brown reflected similar concerns about public relations and racial politics. And Alabama officials discussed similar sensitivities about a proposal to conduct background checks on out-of-state evacuees being housed in state parks.

to evacuate, during the catastrophe. Only by hearing from those most directly affected by Katrina could we determine where, how, and why the government response at all levels was so terribly inadequate.

There was little question that Katrina had sparked renewed debate about race, class, and institutional approaches toward vulnerable population groups in the United States. In the aftermath of the storm, a wide array of media reports, public statements, and polls underscored this reality.

In his September 15 speech to the nation, President Bush touched on the issue. "As all of us saw on television, there is also some deep, persistent poverty in this region as well. And that poverty has roots in a history of racial discrimination, which cut off generations from the opportunity of America," the President said.

Since then the debate had become increasingly heated. In media interviews, Jesse Jackson compared New Orleans' shelters to the hold of a slave ship, and Louis Farrakhan suggested New Orleans' levees were intentionally blown up to destroy primarily African-American neighborhoods.

While not all the commentary has necessarily been constructive, substantiated, or fair, the Select Committee believed the issue warranted further discussion, especially within the context of understanding the experiences of those caught inside the storm, and in hopes of making sure the governmental response is more effective the next time.

We knew from government e-mails and other documents that officials were almost immediately sensitive to public perceptions of race as a factor in the inadequate response. An aide to Louisiana Governor Blanco cautioned colleagues about how to respond to a request from Rep. Maxine Waters, an African-American, for security escorts in New Orleans shortly after the storm. "Please handle

A CNN-Gallup poll from September 8 to 11 reported 60 percent of African-Americans, but only 12 percent of whites, believed race was a factor in the slow response to Katrina. Another poll by the Pew Research Center found that 7 in 10 blacks believed the disaster showed that racial inequality remains a major problem in America. A majority of whites disagreed.

A November survey of 46 Katrina evacuees published by the Natural Hazards Center at the University of Colorado-Boulder concluded that "issues of race and class were central to evacuation experiences."[17] For many, the evacuation process was complicated by age, mental or physical disability, the need to care for dependents, or material possessions they were trying to take with them.

The *Washington Post*, the Kaiser Family Foundation, and Harvard University also conducted face-to-face interviews with 680 randomly selected adult evacuees residing in Houston.[18] When asked, "Has your experience made you feel like the government cares about people like you, or has it made you feel like the government doesn't care?" 61 percent reported they felt the government doesn't care. Additionally, the evacuees suggested an intersection between race and class: 68 percent of respondents thought the federal government would have responded more quickly if more people trapped in the floodwaters were "wealthier and white rather than poorer and black."

At an early November forum at Emerson College, Louis Elisa — a former regional director for the Federal Emergency Management Agency under President Clinton — reportedly suggested that race *had to be* a factor in the

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"If you get conflicting information from people you're not sure of, then inaction may be, from your perspective, the most prudent form of action."

inadequate response. "I am telling you, as a professional, that you could not have had a mistake of this nature…if something else was not afoot," the Boston Globe quoted Elisa.[19]

Whether or not one believed racist charges were well-founded (and clearly a majority of our members did not), the Select Committee agreed it should recognize and discuss the socioeconomic and racial backdrop against which Katrina unfolded.

As the Brookings Institution reported in October, New Orleans, which once had economically and demographically diverse neighborhoods, had grown extremely segregated by both race and income by the time of the storm. "As a result," Brookings concluded, "blacks and whites were living in quite literally different worlds before the storm hit." [20]

At the very least, the Select Committee determined it should further explore at this hearing how socioeconomic factors contributed to the experiences of those directly affected by the storm. The UC-Boulder survey found that "almost all interviewees described the evacuation process as disorderly and disorganized, with minimal communication about where evacuees were heading and when the next transportation would arrive. This created a state of uncertainty and insecurity…. [P]redominantly working-class African-Americans did not evacuate because they did not have the financial resources to do so."[21]

The Select Committee sought to learn more about whether government messages to Gulf coast residents regarding the dangers of the coming hurricane could have been presented in a more effective manner, a question which also carried racial and socioeconomic implications.

"If you don't hear the message from someone you trust, you tend to be skeptical," Margaret Sims, vice president of the Joint Center for Political and Economic Studies, told Public Relations Strategist magazine. "If you get conflicting information from people you're not sure of, then inaction may be, from your perspective, the most prudent form of action." [22]

The same magazine article noted that disaster response may have been hampered by not taking the "circumstances" of area residents fully into account. "The people creating the verbal or image measures don't take into account access or physical barriers to opportunities in certain communities," said Linda Aldoory, director of the Center for Risk Communication Research at the University of Maryland. "With Katrina, people knew the importance of storm warnings and the need to evacuate, but didn't have the physical access to do so."[23]

In other words, the Select Committee agreed it should examine to what extent response inadequacies stemmed from the messengers — and the message. We wanted to further explore the possibility that different people may hear different things when their elected officials are telling them to evacuate.

Document request, production, and review: an overview

Within a week of its September 15, 2005 creation, the Select Committee held its first hearing. By the end of the month, Chairman Davis and Rep. Charlie Melancon, on behalf of the Select Committee and in cooperation with the Senate Committee on Homeland Security and Governmental Affairs, had submitted 19 official and comprehensive requests for documents to relevant federal agencies and state governments.

By the beginning of January 2006, 67 formal requests for documents had been issued by the Select Committee and the Senate Committee to 29 federal agencies as well as the governments of Alabama, Mississippi, and Louisiana and their subdivisions.

In response to those formal requests and numerous other staff requests, the Select Committee received hundreds of thousands of documents.

The responses by the federal agencies and state governments inundated the Select Committee. A constant stream of boxes containing responsive documents arrived daily at the Select Committee's door. Select Committee staff worked around the clock to organize and review this stream of documents. Aggressive follow-up by the Select Committee, detailed below, ensured the document production was responsive to the Select Committee's requests.

To fulfill its mission, the Select Committee needed to do more than hold hearings. We requested and received more than half a million pages of documents from governmental organizations at all levels: federal, state, and local. The information gleaned from these documents played a critical role in helping the Select Committee paint a picture of what happened and why.

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Below is a brief overview of what was requested and what was received. Most of the governmental organizations complied with our requests in a timely and complete fashion. Efforts by others to comply unfortunately were neither timely nor complete. This is discussed below as well.

In September 2005, the Senate Committee, chaired by Senator Susan Collins, began its Katrina investigation. In many cases, the two committees desired the same or similar information. To facilitate both investigations, and to eliminate waste and unnecessary duplication of efforts, the Select Committee simply asked to receive all documents requested by the Senate.

Federal

The Select Committee sent request letters to all 15 cabinet-level departments as well as many independent federal deparments including: the Environmental Protection Agency (EPA), the United States Postal Service (USPS), the Agency for International Development (AID), the Tennessee Valley Authority (TVA), the Small Business Administration (SBA), the Social Security Administration (SSA), the Federal Communications Commission (FCC), the Nuclear Regulatory Commission (NRC), the Office of Personnel Management (OPM), and the National Aeronautics and Space Administration (NASA). We also requested information from the White House and the Office of the Vice President.

In particular, the Select Committee requested extensive information from the Department of Homeland Security, particularly from two of its constituent agencies, FEMA and the U.S. Coast Guard. We requested documents and communications from before August 23 related to the threat posed by a hurricane striking New Orleans or the Gulf Coast, mitigation measures or projects, emergency preparations, or emergency responses. We also sought documents and communications from between August 23 and August 29 related to the threat posed by Hurricane Katrina, mitigation measures or projects, emergency preparations, or emergency responses. And we requested documents and communications from between August 29 and September 15 related to the impact of Hurricane Katrina, mitigation measures or projects, emergency preparations, or emergency responses.

In addition, we requested information about the different elements of DHS and individuals holding key positions. We wanted to know the different roles and responsibilities of those components, as well as the actions they took before, during, and after Katrina. We asked for information regarding the activation of the National Response Plan and National Incident Management System, and any discussions about the use of the armed forces. We also requested relevant communications, specifically any requests for assistance, communications with local and state authorities, and communications that revealed any plans to prepare for the hurricane, or communications that demonstrated possible vulnerabilities to a hurricane. We also wanted any documents containing authorities, regulations, plans, and

procedures of the agency, weather reports, information about medical response assets, and information about DHS and FEMA funding and budgeting.

We requested an employee directory and organization chart for FEMA, as well as the individuals in key position during the hurricane in the affected regions. We asked for documents referring to risks posed by hurricanes or flooding of New Orleans, and documents indicating whether officials knew of those risks. We also requested documents and communications regarding the levee system in New Orleans, including plans, risk assessments, and knowledge of the levees' failure, particularly documents and communications with the Army Corps of Engineers.

We sought documents and names of key individuals related to the Hurricane Pam exercise, and information about FEMA's chain of command during the storm and FEMA's authorities, plans, and policies relevant to Hurricane Katrina. In addition, we requested after-action reports for past hurricanes; information about the activation of the National Response Plan; qualifications of key FEMA personnel; and contributions of contractors and subcontractors.

Finally, we requested a description of the Coast Guard's role with respect to the National Response Plan and other domestic emergencies, specifically Hurricane Katrina. We wanted to know what components will act, who they will cooperate with, and in what capacity. We also requested information about search and rescue, such as command structures, regulations, and assets available. We also requested details about when the Coast Guard learned of certain key information before, during, and after Katrina.

DHS responded to most of these requests from the Select Committee, including requests addressed to Secretary Chertoff, Acting Undersecretary Paulison, and Assistant Secretary Robert Stephan. The Department produced in total well over 200,000 pages of documents including: (1) Briefing books, reports and communication from the Secretary's office; (2) Communications from the Deputy Secretary's office; (3) E-mails from Undersecretary Brown's office; (4) E-mails from FEMA personnel involved in planning and response efforts; (5) the National Response Plan, Hurricane plans, New Orleans and Mobile area plans, Incident Action Plans, Operation Manuals and planning worksheets, and Katrina specific plans; (6) Mission assignments, task requests and logs, action requests, tracking reports, and situation reports; (7) tasking logs and requests; (8) briefings; (9) grant program documents; (10) planned shipments; resource tracking reports, commodity maps, and staging areas; (11) audits; (12) Katrina maps and graphics; and (13) organizational charts.

The Select Committee sent specific requests to the Department of Defense as well. We sent request letters to the Office of the Secretary of Defense, the National Guard Bureau, the U.S. Army Corps of Engineers, North American Air Defense Command (NORAD), and Northern Command (NORTHCOM).

Specifically, we requested documents and communications from before August 23 by officials of the Department of Defense or any constituent agencies related to the threat posed by a hurricane striking New Orleans or the Gulf coast, mitigation measures or projects, emergency preparations, or emergency responses. We requested documents and communications from between August 23 and August 29, by officials of the Department of Defense or any constituent elements related to the threat posed by Hurricane Katrina, mitigation measures or projects, emergency preparations, or emergency responses. And, we requested documents and communications, including internal communications from between August 29 and September 15 by officials of the Department of Defense or any DOD elements related to the impact of Hurricane Katrina, mitigation measures or projects, emergency preparations, or emergency responses.

We also requested information about DOD's role and legal authority with respect to domestic emergencies and Hurricane Katrina. We wanted organizational charts, after-action reports, and plans with respect to national catastrophes. We requested information about DOD and the events of Hurricane Katrina, such as any guidance provided by the Secretary of Defense before landfall, the preparations made, specific actions taken, and personnel involved. We asked for information about Joint Task Force Katrina and on actions taken during Hurricane Katrina, specifically those of active duty troops and National Guard units; requests for assistance; and information on DOD's chain of command during the incident.

The Select Committee initially received responses from the Department of Defense on behalf of Secretary Rumsfeld that only partially complied with the various requests. On November 18, the Select Committee received a production from the Department containing: execution orders; requests for forces; correspondence regarding National Guard authorization; daily update briefings; and

FEMA

daily executive summaries. On December 14, the Select Committee received further production containing the Joint Staff Director of Operations' (J-3) Redacted Timeline, outlining the Department's response actions to Hurricane Katrina and the Joint Task Force Katrina Commander's Assessment Briefings.

In further response to the letter requests, on December 22 the Select Committee received: the Assistant Secretary for Defense for Homeland Defense's Smart Book; responses to Senate interrogatories of September 28; National Guard and Northcom timelines; Execute and Deployment orders; NORTHCOM teleconference minutes; Captain Rick Snyder's, XO USS Bataan, Lessons Learned Package; Vice Admiral Fitzgerald's e-mails, timelines, and notes; 2nd Fleet Lessons Learned; Records of Annual Hurricane exercises; memo to Admiral Starling regarding Naval assets in the region; information regarding helicopter assets; Rear Admiral Kilkenny's Lessons Learned brief to the Chief of Naval Operations; Northcom requests for forces; Northcom deployment orders; Northcom timeline; and twice-daily Joint Operations Center emails.

In addition the Department produced: Joint Forces Command (JFCOM) timeline and logs of verbal orders; JFCOM Standard Operating Procedures; Unified Command Plan; TOPOFF exercise paperwork; Commander Fleet Forces command general requirement for Humanitarian Response/Disaster Relief; National Guard Bureau Readiness Documents; National Guard Bureau Senior Leadership Questions; and Katrina effects on National Guard Bureau readiness.

Despite these significant productions, Chairman Davis was concerned that the communications of senior Defense Department officials — a priority in the first request to the Department — had not been produced. Consequently, after discussions with Rep. Melancon, he issued a subpoena to the Department of Defense on December 14. The subpoena required the production of the correspondence of senior DOD officials related to Hurricane Katrina.

On December 22, the Select Committee received documents responsive to the subpoena, including official correspondence from Assistant Secretary Paul McHale, Principal Deputy Assistant Secretary Peter Verga, Admiral Keating, Lieutenant General Honoré, Lieutenant General Blum, and Colonel John Jordan. On December 30, the Select Committee received more documents responsive to the subpoena, including DOD official correspondence from Secretary Rumsfeld, Acting Deputy Secretary England, Colonel Daskevich, Brigadier General Scherling, Colonel Roberson, Colonel Chavez, Colonel Young,

Admiral Keating, and Principal Deputy Assistant Secretary Verga. On January 13, the Select Committee received further submissions of correspondence from Department officials including, Brigadier General Graham, Major General Young. And on January 17, the Select Committee received the emails of Major General Grass and Lieutenant General Vaughn.

The Select Committee also requested information from the White House. Specifically, the Select Committee requested documents and communications from before August 23 related to the threat posed by a hurricane striking New Orleans or the Gulf coast, mitigation measures or projects, emergency preparations, or emergency responses. We requested documents and communications from between August 23 and August 29 related to the threat posed by Hurricane Katrina, mitigation measures or projects, emergency preparations, or emergency responses. And we requested documents and communications from between August 29 and September 15 related to the impact of Hurricane Katrina, mitigation measures or projects, emergency preparations, or emergency responses. Initially, the White House produced more than 4,000 documents in response to these requests; however, the Select Committee was not satisfied with this initial production of documents.

In a December 6 letter, William Kelly, White House Deputy Counsel, said the September 30 and December 1 requests were too broad and asked the Select Committee to narrow the request. In response, the Select Committee insisted on briefings by senior administration officials and the production of certain items, including e-mails and documents from the White House Situation Room. As a result of our demands, a briefing was provided and more than 12,000 pages of documents from the Executive Office of the President on the response to Hurricane Katrina were delivered on December 16. The Select Committee made similar requests to the Vice President's office, which responded with almost 6,000 pages of documents.

While the Select Committee was disappointed and frustrated by the slow pace and general resistance to producing the requested documents by the White House and the Department of Defense, at the end of the day, the Select Committee believes it received enough information through documents, briefings, and interviews to understand the actions and decisions of those entities, and reach sound findings on them, without implicating executive privilege.

That's what this was about: obtaining sufficient information. Getting the documents and testimony we needed to make sure Americans are better prepared the next time. Ultimately, our public criticism of the Administration's slow pace did the job. At our insistence, the White House provided Deputy Assistant to the President for Homeland Security Ken Rapuano for a briefing with staff and Members. With the President in Texas, Homeland Security Advisor Frances Townsend out of the country, and Chief of Staff Andrew Card in Maine at the time of the storm, Rapuano offered the best view of White House knowledge and actions right before and right after Katrina. In fact, his briefing included more acknowledgements of institutional failure than any we had received previously.

The agreement with the White House gave us an opportunity to understand the White House role in Katrina while keeping the Select Committee on a parallel track with the Senate, which had not pursued White House subpoenas, and had not even subpoenaed DOD. A subpoena for White House documents would have simply derailed and delayed our inquiry, with the likelihood of a lengthy and unproductive court battle over executive privilege to follow.

State

The Select Committee sent request letters to governmental components in the three states hit hardest by Hurricane Katrina: Alabama, Louisiana, and Mississippi. In each state, we requested information from both the office of the governor and the state's respective agency in charge of homeland security or emergency management.

Specifically, the Select Committee asked each state's governor's office for documents or communications, including internal communications, received, prepared, or sent up to the date of September 15 by state officials related to the threat posed by a hurricane, mitigation measures or projects, emergency preparations, or emergency responses. Also, for each state's office in charge of homeland security or emergency management, the Select Committee requested: information about that organization, including organization charts; the agency's responsibilities with respect to emergencies; regulations and procedures; after action reports for past hurricanes; past requests for federal grants; budgets for the agencies;

contractors and subcontractors that assisted with Katrina; a detailed chronology of events and actions taken during, before, and after the hurricane; key state personnel involved with Katrina; and all communications to and from the agencies relevant to the disaster.

The Select Committee also requested any state, county, and local emergency plans, and the identity of state and local agencies involved in those plans. Finally, the Select Committee asked for documents from the past five years that evaluate the threats posed by hurricanes and any information about exercises to prepare for hurricanes.

The Select Committee sent request letters to the Alabama Department of Homeland Security (ADHS), as well as the office of Governor Bob Riley. The State of Alabama answered all questions and replied to all requests. The state provided the Alabama Emergency Management Plan, 26 different situation reports, the Governor's proclamations, a timeline, and four Incident Action Plans. The state also provided communications such as a MOU with Mississippi, Alabama county emergency management standards, and state emergency procedures. In answering the Select Committee's questions, the state provided organization charts, key personnel, the roles and responsibilities of ADHS and the Alabama Emergency Management Agency (AEMA), state and county emergency plans and the state and local agencies involved in the response to Katrina. The state also provided risk assessments and after action reports and information on exercises to prepare for disasters. Alabama also provided information on budgets for the past five years. The state also provided timelines, a list of actions taken by state agencies in response to Katrina and a complete set of AEMA internal communications and action tracking system (EM 2000) messages.

The Select Committee sent requests to both the Louisiana Office of Homeland Security and Emergency Preparedness (LOHSEP) and to the office of Governor Kathleen Blanco. After asking for a 90 day extension on October 26 due to the need to address immediate hurricane relief, the Governor fully responded on December 1 with tens of thousands of documents on their response and preparation for Hurricane Katrina including: an overview of the Governor's actions, Executive Orders and declarations, emergency preparedness plans, the LA Citizen Awareness and Disaster Evacuation Guide, official correspondence, organization charts, notes and internal communications. Included was the response of the Acting Deputy Director of LOHSEP based on "the best available information" in that agency's possession at that time, including specific responses to the committee's questions in the original Senate Committee letter.

The Louisiana Attorney General's Office responded with additional information on January 11 and also informed us there would be a slight delay in sending two CDs containing e-mails of the Louisiana National Guard due to technical problems. Those CDs arrived February 2.

The Select Committee sent request letters to both the Mississippi Emergency Management Agency (MEMA) and the Office of Governor Haley Barber. MEMA provided organization charts, and a listing of key personnel. MEMA produced state plans including the MS Comprehensive Emergency Management Plan (CEMP Vol. II), Contra-Flow Plan of August 2005, as well as many inter-agency state plans such as plans from Louisiana, transportation evacuation plans, and parish/city plans. MEMA provided risk assessments for hurricanes, floods, surges, and economic impacts. MEMA also included all Emergency Operations Center (EOC) maps of the state and local jurisdictions. MEMA provided information on plans and training exercises such as Hurricane Pam and Lifesaver 2004. Other items provided: timeline of events and communications such as director briefs, news releases, media advisories, MEMA situation reports, Incident Action Plans, EM 2000 messages, and mission assignments.

The documents produced by all three states and the federal government allowed the Select Committee to gain important insights into the workings of government entities stressed to the breaking point by a terrible disaster. They helped reveal the true nature of the relationship of state emergency management operations to the system of federal emergency management support. These documents allowed the Select Committee to reach conclusions about what worked well and what did not. Those conclusions will help improve preparation and response for the next disaster, protect the public, save lives, and reduce suffering. We don't pretend to have the entire universe of information related to the preparation for and response to Katrina. But we had more than enough to do our job. ■

[1] *Hearing on Hurricane Katrina: Voices from inside the Storm Before Select Comm.,* (Dec. 6, 2005), at 28 (statement of Patricia Thompson) [hereinafter *Dec. 6, 2005 Select Comm. Hearing*].
[2] Interview by Select Comm. Staff with Juliette Saussy, Director, New Orleans Emergency Medical Services, in New Orleans, LA (Jan. 19, 2006).
[3] Interview by Select Comm. Staff with Eddie Favre, Mayor of Bay St. Louis, in Waveland, MS (Jan. 20, 2006).
[4] Interview by Select Comm. Staff with Brent Warr, Mayor of Gulfport, in Waveland, MS (Jan. 20, 2006).
[5] Rep. Gene Taylor, comments to Select Comm. Members and Staff during bus tour of coastal MS (Jan. 20, 2006).
[6] Rep. Gene Taylor, comments to Select Comm. Members and Staff during bus tour of coastal MS (Jan. 20, 2006).
[7] *Hearing on Back to the Drawing Board: A First Look at Lessons Learned from Katrina before House Gov't Reform Committee,* 109th Cong. (Sept. 15, 2005), at 11 (statement of Rep. Henry A. Waxman) [hereinafter *Sept. 15, 2005 Gov't Reform Hearing*].
[8] *Sept. 15, 2005 Gov't Reform Hearing* at 12 (statement of Rep. Henry A. Waxman).
[9] Nicholas Johnston, *Some House Democrats Want Larger Role in Katrina Investigation,* BLOOMBERG, Nov. 2, 2005.
[10] *Id.*
[11] *Id.*
[12] *Hearing on Hurricane Katrina: Voice from Inside the Storm Before the Select Comm.,* 109th Cong. (Dec. 6, 2005).
[13] Bill Walsh, *Plan would let president take control in disasters; Proposal may be seen as slap at Blanco,* TIMES-PICAYUNE (New Orleans), Oct. 22, 2005 [hereinafter *Plan Article*].
[14] *Plan Article.*
[15] *See, e.g.,* George C. Wilson, *Suiting Up for the Next Katrina,* CONGRESS DAILY, Oct. 17, 2005, at 5.
[16] E-mail correspondence from Johnny Anderson, aide to Gov. of LA, to other aides (Sept. 2, 2005) (11:56 p.m.).
[17] John Barnshaw, *Continuing Significance of Race and Class among Houston Hurricane Katrina Evacuees,* NATURAL HAZARDS OBSERVER (Natural Hazards Center), Nov. 2005, at 2.
[18] Wash. Post Kaiser Family Foundation, and Harvard University, *Survey of Hurricane Katrina evacuees* (2005).
[19] Christine MacDonald, *Months After Katrina, a Local Storm Surge on Race and Class,* BOSTON GLOBE, Nov. 6, 2005, at 4.
[20] Brookings Institution Metropolitan Policy Program, *New Orleans after the Storm: Lessons Learned from the Past, a Plan for the Future,* (Oct. 2005), at 6.
[21] John Barnshaw, *Continuing Significance of Race and Class among Houston Hurricane Katrina Evacuees,* NATURAL HAZARDS OBSERVER (Natural Hazards Center), Nov. 2005, at 3.
[22] Alison Stateman, *Time for a Change? What Hurricane Katrina Revealed About Race and Class in America,* PUBLIC RELATIONS STRATEGIST, Oct. 1, 2005, at 8 (hereinafter *Strategist Article*).
[23] *Strategist Article.*

FEMA

"The devastation along the Gulf Coast from Hurricane Katrina is like nothing I have witnessed before. It is catastrophic. Words cannot convey the physical destruction and personal suffering in that part of the nation."

Dr. Max Mayfield
Director, National Hurricane Center
Select Committee hearing, September 22, 2005

BACKGROUND

This report is a story about federal, state, and local emergency response plans, and how they were or were not implemented before and after Katrina. Where there were problems, we asked why. Where even flawless execution led to unacceptable results, we returned to questioning the underlying plans.

What this Select Committee has done is not rocket science. We've gathered facts and established timelines based on some fairly rudimentary but important questions posed to the right people in both the public and private sectors. What did you need and what did you get? Where were you in the days and hours right before, during, and after the storm? Who were you talking to? What were you doing? Does that match what you were *supposed* to be doing? Why or why not?

In other words, the Select Committee has matched what was *supposed to happen* under federal, state, and local plans against what *actually happened*. Our findings emerged from this process of matching. In this lengthy Background chapter, we beg your indulgence. We know that most readers do not care about acronyms or organizational charts, about authorities and capabilities or the concepts of "push" versus "pull." We know you simply want to know who was supposed to do what, when, and whether the job got done. And if it didn't get done, you want to know how we are going to make sure it does the next time.

We provide this background on the framework for emergency management to set the stage for the story we will tell. To understand the *failure of initiative*, we need to first explain the tools that were available to so many.

National framework for emergency management

General role of FEMA, creation of DHS, and FEMA's absorption into the department

The Federal Emergency Management Agency (FEMA) was established in 1979 in an effort to consolidate many of the federal policies related to the management of emergencies, including **preparedness, mitigation, disaster response, and recovery**.[1] Prior to FEMA's creation, through a mix of legislation and executive decisions, responsibility for federal emergency assistance as well as the types of assistance and eligibility underwent numerous changes. For example, administrative responsibility for assistance was shifted among a variety of federal departments, agencies, and the White House. In addition, the kinds of assistance the federal government provided and the types of organizations eligible were increased a number of times by, for example, adding provisions for disaster relief to small businesses and agricultural producers. By the late 1970s, these authorities and administrative changes had "developed into a complex mix of federal emergency management missions" with which state, local, and federal officials were dissatisfied, characterizing the situation as an inefficient maze of federal policies and responsible administrative entities.[2]

In 1978, following the incident at Three Mile Island, President Carter proposed reorganizing many of the emergency operational and coordination functions that had become dispersed throughout the federal government. In a reorganization plan submitted to Congress, the President proposed creating FEMA to administer many of the federal policies related to disasters, doing so based on a number of key principles:[3]

- Federal authorities to anticipate, prepare for, and respond to major civil emergencies should be supervised by one official responsible to the President and given attention by other federal officials at the highest levels;
- An effective civil defense system requires the most efficient use of all available resources (later embodied in the "all hazards" approach, through which civil defense capabilities would be available for any disaster, regardless of cause);
- Whenever possible, emergency responsibilities should be extensions of the regular missions of federal, state, and local agencies (later embodied in federal response plans through which FEMA coordinates and plans the assistance other federal agencies provide rather than providing the assistance directly);
- Federal intervention should be minimized by emphasizing hazard mitigation and state and local preparedness; and,

- Federal hazard mitigation activities should be closely linked with emergency preparedness and response functions.

The President's reorganization plan took effect in April 1979 through two executive orders which created FEMA and assigned the various responsibilities previously dispersed throughout a number of other agencies.[4] These included, among others, the coordination of civil defense, civil emergency planning, and federal disaster relief; federal disaster preparedness; federal flood insurance authorities; dam safety; natural and nuclear disaster warning systems; and, coordination of preparedness and planning to reduce the consequences of major terrorist incidents.[5] To meet these responsibilities, FEMA focused on (1) enhancing the capability of state and local governments to respond to disasters; (2) coordinating with other federal agencies that provide resources to respond to disasters; (3) giving federal assistance directly to citizens recovering from disasters; (4) granting financial assistance to state and local governments; and, (5) providing leadership for hazard mitigation through grants, flood plain management, and other activities.[6]

FEMA

FEMA's transfer to the Department of Homeland Security and role in disaster response

In 2002, Congress created the Department of Homeland Security (DHS) and placed FEMA within the new department. Specifically, the Homeland Security Act of 2002 (HSA) established in DHS the Emergency Preparedness and Response (EPR) Directorate, placing FEMA (except for its terrorism preparedness functions) into EPR along with a number of additional entities and functions.[7] For example, EPR also assumed responsibility for the Department of Health and Human Services' Office of Emergency Preparedness, which manages the National Disaster Medical System, a network of federal, state, local, private sector, and civilian volunteer medical and support personnel who augment local medical providers during disasters.[8] In addition to these functional responsibilities, the HSA assigned to EPR responsibility for:[9]

Providing federal assistance in response to requests of the states (or local governments via the states) is often referred to as a "pull" system.

- promoting the effectiveness of emergency responders;
- supporting the Nuclear Incident Response Team (NIRT) through standards, training exercises, and funding;
- managing, overseeing, and coordinating federal response resources;
- aiding disaster recovery;
- creating an intergovernmental national incident management system;
- consolidating existing federal response plans into one plan;
- ensuring emergency responders have interoperative communications technology;
- developing a coordinated strategy for public health-related activities; and
- using private sector resources.

Federal vs. state and local roles

Pull vs. push system

The federal government responds to most natural disasters when the affected state(s) requests help because the disaster is of such severity and magnitude that an effective response is beyond the capabilities of the state and local governments.[10] This system in use for most disasters — providing federal assistance in response to requests of the states (or local governments via the states) — is often referred to as a "pull" system in that it relies on states to know what they need and to be able to request it from the federal government.[11]

In practice, states may make these requests before disasters strike because of the near certainty that federal assistance will be necessary after such an event (e.g., with hurricanes) or, afterwards, once they have conducted preliminary damage assessments and determined that their response capabilities are overwhelmed. In either case, the resources the federal government provides in any disaster response are intended to supplement state

and local government resources devoted to the ongoing disaster relief and recovery effort.[12]

In certain instances, however, the federal response may also be considered a "push" system, in which federal assistance is provided and/or moved into the affected area prior to a disaster or without waiting for specific requests from the state or local governments.[13] As discussed below, DHS's National Response Plan includes a component — the Catastrophic Incident Annex — that outlines the kinds of events that can cause damage so massive that first responders, local governments, and state governments are unable to request — or "pull" — federal assistance in the immediate aftermath of the incident, creating a situation in which "pushing" the federal resources might be necessary.

EMAC system to supplement state and local capabilities

Prior, or in addition, to seeking assistance from the federal governments, states are set up to help each other when disasters or emergencies overwhelm their capacity. States do so through participation in the Emergency Management Assistance Compact (EMAC), an interstate mutual aid agreement among member states to provide assistance after disasters overwhelm the affected state's capacity. Congress approved the creation of EMAC in 1996, building on the earlier efforts of the Southern Regional Emergency Compact that Florida and 16 other states created in 1993 after experiencing dissatisfaction with the state and federal response to Hurricane Andrew in 1992.[14] EMAC provides the legal structure for states to request assistance from one another as well as a menu of resources, such as temporary shelters and cargo aircraft, which may be available from other member states. Importantly, this assistance can, and often does, come from participating states' National Guards.[15] The National Emergency Management Association, the professional association of state emergency managers, administers the compact.[16]

Federal authorities and capabilities

When an incident overwhelms, or is likely to overwhelm, state and local resources, the Stafford Act authorizes the President, in response to a request from the governor of the affected state, to issue two types of declarations—emergency or major disaster.

Emergency declaration

The Stafford Act defines an emergency as "any occasion or instance for which, in the determination of the President, federal assistance is needed to supplement state and local efforts and capabilities to save lives and to protect property and public health and safety, or to lessen or avert the threat of a catastrophe in any part of the United States."[17] An emergency declaration is more limited in scope than a major disaster declaration; generally, federal assistance and funding for emergencies are provided to meet a specific need or to help prevent a major disaster from occurring.[18] Emergency assistance under such a declaration may include: grants to state and local governments for debris removal; direct assistance (grants) to individuals and households for temporary housing and other needs; and, assistance to states in distributing medicine and food.[19]

Major disaster declaration

A major disaster can result from a hurricane, earthquake, flood, tornado or other incident that clearly overwhelms the ability of state or local governments to respond on their own. A presidential declaration of a major disaster usually occurs after local and state governments have responded with their own resources (such as the National Guard), conducted damage assessments to determine losses and recovery needs, and determined that the disaster is of such severity and magnitude that an effective response is beyond

In certain instances, the federal response may be considered a "push" system, in which federal assistance is provided into the affected area prior to a disaster or without waiting for specific requests from the state or local governments.

the capabilities of the state and local governments.[20] Such a declaration sets into motion federal assistance to and support of state and local response efforts as well as long-term federal recovery programs.[21]

Principles of the National Response Plan and the National Incident Management System

Broadly speaking, the overall structure for the federal response to most disasters consists of the National Response Plan and National Incident Management System. The President issued Homeland Security Presidential Directive (HSPD)-5 in February 2003, directing DHS to develop a new plan for responding to emergencies (regardless of cause). Specifically, HSPD-5 required DHS to establish a single, comprehensive approach to the management of emergency events, whether the result of terrorist attacks or large-scale natural or accidental disasters.[22] According to DHS, the intent of this plan is to align federal coordination structures, capabilities, and resources into a unified, all-discipline, and all-hazards approach to domestic incident management.[23]

To implement HSPD-5, DHS developed the National Incident Management System (NIMS) and the National Response Plan (NRP). In short, the NRP defines what needs to be done in a large-scale emergency event and the NIMS defines how to manage it:

- The NRP describes the structure and mechanisms for coordinating federal support during emergencies (or exercising direct federal authority).[24] It uses the framework of the NIMS to integrate federal government domestic prevention, protection, response, and recovery plans into a single operational plan for all hazards and all emergency response disciplines. The NRP describes operational procedures for federal support to state, local, and tribal emergency managers and defines situations in which federal authorities are to provide support and when federal authorities are to assume control. The NRP organizes capabilities, staffing, and equipment resources in terms of functions that are most likely to be needed during emergencies, such as communications or urban search and rescue, and spells out common processes and administrative requirements for executing the plan. DHS issued the NRP in December 2004 and used it for the first time in the preparation for and response to Hurricane Katrina.

- NIMS consists of six major components of a systems approach to domestic incident management: command and management, preparedness, resource management, communications and information management, supporting technologies, and ongoing management and maintenance. According to DHS, NIMS "aligns the patchwork of federal special-purpose incident management and emergency response plans into an effective and efficient structure."[25] To do so, it defines the roles and responsibilities of federal, state, and local first responders during emergencies and establishes a core set of concepts, principles, terminology, and organizational processes to enable effective, efficient, and collaborative emergency event management at all levels. The concepts, principles, and processes underlying the NIMS are intended to improve the ability of different jurisdictions and first-responder disciplines to work together in various areas, such as command and communications.[26] NIMS, according to DHS, is based on an "appropriate balance of flexibility and standardization." It allows government and private entities to use an adjustable national framework to work together managing domestic incidents, no matter their cause, size, location, or complexity and, while doing so, provides a set of standardized organizational structures to improve interoperability among jurisdictions.[27] Beginning in federal fiscal year 2005, state and local governments were required to adopt NIMS in order to receive federal (DHS) preparedness grants or contracts.[28]

The NRP consists of 5 components: [29]

1. The *base plan* describes the overall structure and processes of a national approach to domestic incident management that integrates the efforts and resources of federal, state, local, tribal, private-sector, and non-governmental organizations. It includes planning assumptions (e.g., state and local capabilities may be overwhelmed), roles and responsibilities, a concept of operations, incident management actions, and instructions for maintaining and periodically updating the plan.

2. *Appendices* provide relevant, detailed supporting

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information, such as statutory authorities and a compendium of national interagency plans.

3. *Support Annexes* provide guidance and describe the functional processes and administrative requirements for meeting various plan objectives, such as logistics management and coordination with the private sector (including representatives of critical infrastructure resources).

4. *Emergency Support Annexes* spell out in detail the missions, policies, structures, and responsibilities of federal agencies for coordinating resource and programmatic support to state, local, and tribal governments as well as other federal agencies. Each Emergency Support Function (ESF) has a coordinator with ongoing responsibilities throughout the incident as well as one or more primary agencies responsible for accomplishing the ESF mission. Most ESFs also have support agencies responsible for assisting the primary agency or agencies.

5. *Incident Annexes* address contingency or hazard situations requiring specialized application of the NRP for seven different types of incidents: biological; catastrophic; cyber; food and agriculture; nuclear/radiological; oil and hazardous materials; and, terrorism.

Emergency Support Functions

The ESFs are the primary vehicle through which DHS directly responds to disasters and coordinates the direct responses of other federal agencies as well as groups like the American Red Cross (Red Cross).[30] For each of the 15 ESFs, DHS identifies a primary federal agency (or, in one case, a lead organization, the Red Cross. For most ESFs, DHS also identifies one or more support agencies. Primary agencies' responsibilities include orchestrating federal support for their ESF, managing mission assignments and coordinating with state agencies, and executing contracts and procuring goods and services as needed. Support agencies' responsibilities include conducting operations at the request of DHS or the ESF primary agency, assisting with situation (or damage) assessments, and participating in training or other exercises having to do with their prevention, response, and recovery activities.[31]

The 15 ESFs, their overall purpose, primary and support agencies are as follows:

Emergency Support Function	Purpose	Primary Agency	Support Agencies
1—transportation[32]	To support DHS, other federal agencies, state, and local responders requiring transportation.	U.S. Department of Transportation	Agriculture (Forest Service); DOD; U.S. Army Corps of Engineers; DHS; Interior
2—communications[33]	To ensure the provision of federal communications support to federal, state, local, private sector response efforts during an Incident of National Significance; supplement the National Plan for Telecommunications Support in Non-wartime Emergencies (NTSP).	DHS/Information Analysis and Infrastructure Protection/National Communications System	Agriculture (Forest Service); Interior; FEMA
3—public works and engineering[34]	To coordinate and organize the capabilities and resources of the federal government to facilitate the delivery of services, technical assistance, engineering expertise, construction management, and other support relative to the condition of (or damage to) public works infrastructure and facilities.	DOD/U.S. Army Corps of Engineers (during response); FEMA (during recovery)	USDA; HHS; Interior; EPA; American Red Cross
4—firefighting[35]	To detect and suppress fires resulting from an Incident of National Significance by providing personnel, equipment, and supplies in support of state, local, and tribal agencies involved in firefighting operations.	Department of Agriculture/ Forest Service	Commerce; DOD; U.S. Army Corps of Engineers; DHS
5—emergency management[36]	To support the overall activities of the federal government for domestic incident management by providing the core management and administrative support functions in support of the NRCC, RRCC, and JFO[37] operations; ESF 5 is the "support ESF for all federal departments and agencies…from prevention to response and recovery."	FEMA	None
6—mass care, housing, and human services[38]	To support the state, regional, local and tribal government and non-governmental efforts to address the nonmedical mass care, housing, and human services needs of individuals affected by Incidents of National Significance. Mass care includes organizing feeding operations and coordinating bulk distribution of emergency relief items; housing involves providing short- and long-term assistance with housing needs; and, human services includes counseling and identifying support for special needs populations.	FEMA American Red Cross	Agriculture (Food and Nutrition Service; Forest Service); U.S. Army Corps of Engineers; DHS/National Disaster Medical System; Interior
7—resource support[39]	To assist DHS and supporting federal, state, and local agencies prior to, during, and after incidents of national significance with emergency relief supplies, facility space, office equipment, office supplies, telecommunications and others services.	GSA	DHS
8—public health and medical services[40]	To provide coordinated federal assistance to supplement state and local resources in response to public health and medical care needs for incidents of national significance. Federal support can consist of assessment of public health needs, public health surveillance, medical care personnel, and medical equipment and supplies.	HHS	DOD; U.S. Army Corps of Engineers; DHS; DOT; American Red Cross

Emergency Support Function	Purpose	Primary Agency	Support Agencies
9—urban search and rescue[41]	To rapidly deploy the National Urban Search and Rescue (US&R) response system to provide specialized life-saving assistance to state and local authorities during an incident of national significance. US&R activities include locating and extracting victims and providing onsite medical assistance.	FEMA	Agriculture (Forest Service); DOD; U.S. Army Corps of Engineers; DHS/ U.S. Coast Guard; DHS/ Border and Transportation Security Directorate; DOT; U.S. AID
10—oil and hazardous materials response[42]	To provide a coordinated response to actual or potential oil and hazardous materials discharges or releases during incidents of national significance. ESF 10 operates by placing the mechanisms of the National Oil and Hazardous Substances Pollution Contingency Plan (NCP) within the broader NRP coordination structure. The NCP describes the National Response System—an organized network of agencies, programs, and resources with authorities and responsibilities in oil and hazardous materials response.	EPA DHS/U.S. Coast Guard[43]	Commerce/NOAA
11—agriculture and natural resources[44]	To support state, local tribal and other federal agencies' efforts to (1) address the provision of nutrition assistance, including determining needs, obtaining appropriate food supplies, and arranging for delivery of the supplies; (2) control and eradication of disease outbreaks and plant infestations; (3) assurance of food safety and security; and (4) protection of natural and cultural resources and historic (NCH) properties.	Department of Agriculture Department of the Interior (NCH properties)	DOD; American Red Cross
12—energy[45]	To restore damaged energy systems and components during a potential or actual Incident of National Significance; collect, evaluate, and share information on energy system damage and estimations on the impact of energy system outages within affected areas.	Department of Energy	Agriculture/Rural Utilities Service; Commerce/NOAA; U.S. Army Corps of Engineers; DHS; Interior; Department of Labor; Department of State; EPA; Nuclear Regulatory Commission; Tennessee Valley Authority (TVA)
13—public safety and security[46]	To provide via federal to federal support or federal support to state and local authorities a mechanism for coordinating and providing non-investigative/ non-criminal law enforcement, public safety, and security capabilities and resources.	DHS Department of Justice	Agriculture (Forest Service); DHS/Border and Transportation Security Directorate; DHS/Customs and Border Protection; DHS/ Immigration and Customs Enforcement; Interior
14—long-term community recovery and mitigation[47]	To provide a framework for federal support to enable community recovery from the long-term consequences of an Incident of National Significance.	Agriculture Commerce DHS/FEMA HUD Treasury SBA	Commerce; U.S. Army Corps of Engineers; Department of Energy; HHS; DHS; Interior; Department of Labor; DOT; EPA; TVA; American Red Cross
15—external affairs[48]	To provide accurate, coordinated, and timely information to affected audiences, including governments, media, the private sector, and the local populace.	FEMA	Commerce/NOAA; Department of Justice; Corporation for National and Community Service

Catastrophic disasters and incidents of National Significance (INS)

Recognizing that certain disasters are so different in terms of size, scope, and damage that they require a response above and beyond the normal procedures for "emergencies" and "major disasters," DHS defines and has distinct plans for the federal response to "catastrophic" disasters.[49] Specifically, DHS defines a catastrophic event as:

> Any natural or manmade incident, including terrorism, that results in extraordinary levels of mass casualties, damage, or disruption severely affecting the population, infrastructure, environment, economy, national morale, and/or government functions. A catastrophic event could result in sustained national impacts over a prolonged period of time; almost immediately exceeds resources normally available to state, local, tribal and private-sector authorities in the impacted area; and significantly interrupts governmental operations and emergency services to such an extent that national security could be threatened.[50]

Using this definition, DHS makes a number of assumptions about the scenarios that will unfold before, during, and after a catastrophic disaster and attempts to structure the federal response to address those assumptions (and their ramifications). DHS assumes:[51]

- A catastrophic incident results in large numbers of casualties and/or displaced persons;
- The incident may cause significant disruption of the area's critical infrastructure, including transportation, telecommunications, and public health and medical systems;
- Response activities may have to begin without the benefit of a detailed or complete situation and needs assessment because a detailed, credible operating picture may not be possible for 24 to 48 hours or longer after the incident;
- The federal government may have to mobilize and deploy assets before local and state governments request them via normal protocols because timely federal support may be necessary to save lives, prevent suffering, and mitigate severe damage; and,
- Large numbers of people may be left temporarily or permanently homeless and require temporary or longer-term interim housing.

Consequently, in anticipation of or soon after a catastrophic incident, DHS is expected to rapidly — and proactively — provide critical resources to assist and augment the ongoing state and local responses. To do so, when the Secretary of DHS declares a disaster to be "catastrophic," the department also implements the Catastrophic Incident Annex of the National Response Plan.[52] DHS characterizes this annex as establishing the context and overarching strategy for implementing and coordinating an accelerated, proactive national response to certain catastrophic disasters. When this annex is implemented, all federal agencies and others with responsibilities under the Emergency Support Functions (ESFs) of the National Response Plan are supposed to immediately begin operations. Specifically, DHS expects the federal government and others will need to provide expedited help in one or more of the following areas:[53]

- Mass care (shelter, food, emergency first aid, etc.), housing, and human services;
- Urban search and rescue, such as locating, extricating, and providing onsite medical treatment;
- Decontamination in incidents involving weapons of mass destruction;
- Public health and medical support;
- Medical equipment and supplies;
- Casualty and fatality management and transportation for deceased, injured, or exposed victims; and,
- Public information when state and local public communications channels are overwhelmed.

When the Secretary of DHS declares a disaster to be "catastrophic," the Department implements the Catastrophic Incident Annex of the National Response Plan.

All catastrophic incidents are "incidents of national significance."

Because of fundamental and time-critical differences in catastrophic disasters, FEMA has established protocols to pre-identify and rapidly deploy essential resources. Among other things, FEMA assumes the demands of responding to a catastrophic disaster may mean it has to expedite or even temporarily suspend normal operating procedures for state and local governments to request assistance, doing so proactively rather than in response to things like specific requests based on detailed damage assessments.[54] For catastrophic incidents, DHS is supposed to activate and deploy DHS-managed teams, equipment caches, and other resources in order to accelerate the timely provision of critically skilled resources and capabilities.[55] These can include medical and search and rescue teams, transportable shelters, and preventive and therapeutic pharmaceutical caches that may be necessary to save lives and contain damage.

Incidents of National Significance

DHS defines incidents of national significance (INS) as "those high-impact events that require a coordinated and effective response by an appropriate combination of federal, state, local, tribal, private-sector, and nongovernmental entities in order to save lives, minimize damage, and provide the basis for long-term community recovery and mitigation activities." All catastrophic incidents are also "incidents of national significance."[56] DHS bases this definition of an INS on criteria drawn from HSPD-5:[57]

- A federal department or agency acting under its own authority has requested the assistance of the Secretary of Homeland Security;
- The resources of state and local authorities are overwhelmed and federal assistance has been requested by the appropriate state and local authorities in response to major disaster declarations under the Stafford Act or catastrophic incidents (as defined by DHS, above);
- More than one federal department or agency has become substantially involved in responding to an incident, for example, in response to credible threats or warnings of imminent terrorist attacks; and,
- The President directs the Secretary of Homeland Security to assume responsibility for managing a domestic incident.

Managing the federal response to emergencies and disasters and implementing the National Response Plan

To respond to a disaster or a potential situation that is likely to require a federal response, DHS (on its own or acting via FEMA) uses existing homeland security monitoring operations; creates or activates operational components to manage the federal response; and, designates one or more officials to coordinate. The operational components DHS uses or which can be activated (or take on situation-specific duties) include the Homeland Security Operations Center (HSOC), the Interagency Incident Management Group (IIMG), a National or Regional Coordination Center (NRCC or RRCC), Emergency Response Teams (an Advance Element, ERT-A; and a National team, ERT-N), and, the Joint Field Office (JFO), which can have one or two high-level officials directing and coordinating the federal response.

Homeland Security Operations Center

The Homeland Security Operations Center, which represents over 35 agencies, including state and local law enforcement as well as federal intelligence agencies, is always in operation. It provides situational awareness, and monitors conditions in the United States, and, in conjunction with the DHS Office of Information Analysis, issues advisories and bulletins concerning specific threats to the nation.[58] The HSOC continually monitors potential major disasters and emergencies and, when such an event occurs (or is likely) provides primary situational awareness to the Secretary and the White House. Depending on the nature of the incident and the response it demands, the HSOC may activate the Interagency Incident Management Group (IIMG).[59]

Interagency Incident Management Group

DHS is supposed to convene the IIMG when it declares a situation to be an Incident of National Significance. In addition, DHS should convene the IIMG when it determines there is a need to do so in response to incidents such as major disasters, a heightened threat situation, or, high-profile, large-scale events that present

high-risk targets, such as National Special Security Events (NSSEs).[60] The IIMG is comprised of senior representatives from other DHS agencies, other federal departments and agencies, and non-governmental organizations, such as the American Red Cross, as needed. When activated, the IIMG (1) maintains strategic situational awareness of threat assessments and ongoing incident-related operations and activities; (2) provides decision-making support for incident-related prevention, preparedness, response, and recovery efforts; (3) synthesizes key intelligence, frames issues, and makes recommendations with respect to policy, operational courses of action, and resource allocation; (4) anticipates evolving federal resource and operational requirements; and, (5) maintains ongoing coordination with the Principal Federal Official (PFO) and the Joint Field Office (JFO) Coordination Group.[61]

Regional Response Coordination Center, National Response Coordination Center

For most major disasters, incidents, or emergencies, DHS (via FEMA) establishes a Regional Response Coordination Center (RRCC) using staff from regional offices. The RRCC coordinates the initial regional and field activities, such as deployment of advance teams of FEMA and other agencies' staff, and implements local federal program support until a multi-agency coordination center can be established. Depending on the scope and impact of the event, DHS (via FEMA) may also establish a National Response Coordination Center (NRCC) comprised of ESF representatives and FEMA support staff to carry out initial activation and mission assignment operations from FEMA headquarters. The NRCC supports the operations of the RRCC.[62]

Emergency Response Team-Advance Element, National Emergency Response Team

FEMA's Emergency Response Team (ERT) is the principal interagency group that staffs the multi-agency coordination center where federal, state, and local officials coordinate and direct response and recovery operations.[63] Each FEMA region maintains an ERT ready to deploy in response to threats or incidents. Before a disaster or incident (when there is warning) or soon thereafter, the RRCC typically deploys an Emergency Response Team-Advance Element (ERT-A) to the affected area(s). The ERT-A conducts preliminary damage and needs assessments and begins coordinating with the state as well as any federal resources that may be part of the initial deployment. For large-scale, high-impact events or when FEMA otherwise determines it is needed, FEMA also deploys a National Emergency Response Team (ERT-N), which is a national-level field response team. FEMA currently has 2 ERT-Ns.

Joint Field Office

The Joint Field Office (JFO) is a multiagency coordination center that FEMA establishes locally to serve as the central point for coordinating and directing the efforts of the federal, state, and local officials involved in the response effort.[64] Often, FEMA establishes the JFO at the state's emergency operations center or other locations from which the affected state is directing response efforts. For a Stafford Act emergency or major disaster declaration, the President must designate a Federal Coordinating Officer (FCO) to direct all federal assistance in the disaster area.[65]

FEMA

The Joint Field Office (JFO) is a multiagency coordination center that FEMA establishes locally to serve as the central point for coordinating and directing the efforts of the federal, state, and local officials involved in the response effort.

During an incident of national significance, which may or may not involve a Stafford Act declaration,[66] the Secretary of DHS may designate a Principal Federal Official (PFO) to act as the secretary's representative in overseeing and executing incident management responsibilities.

The FCO is responsible for managing and coordinating federal assistance in response to declared disasters and emergencies. The FCO has the authority under the Stafford Act to request and direct federal agencies to use their authorities and resources to support or conduct response and recovery operations. The FCO provides overall coordination for the federal components of the JFO and works in partnership and support of the state officials to determine and meet state and local needs for assistance.[67]

The PFO is the primary point of contact and source of situational awareness for the Secretary of DHS for incidents of national significance. The PFO is expected to facilitate federal support to the unified command structure that is set up in conjunction with state and local officials. Also, PFOs coordinate the overall federal incident management and assistance activities throughout all of the phases of emergency management—prevention, preparedness, response, and recovery. In carrying out this coordination role, the PFO does not have direct authority over the FCO or other federal and state officials.[68]

The Role of DOD, the National Guard, and the U.S. Coast Guard

The Department of Defense (DOD) makes a distinction between "homeland security" and "homeland defense" in defining mission responsibilities. Whereas homeland security refers to a concerted *national* effort to secure the homeland from threats and violence, including terrorism, homeland defense refers to *military* protection of United States territory, domestic population, and critical defense infrastructure against external threats and aggression. In the context of homeland security, DOD operates only in support of a civilian-led federal agency, referred to as Civil Support (CS). In the area of homeland defense (HD), however, DOD is the lead agency. The Assistant Secretary of Defense for Homeland Defense (ASDHD) is charged with leading the Department's activities in homeland defense, and serves as DOD's interagency liaison.[69]

Military Support to Civil Authorities

Natural Disasters	Special Events	Manmade Disaster
Severe Weather	Olympics	CBRNE-CM
Firefighting	Summits	Terroist Incident
Earthquakes	World Fair	Oil Spill

CBRNE-CM chemical, biological, radiological, nuclear, and high-yield explosives-consequence management

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Under the National Response Plan (NRP)[70] and the recently released DOD Joint Doctrine on Homeland Security[71] Military Support to Civil Authorities (MSCA) is normally provided only when local, state and other federal resources are overwhelmed and the Lead Federal Agency (LFA) responding to an incident or natural disaster requests assistance. This is a fundamental principle of DOD's approach to civil support: "[I]t is generally a resource of last resort."[72]

An exception is in cases of *immediate response authority*, a scenario entailing imminently serious conditions resulting from any civil emergency or attack requiring immediate action, where local military commanders may take such actions as necessary to save lives, prevent human suffering, and mitigate great property damage.[73]

The federal military role described in the NRP and the MSCA is apart from National Guard resources available to governors of affected states. Governors may utilize their own National Guard units, as well as other National Guard units made available by state EMAC compacts. In most circumstances, National Guard troops fall under the command of the Governor and the state Adjutant General, and they follow state emergency procedures.

When in state active duty status, the National Guard remains under the command of the governor, not DOD. The National Guard can also be "federalized" by the President to be placed under the command of DOD. As discussed below, a governor may also seek "Title 32 status" for the National Guard, which leaves the governor and the state Adjutant General in command, but provides federal funding and benefits.[74]

Natural disasters and man-made disasters

In the event of a natural disaster or emergency the NRP stipulates that DOD may be asked to provide assistance to DHS and FEMA in an attempt to save lives, protect

property, and lessen the threat of catastrophe in the United States. When disasters occur and a military response is anticipated, DHS/FEMA will request a Defense Coordinating Officer (DCO) to serve as the single DOD point of contact within the disaster area. The DCO will be the operational contact to the designated combatant commander and designated Joint Task Force (JTF) commander.[75]

In situations when a disaster is anticipated and DOD wants to be forward leaning, Northern Command has designated a DCO prior to a DHS/FEMA request. This is done informally and is intended to allow the DCO to integrate into the state emergency operations center (EOC) as early as possible to begin assessing the needs of the affected area. This has been done in the absence of a Presidential directive and before state authorities have made specific requests for DOD support via FEMA. Additionally, the doctrine of immediate response is a DOD directive which allows deployment of some DOD resources prior to receiving formal requests from the lead federal agency.[76]

Northern Command

Within the DOD Joint Staff, civil support responsibilities reside with the Joint Director of Military Support. Northern Command (NORTHCOM) is the DOD coordinating command for domestic terrorist and natural disaster incidents. Northern Command carries out civil support missions with forces assigned as required from all the armed services, typically through the creation of a joint task force.[77] NORTHCOM has a permanently assigned Joint Interagency Coordination Group, comprised of liaison officers from other DOD components and other federal agencies, including the Department of Homeland Security.

As discussed above, unless there is specific direction from the President, requests for military assistance must originate from a lead federal agency. Typically, this falls to FEMA in natural disasters. Requests are submitted to the Office of the Secretary of Defense (OSD), where they are evaluated by the Assistant Secretary of Defense for Homeland Defense (ASDHD) according to the following criteria: legality, readiness, lethality, risk, cost, and appropriateness.[78]

Once the requests are approved by OSD, they are forwarded to the Joint Director of Military Support within the Joint Staff, who in turn provides the appropriate orders to Northern Command. A Defense Coordinating Officer is designated and deployed to the area of incident.

When the size of the response is of a greater scale, a joint task force will be created, with the DCO normally serving as task force commander. The DCO then serves as the single point of contact for DOD resources, but does not have operational control of the U.S. Army Corps of Engineers or National Guard personnel operating in state active duty or Title 32 status.[79]

The process for requesting DOD active duty forces has several layers of review. Requests for DOD assistance are to be generated at the state level. These go from the state to FEMA's Federal Coordinating Officer, who in turn requests assistance from the DCO. The DCO passes these requests on to the joint task force, which routes it through NORTHCOM to the Office of the Secretary of Defense Executive Secretariat, to the Joint Directorate of Military Support.[80]

At each stage, the requirement is validated to ensure that the request can be met and that it is legal to provide the requested assests. Once vetted, the request is tasked to the services and coordinated with Joint Forces Command and forces or resources are then allocated to the joint task force, which in turn gets the support down to the user level by way of the DCO. This process is in place not only to satisfy DOD internal requirements, but to ensure maximum coordination with both FEMA and state governments.

National Guard Bureau

The National Guard is the nation's first military responder to events within the United States. Governors historically rely on the Guard to assist civilian authorities during times of natural or manmade disasters. In particular, the National Guard is a major asset in responding to any catastrophic incident within the United States. The National Guard is a reserve component of the Departments of the Army and the Air Force, at times, called in to support federal operations. The National Guard is also a force for each state, deploying for state duty status under the control of the governor. Only the National Guard has the unique dual mission of providing forces at both the state and federal levels and is the only service that abides by two oaths-of-office, one to the governor and one to the President of the United States.[81]

FEMA

The governor has command and control of the National Guard, either in state active duty or Title 32 status, unless units are federalized.[82] If federalized under Title 10, the Guard falls under the command and control of the President. While on state active duty status, the Guard's mission is to serve its state or territory during times of crisis, disaster, civil disturbance or other threats to life and property as directed by the governor. They are funded by state dollars and are entitled to state benefits and compensation. Under Title 32 status, the National Guard is trained and resourced to support federal war-fighting operations, yet remains under control of the governor, while supported by federal funds with Secretary of Defense approval.[83]

During Hurricane Katrina, the governors of Alabama, Mississippi, and Louisiana requested that all National Guard forces deployed to their states operate under Title 32 status. This request was granted retroactively to August 29 by the Secretary of Defense. Under Title 32, the governors were in command of all National Guard assets and actions during Hurricane Katrina.[84]

The National Guard may also be called up by a governor at his or her own initiative, paid by the state, to respond to a state emergency or protect state facilities. Many states do not have the fiscal resources to use the National Guard extensively in this manner.

The National Guard Bureau (NGB) is the home of the leadership of the National Guard, headed by a Chief, who is supported by the Director of Army National Guard and the Director of the Air National Guard.[85] These positions, filled by military Guard personnel, are Title 10 positions. The current chief of the National Guard Bureau is Lieutenant General H. Steven Blum, and although he is the senior Guard officer, he does not command National Guard forces. Lieutenant General Daniel James, III is the Director of the Air National Guard and Lieutenant General Clyde A. Vaughn is Director of the Army National Guard.

Under the National Response Plan, the role of the National Guard Bureau is not defined. However, in roughly 50 percent of the states and territories, the Adjutant General also serves as the state's senior emergency management official, responsible for coordinating and integrating all response agencies.[86] The National Guard Bureau and the National Guard of the individual states and territories work on a daily basis with local, state, and federal civilian agencies in various communities in all of the states and territories.

United States Coast Guard

U.S. COAST GUARD

The Coast Guard is a military, multi-mission, maritime service within the Department of Homeland Security and one of the nation's five armed services. Since its founding as the Revenue Cutter Service in 1790, the Coast Guard has provided maritime safety and security capabilities, and is renowned worldwide for it search and rescue (SAR) capabilities, whether near the shore or hundreds of miles at sea. Title 14 of the United States Code requires the Coast Guard to develop, establish, maintain and operate rescue facilities for the promotion of safety on, under and over the high seas and waters subject to the jurisdiction of the United States.

Additionally, with the passage of the Maritime Transportation Security Act (MTSA) in 2002, the Coast Guard was given added responsibilities for the enforcement of port safety, security, and marine environmental regulations including the protection and security of vessels, harbors, and waterfront facilities, deepwater ports and waterways safety.[87]

The Coast Guard has a longstanding history in the Gulf of Mexico region. The current Eighth Coast Guard District, headquartered in New Orleans, covers all or part of 26 states throughout the Gulf coast and heartland of America. It stretches from the Appalachian Mountains and Chattahoochee River in the east to the Rocky Mountains in the west, and from the U.S.-Mexico border and the Gulf of Mexico to the Canadian border in North Dakota, which

includes 15,490 miles of coastline and 10,300 miles of inland navigable waterways.[88]

Within the Coast Guard's District boundaries, the operational Coast Guard is organized into Sectors which oversee response, prevention, and logistics units, and coordinate Coast Guard operations within the Sector's geographic boundaries. The areas most affected by Hurricane Katrina are those that fall within the boundaries of Sector New Orleans and Sector Mobile, Alabama.

Private authorities and capabilities — role of the American Red Cross

The American Red Cross (Red Cross) is the only nongovernmental organization with lead agency responsibilities under the NRP. The Red Cross is an independent, non-governmental organization (NGO)[89] that operates as a nonprofit, tax-exempt, charitable institution pursuant to a charter granted by the United States Congress.[90] It has the legal status of a "federal instrumentality" due to its charter requirements to carry out responsibilities delegated by the federal government. Among those responsibilities are:

> to perform all duties incumbent upon a national society in accordance with the spirit and conditions of the Geneva Conventions to which the United States is a signatory, to provide family communications and other forms of assistance to members of the U.S. military, and to maintain a system of domestic and international disaster relief, including mandated responsibilities under the Federal Response Plan coordinated by the Federal Emergency Management Agency (FEMA).[91]

The Red Cross is not a federal agency, nor does it receive federal funding on a regular basis to carry out its services and programs.[92] It receives financial support from voluntary public contributions and from cost-recovery charges for some services.[93] Its stated mission is to "provide relief to victims of disasters and help people prevent, prepare for, and respond to emergencies."[94]

To meet its mandated responsibilities under the NRP, the Red Cross functions as an ESF primary organization in coordinating the use of mass care resources in a presidentially declared disaster or emergency.[95] As the lead agency for ESF #6, dealing with Mass Care, Housing and Human Services, the Red Cross assumes the role of providing food, shelter, emergency first aid, disaster welfare information and bulk distribution of emergency relief items.[96] ESF #6 includes three primary functions: Mass Care, Housing, and Human Services:[97]

- Mass Care involves the coordination of nonmedical care services to include sheltering of victims, organizing feeding operations, providing emergency first aid at designated sites, collecting and providing information on victims to family members, and coordinating bulk distribution of emergency relief items.
- Housing involves the provision of assistance for short- and long-term housing needs of victims.
- Human Services include providing victim-related recovery efforts such as counseling, identifying support for persons with special needs, expediting processing of new Federal benefits claims, assisting in collecting crime victim compensation for acts of terrorism, and expediting mail services in affected areas.

Function 1: Mass Care

- The NRP describes the Mass Care function as comprised of six elements: coordination, shelter, feeding, emergency first aid, Disaster Welfare Information ("DWI"), and bulk distribution.[98]
- The coordination element relates to assisting victims obtain various forms of available federal assistance, as well as gathering information about shelters and food kitchens for victims.
- The shelter element includes the use of pre-identified shelters, creating temporary facilities capable of housing victims, and coordination of obtaining shelters outside of the immediate incident area.
- The feeding element includes a variety of food distribution sites, from mobile food carts, to kitchens, to bulk distribution of food.
- The emergency first-aid element consists of assisting victims with the most basic first-aid needs, as well as, coordinating the referral of victims to local hospitals, if needed, and other appropriate medical treatment options.
- The Disaster Welfare Information ("DWI") element provides for family connectedness services. It aims

to re-connect families displaced or separated by the incident, as well as assist victims of the incident to connect with family or friends located outside the area of the incident.

- The bulk distribution element provides emergency relief items, principally ice, water and food, at specific sites to meet the urgent needs of victims within the affected area.

Function 2: Housing

The housing function addresses both the short and long-term housing needs of victims affected by an incident.[99] It is effectuated through programs designed to meet the individualized needs of victims and includes a variety of options, including provision of temporary housing, rental assistance, or financial assistance for the repair or replacement of original residences.

Function 3: Human Services

The human services function implements programs and services to assist victims restore their livelihoods.[100] It acts as a broad-based, multipurpose effort to support divergent needs such as re-routing of mail, assistance with processing federal benefits-related paperwork, assuring the provision of necessary mental health services, and providing other important, sometimes victim-specific services. The wide range of services may include support for victims with disabilities and victims who do not speak English.

With its shelters, feeding kitchens, and blood distribution capabilities, the Red Cross has long played an important role in assisting those affected by natural disasters — especially hurricanes. Due to the frequency of hurricanes in the United States, the Red Cross has developed an expertise in deploying its resources and operational capabilities to help those affected by hurricanes. In its 23-page *Tropical Storm and Hurricane Action Plan*, ("Hurricane Plan") the Red Cross outlines its systematic approach to preparing for and responding to tropical storms and hurricanes.[101] "The objective of this plan is to enable the Red Cross to be ready to deliver immediate services and assistance needed by those threatened and affected by such storms at an appropriate scope and scale," the report says.[102]

Additionally, as the NRP-model to disaster planning takes shape, the Red Cross' preparation regime is being bolstered with a Standard Operating Procedure Document for ESF #6.[103] Although not formally adopted and still in the draft stage, the document identifies the procedures, protocols, information flows and organizational relationships for the activation, implementation and operation of the Red Cross' responsibilities under ESF #6. There is also an interim Shelter Operations Management Tool Kit, which provides Red Cross chapters and shelter managers with resources to plan, open, operate, and close shelters.[104]

Adhering to the concept of all disasters being local, the Red Cross relies on its field chapters to act as first responders in opening shelters and providing for the feeding of those in need.[105] The first 48 hours of a disaster are usually handled by the local Red Cross chapters, and thereafter by national-level support, as both the federal government (FEMA), and the Red Cross National Headquarters, begin to reach the affected area.[106] The national Red Cross is structured to provide relief (mostly shelter and feeding) from days two through 30 of a disaster.[107] The local chapter ultimately is supported by its service area, of which there are eight in the United States, followed by support from the National Headquarters in Washington, D.C.[108]

FEMA

For disasters such as hurricanes, the Red Cross' actions prior to landfall typically begin with activating the chapter response plans in all of the areas threatened by the storm.[109] Simultaneously, the jurisdictional service areas move into the Service Area Major Disaster Response Structure ("Disaster Response Structure"). At this time the service areas establish their contacts with the affected state's emergency operations center ("EOC"). This often involves positioning a Red Cross official at the state EOC. The service area then begins deploying resources to the threatened areas as called for under the chapters' planning requirements. Also, at this pre-landfall time, a disaster relief operations headquarters is established.[110]

During the pre-landfall stage, the local chapter is to focus on several key activities: sheltering, feeding, public information, fundraising and maintaining contact with government officials, specifically emergency management officials.[111] While the chapter response operation is arming itself with the necessary resources, the service areas shift into their Disaster Response Structure. The service area personnel are responsible for implementing the necessary facility arrangements so that storm victims can be sheltered and fed. The service area also deploys additional personnel to the chapter regions. Once the Disaster Response Structure is opened, the national headquarters shifts its Disaster Operations Center into hurricane response mode.[112] At this point, personnel from Headquarters' Preparedness and Response division are able to monitor developments and deploy additional resources as necessary.

Following landfall of a hurricane, the affected chapters continue their focus on the key activities of sheltering, feeding, disaster assessment, providing public information and liaising with government officials.[113] After the shelters and feeding kitchens are opened, the chapters expand their role to include bulk distribution of supplies. Supplies include toiletries packages, clothing and blankets, and as the storm passes, clean-up supply packs, including mops, rakes, trash bags, and cleaning supplies to assist storm victims clean their residences and neighborhoods.[114]

As the impact of the disaster becomes better understood, a Disaster Relief Operation Headquarters is established in the region. The operations headquarters is activated, meaning operational oversight and direction of Red Cross relief activities is transferred to the on-site headquarters.[115] As the disaster headquarters staffs up, the service area's role decreases.

Outside of the affected region, other service areas and the national headquarters remain poised to assist as necessary. The main opportunities for other service areas involve shifting resources, such as cots, blankets, and other warehoused supplies, to the affected region. Personnel at national headquarters monitor events in the field and leverage relationships with national agreements with suppliers, partner groups and agencies.[116]

Service area major Disaster Response Structure

Upon the approach of a threatening hurricane, "the service area reconfigures its structure, priorities and actions to provide support, guidance and resource assistance to its threatened chapters."[117] The Disaster Response Structure, led by a response manager, is comprised of four departments or cells. These are the planning cell, forward headquarters cell, information and resource management cell, and the service area response operations.[118]

Planning cell

The planning cell is focused on ensuring adequate services and logistics support. "The planning cell develops an anticipated service delivery plan and deploys the forward headquarters cell, which enables the relief operation to begin service delivery immediately after the storm makes landfall."[119] The planning cell is tasked with determining the necessary scope of Red Cross service delivery, an estimated budget and the estimated length of time needed to serve the affected area.[120] The planning cell is the heart of decision making as it relates to what people need, where they need it, and, based on a damage assessment, how long will services be necessary.

Response manager

The response manager oversees the disaster response. The manager's responsibilities include ensuring adequate levels of staffing throughout the response organization, conducting staff meetings with the Disaster Response team, leading conference calls with the affected chapters, ensuring that adequate reports are compiled for coordination with state and federal emergency

In most situations, emergency management in the U.S. envisions a process of escalation up from the local level as incidents grow or as it becomes known that an incident has overwhelmed local and state capabilities.

management officials, and assuring the sufficient movement of assets, both human and material, to the affected region.[121]

Forward headquarters cell

The forward headquarters cell is "the deployed unit of the planning cell."[122] Its most important task is to establish a relief operation headquarters and to receive Red Cross personnel, both paid Red Cross employees and volunteers, and material resources.[123] Essentially this group serves as the advance team prior to the opening of a headquarters operation near the affected area.

Information and resource management cell

The information and resource management cell is a tactical team that concentrates on gathering information and supporting the local chapters in the evacuation of people.[124] While the Red Cross does not physically transport evacuees, it is often the recipient of a large percentage of evacuees, as shelters are established. This group establishes reporting requirements, coordinates data gathering (such as shelter tallies), monitors the inbound flow of resources to shelters, helps acquire vehicles, and handles all issues related to the immediate deployment of resources, including maintaining computer systems, managing supply warehouses, and ensuring all invoices are properly processed.[125]

Service area response operations

The day-to-day paid operations staff of the service area coordinate fundraising and communications and provide the institutional knowledge of the affected area.[126] Armed with the right data, and knowledge of the area, the information and resources management cell can help provide essential services to those in need.[127]

State, local, and private authorities and capabilities

Typical local and state emergency management responsibilities

Whether the response is coming from local or state officials—or both—most emergency management agencies and government plans assume it may take 24 to 72 hours to get assistance to individuals, particularly those who remain in affected areas. Consequently, successful emergency management can, in part, depend on individuals' willingness to evacuate to places where more immediate assistance may be available (when time and circumstances permit) and/or their preparedness to survive independently for the 24 to 72 hours that responders expect it will take to first deliver assistance.

Nonetheless, as discussed elsewhere in this report, primary responsibility for the first response to any potential or imminent incident or disaster begins — and often stays — at the local and state levels. In most situations, emergency management in the U.S. envisions a process of escalation up from the local level as incidents grow or as it becomes known that an incident has overwhelmed local and state capabilities.[128]

Local emergency management

First responders — local fire, police, and emergency medical personnel who respond to all manner of incidents such as earthquakes, storms, and floods — have the lead responsibility for carrying out emergency management efforts. Their role is to prevent, protect against, respond to, and assist in the recovery from emergencies, including natural disasters. Typically, first responders are trained and equipped to arrive first at the scene of an incident and take action immediately, including entering the scene, setting up a command center, evacuating those at the scene, tending to the injured, redirecting traffic, and removing debris.[129]

Local governments — cities, towns, counties or parishes — and the officials who lead them are responsible for developing the emergency operations and response plans by which their communities respond to disasters and other emergencies, including terrorist attacks. Local emergency management directors are also generally responsible for providing training to prepare for disaster response and they seek assistance from their state emergency management agencies when the situation exceeds or exhausts local capabilities.[130] In many states, they may also negotiate and enter into mutual aid agreements with other jurisdictions to share resources when, for example, nearby jurisdictions are unaffected by the emergency and are able to provide some assistance.[131]

Particularly relevant to the preparation for Hurricane Katrina, local officials have significant responsibilities for either setting evacuation laws and policies or working with their state government to enforce state laws pertaining to evacuations.[132] According to the National Response Plan, depending on the terms of the state or local laws, local officials have "extraordinary powers" to, among other things, order evacuations. In addition, local officials may suspend local laws and order curfews.[133]

State emergency management

As the state's chief executive, the governor is responsible for the public safety and welfare of the state's citizens and generally has wide-ranging emergency management responsibilities, including requesting federal assistance when it becomes clear the state's capabilities will be insufficient or have been exhausted. Governors are responsible for coordinating state resources to address the full range of actions necessary to prevent, prepare for, and respond to incidents such as natural disasters.

Upon their declaration of an emergency or disaster, governors typically assume a variety of emergency powers, including authority to control access to an affected area and provide temporary shelter. Also, in most cases, states generally authorize their governors to order and enforce the evacuation of residents in disaster and emergency situations. The federal government generally defers to the states to enact laws dealing with evacuation, with local officials—as mentioned earlier—typically responsible for working with state officials to enforce those laws.[134]

Governors also serve as the commanders-in-chief of their state military forces,[135] specifically, the National Guard when in state active duty or Title 32 status.[136] In state active duty — to which governors can call the Guard in response to disasters and other emergencies — National Guard personnel operate under the control of the governor, are paid according to state law, and can perform typical disaster relief tasks, such as search and rescue, debris removal, and law enforcement. Most governors have the authority to implement mutual aid agreements with other states to share resources with one another during disasters or emergencies when, for example, others (particularly nearby states) are unaffected by the emergency and able to provide assistance.[137] Most states request and provide this assistance through the EMAC.

Governors are responsible for coordinating state resources to address the full range of actions necessary to prevent, prepare for, and respond to incidents such as natural disasters.

State emergency management agencies —reporting to their respective governors — have primary responsibility for their states' disaster mitigation, preparedness, response, and recovery activities. These agencies typically coordinate with other state agencies as well as local emergency response departments to plan for and respond to potential or imminent disasters or emergencies. Among other things, state emergency management agencies are responsible for developing state emergency response plans, administering federal grant funding, and, coordinating with local and federal agencies to provide training and other emergency response-related activities.[138] Some states, such as Louisiana and Mississippi, spell out specific tasks or preparatory steps emergency management agencies must take to meet their responsibilities.

For example, Louisiana requires that its Office of Homeland Security and Emergency Preparedness determine requirements for food, clothing, and other necessities and procure and pre-position these supplies in the event of an emergency.[139] Similarly, Mississippi requires its emergency management agency to determine needs for equipment and supplies and plan and procure those items as well.[140]

Specific state and local emergency management and homeland security laws and roles and responsibilities—Alabama, Mississippi, Louisiana, and the city of New Orleans

Alabama

Governing statutes

Two Alabama statutes address how the state prepares for and responds to emergencies and disasters: the Alabama Emergency Management Act of 1955 (EMA) and the Alabama Homeland Security Act of 2003 (HSA). The EMA authorizes the state to prepare for and manage disasters and emergencies. It also authorizes the state to make grants to local governments to assist their emergency management activities and improve preparedness. The HSA established a state Department of Homeland Security (and other entities) to coordinate and undertake state homeland security preparedness, planning, and response activities.[141]

Roles and responsibilities

State documents detail the specific options and steps available to the chief executive, including an analysis of gubernatorial prerogatives, including:[142]

> First and foremost, the governor must understand and accept the fact that he/she is the primary person responsible for response and crisis management within his/her state. All citizens look to their governor as the person ultimately responsible. That is not to take away from the local responsibility of mayors, city councils, and county commissions, but, in truth and fact, "the buck stops at the governor." Secondly, although the governor must be the leader of his/her state, the governor must also be prepared to delegate.

STATE OF ALABAMA

> This statement may seem rather simplistic since every governor in the United States is confronted with so many governmental and administrative decisions, on a daily basis, that they obviously need to be able to delegate. On the other hand, in the case of an emergency catastrophe situation, the number of issues that arise are exponentially greater than ordinary day-to-day issues of government, they are unusual, sometimes technical in nature, they require instantaneous decisions, as opposed to general governmental issues which commonly allow for consideration and even collaboration among advisors and affected entities. In these regards, in order to delegate, it is extremely important that the governor has surrounded himself/herself with an outstanding group of cabinet officials who are not only qualified but who are both qualified and capable of responding in emergency situations. This is most particularly true of the adjutant general of the state's National Guard, the director of the state's Department of Homeland Security, and the office of the director of the state's office of Emergency Management. Obviously each of these positions is a key appointment for every governor, but when confronted with a catastrophic emergency, the importance of the quality and qualifications of the persons holding these positions becomes extraordinarily important. Thirdly, an emergency operations center and a communications system which are capable of and designed to operate under emergency conditions become a key element of the governor's ability to communicate, manage, and lead through the crisis. Finally, there must be pre-planning ("emergency operations plan") that sets out clearly policies, procedures, and responsibilities that will be required to meet all known emergency catastrophe situations. These must be coordinated with local emergency management officials and local government officials.[143]

Consistent with the National Response Plan and the practices of other states, in Alabama responsibility for emergency preparedness and response begins at the local level and escalates as the emergency exceeds the capabilities of each level of government. The state's Emergency Operations Plan (EOP) spells this out, specifying that, "When a disaster is imminent or has occurred, local governments have the primary

responsibility and will respond to preserve life and property. . . . When disaster conditions appear likely to exceed the combined capabilities of a local jurisdiction and mutual aid compact signatories, local governments will request the support of the state.… If the capabilities (financial or operational) of state government are exceeded, the governor can request federal disaster emergency assistance."[144]

Alabama's statutes authorize and direct local governments to establish emergency management organizations (agencies), appoint directors for these organizations, and confer police officer powers on their officials. In addition, local directors of emergency management may develop mutual aid agreements with public or private agencies (such as nearby counties) for emergency aid and assistance during disasters and emergencies.[145] These local directors and some of their personnel must, if they choose to receive state funding, meet state-set performance and competence standards for their positions.[146]

Alabama's statutes outline specific responsibilities of the state's Emergency Management Agency as well as its Department of Homeland Security. The state EMA has overall responsibility for preparing for and managing disasters and emergencies. Its director is appointed by the governor and also serves as an assistant director for the state's Department of Homeland Security.[147] To meet its obligations, the state EMA promulgates a statewide Emergency Operations Plan with policy and guidance for state and local disaster mitigation, preparedness, response, and recovery operations.[148] The plan also outlines state and local government responsibilities in relation to federal disaster assistance programs under the Stafford Act.[149]

Alabama's Director of Homeland Security, also appointed by the governor, heads the state's Department of Homeland Security and has overall responsibility for the state's homeland security preparedness and response activities. Specific state Department of Homeland Security responsibilities include: receiving and disseminating federal intelligence; planning and executing simulations; ensuring cooperation among public officials and the private sector; coordinating receipt and distribution of homeland security funding; and coordinating state strategy and standards for homeland security efforts.[150]

Mississippi

Governing statutes

The Mississippi Emergency Management Law outlines the specific responsibilities of key state entities and emergency responders and provides for the coordination of emergency preparedness, response, recovery and mitigation activities among state agencies, local and federal governments, and the private sector.[151] The law establishes the Mississippi Emergency Management Agency (MEMA); confers emergency powers on the governor, MEMA, municipal and county governments; and, authorizes the establishment of the Mississippi Emergency Operations Plan (MEOP).[152]

Roles and responsibilities

Consistent with the National Response Plan and the practices of other states, in Mississippi responsibility for emergency preparedness and response begins at the local level and escalates as the emergency exceeds the capabilities of each level of government. Among other things, Mississippi's governing statute spells out that "state policy for responding to disasters is to support local emergency response efforts," but it also recognizes that catastrophic disasters can overwhelm local resources and that, as a result, the state "must be capable of providing effective, coordinated, and timely support to communities and the public."[153]

The state's statute authorizes (but does not direct) counties and municipalities to create emergency management organizations, which are in turn authorized to do the various things necessary to handle emergency management functions in a disaster.[154] Local governments are also authorized to enter into mutual aid agreements within the state (for example, with nearby counties) for emergency aid and assistance during disasters and emergencies.[155] If a disaster or emergency "exceeds the capability of local resources and personnel, state resources may be made available through coordination" with MEMA. Local authorities are mandated to "recognize the severity and magnitude" of the emergency by (1) declaring a local emergency, (2) utilizing the localities own resources and (3) designating one capable person to make requests to MEMA for additional resources.[156]

FEMA

The governor of Mississippi is granted broad powers to deal with a natural disaster and may assume direct operational control over all state emergency management functions.[157] For example, the governor is authorized to "determine needs for food, clothing or other necessities in the event of attack, natural, man-made or technological disasters and to procure supplies, medicines, materials, and equipment." As commander-in-chief of the state militia, the governor may order the Mississippi National Guard into active state service.[158]

The MEMA director, appointed by the governor, is responsible for, among other things: working with the governor to prepare and implement an emergency management plan that is coordinated with federal and state plans to the fullest extent possible; adopting standards and requirements for local emergency management plans; determining needs for equipment and supplies; planning for and procuring supplies, medicine and equipment; and, assisting political subdivisions with the creation of urban search and rescue teams. In addition, the MEMA director is authorized to create mobile support units to reinforce disaster organizations in stricken areas. MEMA's director also serves as a liaison to the emergency management agencies of other states and the federal government.[159]

Louisiana

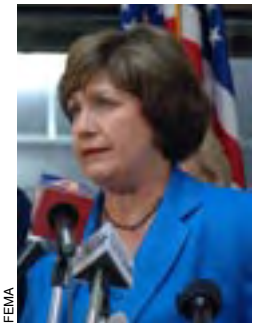
Governing statutes

The Louisiana Homeland Security and Emergency Assistance and Disaster Act outlines the specific responsibilities of key state entities and emergency responders and provides for the coordination of activities among state agencies and local and federal governments. The law establishes the Louisiana Office of Homeland Security and Emergency Preparedness (LOHSEP), confers emergency powers on the governor and parish and municipal governments, and requires the establishment of the Louisiana Emergency Management Plan (EOP).[160]

Roles and responsibilities

In Louisiana, parish and municipal governments' chief executives by law have overall responsibility for the direction and control of emergency and disaster operations and are assisted by a local homeland security and emergency preparedness director.[161] Their responsibilities include the development and implementation of emergency management programs to provide for rapid and effective action to "direct, mobilize, staff, train and coordinate use of local resources."[162]

Louisiana's governor has overall responsibility for emergency management in the state and is assisted in these duties by the LOHSEP director in meeting dangers to the state and people presented by emergencies or disasters. The governor is authorized, for example, to declare a disaster or emergency if he or she finds that one has occurred (or the threat is imminent) and coordinate delivery of all emergency services (public, volunteer, and private) during a natural disaster.[163] By making a disaster or emergency declaration, the governor activates the state's emergency response and recovery program (which is under the command of the LOHSEP director). This authorizes the governor to, among other things: (1) utilize all available resources of the state government and of each political subdivision of the state as reasonably necessary to cope with the disaster or emergency; (2) direct and compel the evacuation of all or part of the population from any stricken or threatened areas within the state if deemed necessary for the preservation of life; and, (3) prescribe routes, modes of transportation, and destination in connection with evacuation.[164]


FEMA

The LOHSEP, within the Military Department and under the authority of the governor and the adjutant general, is responsible for emergency preparedness and homeland security in the state.[165] The LOHSEP prepares and maintains a homeland security and state emergency operations plan (EOP), which establishes the policies and structure for the state's management of emergencies and disasters. The EOP prescribes the phases of emergencies and disasters—preparedness, response, recovery and prevention (mitigation)—and outlines the

roles and responsibilities of the state's Emergency Support Functions (ESFs), which mirror those in the National Response Plan. The EOP is an all-hazards plan, assigning responsibilities for actions the state will take to provide for the safety and welfare of its citizens against the threat of natural and man-made emergencies and disasters. The EOP is designed to coordinate closely with the federal National Response Plan as well as parish Emergency Operations Plans.[166]

New Orleans

FEMA

The City of New Orleans Comprehensive Emergency Management Plan ("New Orleans Plan") is consistent with the State of Louisiana Emergency Management Plan. The plan reflects the principle that "City government bears the initial responsibility for disaster response and relief."[167] It is therefore the Mayor of the City of New Orleans who must initiate, execute, and direct the operations during any emergency or disaster affecting the City of New Orleans.[168]

According to the New Orleans Plan, "[i]f it becomes clearly evident that local resources are inadequate to fully manage the effects of an emergency or disaster, the Mayor may request state and/or federal assistance through [LOHSEP].[169] The New Orleans Office of Emergency Preparedness ("NOOEP") will coordinate with the LOHSEP to assure the most effective management of such assistance."[170]

The plan also says, "The authority to order the evacuation of residents threatened by an approaching hurricane is conferred to the Governor by Louisiana statute."[171] But this power "is also delegated to each political subdivision of the State by Executive Order."[172] "This authority empowers the chief elected official of New Orleans, the Mayor of New Orleans, to order the evacuation of the parish residents threatened by an approaching hurricane,"[173] according to the plan.

For example, New Orleans Mayor Ray Nagin, according to the plan, is responsible for giving the order for a mandatory evacuation and supervising the actual evacuation of the population. The city's Office of Emergency Preparedness "must coordinate with the state on elements of evacuation" and "assist in directing the transportation of evacuees to staging areas."[174]

The New Orleans Plan states, "The safe evacuation of threatened populations . . . is one of the principle reasons for developing a Comprehensive Emergency Management Plan."[175] The city's evacuation plan states, "The city of New Orleans will utilize all available resources to quickly and safely evacuate threatened areas."[176]

The plan also directs "[s]pecial arrangements will be made to evacuate persons unable to transport themselves or who require specific life saving assistance. Additional personnel will be recruited to assist in evacuation procedures as needed."[177] The evacuation plan further warns that "[i]f an evacuation order is issued without the mechanisms needed to disseminate the information to the affected persons, then we face the possibility of having large numbers of people either stranded and left to the mercy of the storm, or left in areas impacted by toxic materials." [178]

Threats and vulnerabilities related to hurricanes

General threats — frequency of hurricanes and vulnerable coastal areas in the U.S.

Hurricanes threaten the United States, particularly the coastal areas along the Gulf of Mexico and Atlantic Ocean, virtually every year. While Florida is the state most frequently hit, other states — particularly Texas, Louisiana, and North Carolina — have frequently been struck by hurricanes, according to the records of the National Hurricane Center (NHC).[179] The coastal areas of these and other states are among the most vulnerable to storm surge, which carries the greatest potential for loss of life in a hurricane. Storm surge is the water that swirling hurricane force winds push toward the shore as the storm advances. Combined with normal tides, this can increase the average water level by 15 feet or more.[180]

Flooding is also a serious threat to lives and property in a hurricane. The NHC reports that, although storm surge has the greatest potential to take lives, in the last 30 years, more people have died from hurricane-induced inland

flooding.[181] Tornadoes can also add to the destructive power of a hurricane. While not all hurricanes produce them, according to the NHC, studies have shown that more than half of the hurricanes that reach landfall produce at least one tornado.

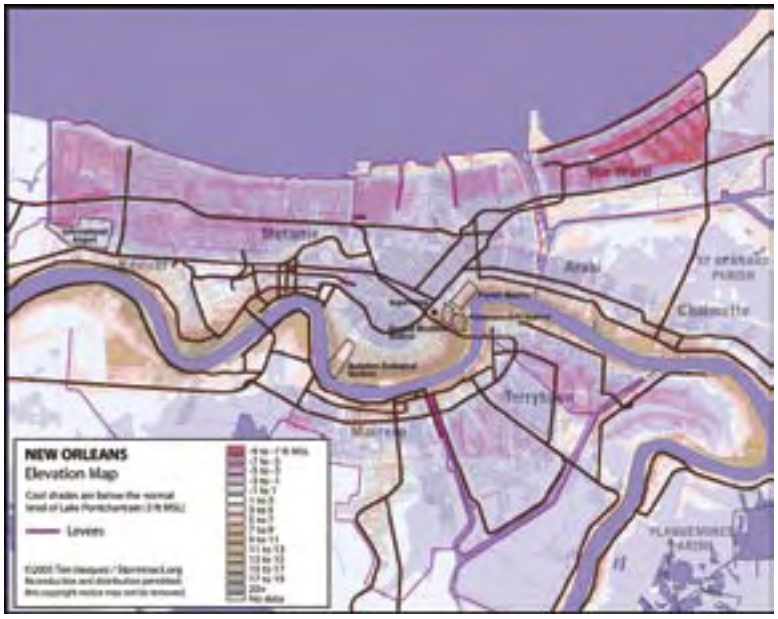
Specific vulnerabilities of New Orleans—inherent vulnerability to flooding

Metropolitan New Orleans is built on subsiding swampland on the delta of the Mississippi River, which makes the city inherently vulnerable to flooding.[182] The City of New Orleans is shaped like a bowl, with an average elevation of 6 feet below sea level.[183] Some elevations are as high as 12 feet above sea level, and some elevation are as low as 9 feet below sea level.[184] The Mississippi River, which flows through the middle of New Orleans, is on average 14 feet above sea level, and Lake Ponchartrain, which establishes the northern border of New Orleans, is on average one foot above sea level.[185]

New Orleans and its surrounding areas have experienced numerous floods from both the Mississippi River and hurricanes.[186] A major flood on the Mississippi River completely inundated New Orleans in 1927, and others following severe rainstorms damaged parts of the city in 1979 and 1995.[187] Several hurricanes have hit New Orleans, including Hurricane Betsy in 1965, Hurricane Camille in 1969, Hurricane Georges in 1998, and Hurricane Lilli in 2002.[188] The greatest threat from hurricanes is not wind, but storm-surge, which accounts for most of the damage and deaths caused by hurricanes.[189]

Levees designed, built to address vulnerabilities

After Hurricane Betsy in 1965, federal and state governments proposed a number of flood control projects to deal with the threat of hurricanes and the flooding they might cause in New Orleans.[190] These included a series of control structures, concrete floodwalls, and levees along Lake Pontchartrain and several other waterways.[191] One of the major projects is formally called the Lake Pontchartrain and Vicinity, Louisiana Hurricane Protection Project.[192] This project included levees along



the Lake Pontchartrain lakefront, the 17th Street Canal, the London Avenue Canal, the Orleans Avenue Canal, the Intercoastal waterway, the Industrial Canal, the Mississippi River Gulf Outlet, and others.[193] Although the project was federally authorized, it was a joint federal, state, and local effort with shared costs.[194]

[1] Exec. Order 12,148, 44 Fed. Reg. 43239, 3 C.F.R. at 412, (1979 Comp.).
[2] *See* Keith Bea, Cong. Res. Serv., Order No. RL 33064, *Organization and Mission of the Emergency Preparedness and Response Directorate: Issues and Options for the 109th Congress*, App. B: Evolution of Federal Emergency Authorities (Sept. 7, 2005) [hereinafter Bea, *Organizational Mission*].
[3] *See Id.* at App. B; U.S. Gov't Accountability Off., Pub. No. GAO/T-RCED-93-46, *Disaster Management: Recent Disasters Demonstrate the Need to Improve the Nation's Response Strategy* (May 25, 1993) [hereinafter GAO, *Recent Disasters*].
[4] *See* Keith Bea, Cong. Res. Serv., Order No. RL 31670, *Transfer of FEMA to the Department of Homeland Security: Issues for Congressional Oversight*, App. A: Summary of FEMA Authorities (Dec. 17, 2002) [hereinafter Bea, *Transfer of FEMA*].
[5] *See* U.S. Gov't Accountability Off., Pub. No. GAO/RCED-93-186, *Disaster Management: Improving the Nation's Response to Catastrophic Disasters* (July 23, 1993) [hereinafter Bea, *Disaster Management*].
[6] *See* Bea, *Transfer of FEMA*; GAO, *Disaster Management*.
[7] Homeland Security Act of 2002, Pub. L. No. 107-296, Title V, 116 Stat. 2135 (2002).
[8] *See* Bea, *Organization and Mission*; Federal Emergency Mgmt. Agency [hereinafter FEMA], News Release, *National Disaster Medical System* (Apr. 21, 2004) *available at* http://www.fema.gov/news/newsrelease.fema?id=11927 (last visited Jan. 21, 2006).
[9] *See* Bea, *Transfer of FEMA*.
[10] *See* FEMA, *A Guide to the Disaster Declaration Process* (undated) *available at* http://www.fema.gov/pdf/rrr/dec_proc.pdf (last visited Jan. 21, 2006).
[11] Interviews by Select Comm. Staff with City of New Orleans officials in New Orleans, LA (Nov. 3-10, 2005) [hereinafter Select Comm. New Orleans Interviews].
[12] *See* Elizabeth B. Bazan, Cong. Res. Serv., Order No. RL 33090, *Robert T. Stafford Disaster Relief and Emergency Assistance Act: Legal Requirements for Federal and State Roles in Declarations of an Emergency or a Major Disaster* (Sept. 16, 2005).
[13] Select Comm. New Orleans Interviews.
[14] Keith Bea, Cong. Res. Serv., Order No. RS 21227, *The Emergency Management Assistance Compact (EMAC): An Overview*, 2 (Feb. 4, 2005).
[15] *See Id.* at 1-5.
[16] *See Id.* at 1-2.; http://www.emacweb.org (last visited Jan. 21, 2006).
[17] Robert T. Stafford Disaster Relief and Emergency Assistance Act [hereinafter Stafford Act] 42 U.S.C. § 5122(1) (2005).
[18] *See* FEMA, *The Disaster Process and Disaster Aid Programs*, (Apr. 4, 2005) *available at* http://www.fema.gov/library/dproc.shtm (last visited Jan. 22, 2006) [hereinafter, FEMA, *Disaster Process*].
[19] Keith Bea, Cong. Res. Serv., Order No. RL 33053, *Federal Stafford Act Disaster Assistance: Presidential Declarations, Eligible Activities, and Funding*, 3-4 (Sept. 27, 2005).
[20] *See* FEMA, *Disaster Process* (FEMA allows that, when an obviously severe or catastrophic event occurs, Governors may request a major disaster declaration prior to conducting a damage assessment).
[21] *See* FEMA, *Disaster Process* (Specifically, FEMA provides three categories of disaster assistance: (1) individual assistance; (2) public assistance; and (3) hazard mitigation assistance. Individual assistance is a combined FEMA-State program that provides money and services to people in the affected area whose property has been damaged or destroyed and whose losses are not covered by insurance. Individual assistance from FEMA can consist of funds to rent temporary housing, grants to repair damage that is not covered by insurance, and grants for "necessary and serious needs" such as medical or funeral expenses. Individual assistance can also include federally subsidized loans from the U.S. Small Business Administration (SBA) to repair or replace homes, personal property or businesses that sustained damages not covered by insurance); See FEMA, *Disaster Process* at 4 (Public assistance funds, through grants or SBA loans, the repair, restoration, reconstruction or replacement of public facilities or infrastructure damaged or destroyed by a disaster. Eligible recipients include state and local governments and certain private nonprofit organizations, such as educational, medical, rehabilitation or permanent custodial care facilities. Recipients may use their public assistance funds for projects such as debris removal and repair of road systems, bridges, and/or water control facilities); *See* FEMA, *Disaster Process* at 4-5 (Hazard mitigation assistance supports measures to reduce or eliminate long-term risk to people and property from natural hazards and their effects. For eligible projects, the federal government pays up to 75 percent of the costs with states providing a 25 percent match. Eligible mitigation measures under this program include buying or relocating property located in high hazard areas (such as flood plains); elevating flood-prone structures; and, seismic rehabilitation of existing structures).
[22] *See* Directive on Management of Domestic Incidents, 39 WEEKLY COMP. PRES. DOC. 10 280 (Feb. 28, 2003) (Known as Homeland Security Presidential Directive/HSPD-5).
[23] *See* U.S. Dep't of Homeland Security, *National Response Plan* (Dec. 2004) at i [hereinafter *NRP*].
[24] *See* U.S. Gov't Accountability Off., Pub. No. GAO-05-652, *Homeland Security: DHS' Efforts to Enhance First Responders' All-Hazards Capabilities Continue to Evolve*, 11-12 (July 11, 2005) [hereinafter GAO: *DHS' Efforts to Enhance Capabilities*].
[25] *See NRP* at 1.
[26] *See Id.* at 11.
[27] DHS, *National Incident Management System*, 2 (Mar. 1, 2004) *available at* http://www.dhs.gov/interweb/assetlibrary/NIMS-90-web.pdf (last visited Jan. 22, 2006).
[28] *Id.* at ix, 1-4.
[29] *See NRP* at xi-xiii.
[30] *Id.* at 11.
[31] *See Id.* at ESF-i-iv.
[32] *Id.* at ESF#1-1-5.
[33] *Id.* at ESF#2-1-12.
[34] *Id.* at ESF#3-1-8.
[35] *Id.* at ESF#4-1-5.
[36] *Id.* at ESF#5-1-5.
[37] National Response Coordination Center (NRCC); Regional Response Coordination Center (RRCC); Joint Field Office (JFO).
[38] *NRP* at ESF#6-1-8.

[39] *Id*. at ESF#7-1-6.
[40] *Id*. at ESF#8-1-13.
[41] *Id*. at ESF#9-1-7.
[42] *Id*. at ESF#10-1-13.
[43] See *Id*. (Depending on whether an incident affects the inland or coastal zone, either EPA or DHS/USCG serves as the primary agency for ESF 10 actions. For incidents affecting both, EPA is the primary agency with DHS/USCG serving as the deputy).
[44] *Id*. at ESF#11-1-12.
[45] *Id*. at ESF#12-1-6.
[46] *Id*. at ESF#13-1-9.
[47] *Id*. at ESF#14-1-6.
[48] *Id*. at ESF#15-1-5.
[49] *See* GAO, *Recent Disasters* (The notion that FEMA distinguishes "catastrophic" disasters from other incidents and makes specific plans for a different, proactive response to them builds on its experiences, problems, and lessons learned in past disasters, particularly Hurricane Andrew in south Florida in 1992. In that disaster, FEMA was too reactive—waiting for state and local governments to identify what they needed and then ask for it—when the hurricane had clearly overwhelmed the ability of state, local, and voluntary agencies to adequately provide victims with essential services, such as food and water, within 12 to 24 hours. Summarizing its review of FEMA's response to Hurricane Andrew, GAO described the [then] federal strategy for responding to such disasters as deficient because it lacked provisions for the federal government to (1) immediately, comprehensively assess damages and the resulting needs of disaster victims and (2) provide food, shelter, and other essential services when victims' needs outstripped what state, local and voluntary agencies could themselves provide).
[50] *Id*. at 43.
[51] *NRP* at CAT-3.
[52] *See Id*. at CAT-1-3 (According to the catastrophic incident annex, DHS is developing a "more detailed and operationally specific NRP Catastrophic Incident Supplement" (CIS) to this annex. The supplement will be designated "For Official Use Only" and published independently of the NRP base plan and annexes. As of November 2005, DHS had not yet published the CIS); See Letter from Henry A. Waxman and Charlie Melancon, Members of Congress, to Michael Chertoff, Secretary of Homeland Security, Nov. 1, 2005 (on file with the Select Comm.) *available at* http://www.democrats.reform.house.gov/Documents/20051101103226-17173.pdf (last visited Jan. 22, 2006).
[53] *See NRP* at CAT-2 -4.
[54] *See Id*. at CAT-3 -5.
[55] *See Id*. at CAT-1.
[56] *Id*. at CAT-1.
[57] *Id*. at 3-4.
[58] *See* DHS, *Fact Sheet: Homeland Security Operations Center (HSOC)* (July 8, 2004) *available at* http://www.dhs.gov/dhspublic/display?theme=30 &content=3813 (last visited Jan. 22, 2006) [hereinafter HSOC Fact Sheet]. (Specifically, participants in the HSOC include the FBI, U.S. Coast Guard, Postal Inspection Service, CIA, U.S. Secret Service, DC Metropolitan Police Department, Defense Intelligence Agency, Federal Protective Service, New York Police Department, National Security Agency, Customs and Border Protection (DHS), Los Angeles Police Department, Immigration Customs Enforcement (DHS), U.S. Department of Energy, U.S. Environmental Protection Agency, Drug Enforcement Agency, U.S. Department of Interior (U.S. Park Police), U.S. Federal Air Marshal Service, Alcohol, Tobacco, and Firearms, U.S. Department of Defense, U.S. Department of State, U.S. Department of Transportation, U.S. Department of Veterans Affairs, National Capitol Region, Transportation Security Administration, National Geospatial Intelligence Agency, U.S. Department of Health and Human Services, FEMA, National Oceanic Atmospheric Administration, Public Affairs (DHS), State and Local Coordination Office, Science and Technology Directorate, Geo-spatial Mapping Office, Information Analysis Office, and the Infrastructure Protection Office).
[59] *NRP* at 24; *HSOC Fact Sheet.*
[60] See *NRP* at 70 (A National Special Security Event (NSSE) is a designated event that, by virtue of its political, economic, social, or religious significance, may be the target of terrorism or other criminal activity).
[61] *See Id*. at 22-23; *HSOC Fact Sheet*.
[62] *NRP* at 27-28, 91.
[63] *Id*. at 27-28, 40; Interview by Select Comm. staff with Michael Lowder, Deputy Director, Response Division, FEMA, in Washington, DC (Jan. 5, 2006).
[64] *NRP* at 28, 68.
[65] Stafford Act at § 5143(a).
[66] *NRP* at 4, 7.
[67] *Id*. at 34.
[68] *Id*. at 33-34.
[69] Joint Chiefs of Staff, Department of Defense, Joint Publication 3-26, *Homeland Security* [hereinafter Joint Chiefs, *Homeland Security*], (Aug. 2. 2005) at IV-4, *available at* http://www.dtic.mil/doctrine/jel/new_pubs/jp3_26.pdf (last visited Jan. 22, 2006).
[70] *NRP* at 42.
[71] Joint Chiefs, *Homeland Security* at IV-1.
[72] Steven Bowman et al., Cong. Res. Serv., Order No. RL 33095, *Hurricane Katrina: DOD Disaster Response* at 2 (Sep. 19, 2005). [Hereinafter *Katrina: DOD Response*]
[73] Department of Defense, Directive 3025.1, *Military Support to Civil Authorities* (Jan. 15, 1993).
[74] 32 U.S.C. § 901 (2005).
[75] Joint Chiefs, *Homeland Security* at vii, IV-10-IV-15; NRP at 37.
[76] Bowman, *Katrina: DOD Response* at 3, 4.
[77] Civil support for incidents in Hawaii and the Pacific territories is provided by U.S. Pacific Command.
[78] Joint Chiefs, *Homeland Security* at IV-12; Bowman, *Katrina: DOD Response* at 3, 4.

[79] Bowman, *Katrina: DOD Response* at 3, 4.
[80] Joint Chiefs, *Homeland Security* at IV-10-12.
[81] Lt. Gen. H. Steven Blum, Chief, National Guard Bureau, *Types of Duty*, 1 (undated) (on file with the Select Comm., No. MMTF 00415-05).
[82] *Id*.
[83] *Id*.
[84] Letter from Bob Riley, Governor of Alabama, to Donald Rumsfeld, Secretary of Defense (Sept. 2, 2005) (on file with the Select Comm.); Letter from Haley Barbour, Governor of Mississippi, to Donald Rumsfeld, Secretary of Defense (Sept. 4, 2005) (on file with the Select Comm.); Letter from Kathleen Babineaux Blanco, Governor of Louisiana, to Donald Rumsfeld, Secretary of Defense (Sept. 5, 2005) (on file with the Select Comm.); Memorandum from Gordon England, Deputy Secretary of Defense to Secretary of the Army and Acting Secretary of the Air Force (Sept. 7, 2005) (authorizing Title 32 status for Katrina Disaaster Relief activities, on file with the Select Comm.).
[85] Departments of the Army and the Air Force, Headquarters, Army Regulation 130-5 AFMD 10, *Organization and Functions of the National Guard Bureau* (Dec. 30, 2001).
[86] *Hearing on Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama before Select Comm.*, [hereinafter *Oct. 27, 2005 Select Comm. Hearing*] 109th Cong. (Oct. 27, 2005) (written response to questions for the record of Lt. Gen. H. Steven Blum).
[87] Chris Doane & Joe DiRenzo III, *Protecting Our Ports: A Coast Guard Operational Commander's Perspective of the Maritime Transportation Security Act of 2002 in* 2004 U.S. COAST GUARD: THE SHIELD OF FREEDOM, 124 (2004).
[88] District Eight, U.S. Coast Guard, *District Eight Facts*, *available at* http://www.uscg.mil/d8/d8facts.htm (last visited Jan. 26, 2006).
[89] *See* Debra Spar and James Dail, *Essays: The Democratic Accountability of Non-Governmental Organizations: Of Measurement and Mission: Accounting for Performance in Non-Governmental Organizations*, 3 Chi. J. Int'l L. 171, 180 note 1 ("Strictly defined, NGO stands for "non-governmental organization" and would thus include any group that does not fall under the purview of the government. Taken to the extreme, this would include private companies, religious congregations, and trade unions. For the most part, however, the term NGO is used to refer to organizations that (1) are tax exempt, (2) have a decisionmaking body separate from the government, (3) consist, at least in part, of volunteers and donations, (4) have a charter or mandate within a specific development arena, and (5) consist of a formal organization (in other words, are registered as organizations)".
[90] 36 U.S.C. § 300101 (2005).
[91] American Red Cross Museum, *History: The Federal Charter of the American Red Cross, available at* http://www.redcross.org/museum/history/charter.asp (last visited Jan. 22, 2006).
[92] *Id*.
[93] *Id*.
[94] American Red Cross, *2004 Corporate Annual Report, Introduction*, 4, *available at* http://www.redcross.org/pubs/#report (last visited Jan. 23, 2006).
[95] NRP at 3.
[96] *Id*. at 12, ESF #6-5.
[97] *Id*. at ESF #6-5.
[98] *Id*. at 2
[99] *Id*. at ESF #6-3.
[100] *Id*.
[101] American Red Cross, *Tropical Storm and Hurricane Action Plan*, 1 (undated) [hereinafter American Red Cross, *Storm Action Plan*].
[102] *Id*.
[103] American Red Cross, *American Red Cross Responsibilities Under the Federal Response Plan* (Aug. 2001) (Internal Red Cross planning document on file with the Select Comm.).
[104] American Red Cross, *Interim Shelter Operations Management Toolkit*, iii (Sept. 2005) (It is not clear to what extent this document was utilized in the Red Cross's response to Hurricane Katrina).
[105] American Red Cross *Storm Action Plan* at 2 ("The chapters serving the affected area provide the initial incident response in their respective communities, report their activities and assessments and are augmented by human and material resources and guidance, in a coordinated manner, from the service area or national headquarters").
[106] Interview by Select Comm. staff with Joseph C. Becker, Sr. Vice Pres., Preparedness and Response, American Red Cross in Wash., D.C. (Oct. 14, 2005) [hereinafter Oct. 14, 2000 Red Cross Interview].
[107] *Id*.
[108] American Red Cross, *Storm Action Plan* at 20 (chart entitled, "Hurricane Response Plan Routine Business Model Structure").
[109] *Id*. at 3.
[110] *Id*. at 3
[111] *Id*. at 4.
[112] *Id*. at 5.
[113] *Id*.
[114] Oct. 14, 2000 Red Cross Interview.
[115] American Red Cross *Storm Action Plan* at 3.
[116] *Id*. at 7.
[117] *Id*. at 9.
[118] *Id*. at 9-18.
[119] *Id*.
[120] *Id*. at 9.
[121] *Id*. at 9.
[122] *Id*. at 12.

[123] *Id.*
[124] *Id.*
[125] *Id.* at 15.
[126] *Id.* at 16.
[127] *Id.*
[128] *See NRP* at 6 (incidents typically managed at the lowest possible level), 8 (roles of local chief executive officer and governor), 15 (concept of operations); FEMA *supra* note 10; DHS *supra* note 27 at ("most incidents are managed locally"); Bazan *supra* note 12 (summary—federal resources supplement state and local).
[129] *See* GAO: *DHS' Efforts to Enhance Capabilities at* 7-8.
[130] Keith Bea, et al., Cong. Res. Serv., Order No. RL 32287, *Emergency Management and Homeland Security Statutory Authorities in the States, District of Columbia, and Insular Areas: A Summary*, 6 (Mar. 17, 2004) [hereinafter Bea, *Statutory Authorities*].
[131] *See* Emergency Management Assistance Compact, *Intrastate Mutual Aid Legislation*, *available at* http://www.emacweb.org/?150 (last visited Jan. 23, 2006) (for a list of states that have intrastate mutual assistance compacts).
[132] *See* Keith Bea, Cong. Res. Serv., Order No. RS 22235, *Disaster Evacuation and Displacement Policy: Issues for Congress*, 1-2 (Sept. 2, 2005) [hereinafter Bea, *Disaster Evacuation Policy*].
[133] *NRP* at 8.
[134] *See* Bea, *Disaster Evacuation Policy* 132 at 1-2.
[135] *See* Bea, *Statutory Authorities* at 4.
[136] *See* Bowman *Katrina: DOD Response* at 7-8.
[137] *See* Bea, *Statutory Authorities* at 10.
[138] *Id.* at 5-6.
[139] *See* Keith Bea, Cong. Res. Serv., Order No. RL 32678, *Louisiana Emergency Management and Homeland Security Authorities Summarized* (Sept. 2, 2005) [hereinafter Bea, *Louisiana Authorities*].
[140] *See* Keith Bea, Cong. Res. Serv., Order No. RL 32316, *Mississippi Emergency Management and Homeland Security Authorities Summarized* (Sept. 2, 2005) [hereinafter Bea, *Mississippi Authorities*].
[141] *See* Keith Bea, Cong. Res. Serv., Order No. RD 21777, *Alabama Emergency Management and Homeland Security Statutory Authorities Summarized*, 1-5 (Sept. 2, 2005) [hereinafter Bea, *Alabama Authorities*] (a third statute, the Emergency Interim Succession Act, applies when continuity of government operations come into question and provides for the succession of powers for legislators and officers of political subdivisions).
[142] *State Chief Executives Emergency Response: Hurricanes & Other Disaster Emergencies: State Of Alabama Experienc*e (on file with the Select Comm., Nos. 000659AL-000666AL).
[143] *Id.*
[144] Preparedness Division Technological Hazards Branch, S*tate of Alabama, State of Alabama Emergency Operations Plan* [hereinafter *AL Emergency Operations Plan*] 4-5 (Oct. 1, 2000).
[145] *Id.* at 2-3.
[146] Interview by Select Comm. Staff with Bruce Baughman, Director, State of Alabama Emergency Management Agency, in AL (Oct. 11-12, 2005).
[147] *See* Bea, *Alabama Authorities,* at 2.
[148] *See AL Emergency Operations Plan*.
[149] *Id.* at 1.
[150] *See* Bea, *Alabama Authorities* at 2.
[151] Miss. Code Ann. §§ 33-15-11 to 33-15-53 (2004).
[152] *Id.*
[153] *Id.* at § 33-15-2.
[154] *See* Bea, *Mississippi Authorities,* at 2.
[155] *Id.* at 5.
[156] The Disaster Improvement Grant Program Plans Sec., *Miss. Emergency Mgmt. Agency, Miss. Emergency Operations Plan, Volume II Miss. Comprehensive Emergency Mgmt. Plan*, p. Basic-2 (May 14, 199) (change log updated through Feb. 2003).
[157] Miss. Code Ann. § 33-15-11 (2004).
[158] *See* Bea, *Mississippi Authorities* at 1; Bea, *Alabama Authorities* at 4.
[159] *See* Bea, *Mississippi Authorities* at 2-3; Miss. Code Ann. § 33-15-7 (2004).
[160] *See* Bea, *Louisiana Authorities* at 1-3.
[161] Office of Homeland Security and Emergency Preparedness, State of Louisiana, *Emergency Operations Plan*, 7 (April 2005) [hereinafter *LA Emergency Operations Plan*].
[162] *Id.* at 7.
[163] *Id.* at 9.
[164] Louisiana Homeland Security and Emergency Assistance and Disaster Act , LA. REV. STAT. ANN. § 724 D (2003).
[165] *Id.* at §§ 724-725.
[166] *LA Emergency Operations Plan* at 1.
[167] Office of Emergency Preparedness, City of New Orleans, *Comprehensive Emergency Management Plan*, (2004) at 7 [hereinafter *N.O. Emergency Management Plan*].
[168] *Id.* at 4.
[169] *Id.*
[170] *Id.*
[171] *Id.* at 51.
[172] *Id.*
[173] *Id.*

[174] *Id*. at 54.
[175] *Id*. at 48.
[176] *Id*. at 50.
[177] *Id*.
[178] *N.O. Emergency Management Plan* at 45.
[179] *See* Eric S. Blake, et al., Tropical Prediction Center, U.S. Dep't of Commerce, NOAA Technical Memorandum NWS TPC-4, *The Deadliest Costliest, and Most Intense U.S. Tropical Cyclones from 1851 to 2004 (and Other Frequently Requested Hurricane Facts* Aug. 2005) *available at* http://www.nhc.noaa.gov/paststate.shtml (last visited Jan. 24, 2006).
[180] *See* National Hurricane Center, *Hurricane Preparedness: Storm Surge, available at* http://www.nhc.noaa.gov/HAW2/english/storm_surge.shtml (last visited Jan. 24, 2006).
[181] *See* National Hurricane Center, *Hurricane Preparedness: Inland Flooding, available at* http://www.nhc.noaa.gov/HAW2/english/inland_flood.shtml (last visited Jan. 24, 2006).
[182] Anu Mittal, U.S. Gov't Accountability Off., Pub. No. GAO-05-1050T, *Testimony Before the Subcommittee on Energy and Water Development, Committee on Appropriations, House of Representatives, Army Corps of Engineers: Lake Pontchartrain and Vicinity Hurricane Protection Project*, 2 (Sept. 28, 2005); R.B. Seed, et al., U. of Calif. At Berkely and Am. Soc'y of Civil Engineers, Rept. No. UCB/CITRIS – 05/01, *Preliminary Report on the Performance of the New Orleans Levee System in Hurricane Katrina on August 29, 2005*, 1-4 (Nov. 2, 2005) (support for subsidence); IEM, Inc., IEM/TEC04-070 r5, Southeast Louisiana Catastrophic Hurricane Functional Plan, 5 (Jan. 5, 2005) [hereinafter IEM, *Southeast Louisiana Hurricane Plan*] (support for "bowl" topography "Hurricane Pam").
[183] IEM, *Southeast Louisiana Hurricane Plan* at 5; *Hearing on Hurricane Katrina: Who's In Charge of the New Orleans Levees? Before Senate Comm. on Homeland Security and Governmental Affairs* [*Dec. 15, 2005 Senate Hearing*], 109th Cong. (Dec. 15, 2005) (written statement of Max. L. Hearn, Executive Director, Orleans Levee District) at 1.
[184] New Orleans District, U.S. Army Corps of Engineers, *Un-Watering Plan Greater Metropolitan Area, New Orleans, Louisiana*, 1 (Aug. 18, 2000) (While we use the term "sea level," the technical measurement used by the Corps is National Geodetic Vertical Datum (NGVD) which was developed by observing the mean sea level height at various locations around North America).
[185] New Orleans District, U.S. Army Corps of Engineers, *NGVD Datum Plane* (Apr. 15, 2005) *available at* http://www.mvn.usace.army.mil/pao/response/NGVD.asp (last visited Jan. 25, 2006).
[186] Mittal, *Testimony* at 2.
[187] See FEMA, Disasters: Louisiana Severe Storm, Flooding Declared May 10, 1995, *available at* http://www.fema.gov/news/event.fema?id=2250 (last visited Jan. 25, 2006).
[188] Mittal, *Testimony* at 2.
[189] Richard D. Knabb, et al., National Hurricane Center, Dep't of Commerce, *Tropical Cyclone Report: Hurricane Katrina 23-20 August 2005*, 11, (Dec. 20, 2005); Mittal, *Testimony* at 2.
[190] *Dec. 15, 2005 Senate Hearing* (written statement of Max. L. Hearn, Executive Director, Orleans Levee District at 2); R.B. Seed, et al. at 1-3.
[191] Mittal, *Testimony* at 2.
[192] Flood Control Act of 1965. Pub. L. No. 89-298, § 204, 79 Stat. 103, 1077 (1965) (The Flood Control Act of 1965 authorized this project).
[193] *Dec. 15, 2005 Senate Hearing* (written statement of Col. Richard P. Wagenaar) at 1-2; Mittal, *Testimony* 182 at 3; The Industrial Canal is also known as the Inner Harbor Navigation Canal.
[194] Interview by Select Comm. Staff with David Pezza, U.S. Army Corps of Engineers, (Dec. 9, 2005); Mittal, *Testimony* at 3.

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"Preparing for an event like Hurricane Katrina or any natural disaster, we should never feel like we are completely prepared. We can always do better."

Robert R. Latham Jr.
Executive Director,
Mississippi Emergency Management Agency
Select Committee hearing, December 7, 2005

PRE-LANDFALL PREPARATION AND KATRINA'S IMPACT

As Hurricane Katrina entered the Gulf of Mexico, Gulf coast states and the federal government prepared for landfall in the region.

Pre-landfall preparation by FEMA

The Federal Emergency Management Agency (FEMA) positioned an unprecedented number of resources in affected areas prior to Katrina's landfall. Indeed, FEMA's efforts far exceeded any previous operation in the agency's history. A staggering total of 11,322,000 liters of water, 18,960,000 pounds of ice, 5,997,312 meals ready to eat (MREs), and 17 truckloads of tarps were staged at various strategic locations in and near the Gulf region prior to Katrina's landfall.[1] FEMA also pre-positioned 18 disaster medical teams, medical supplies and equipment, and nine urban search and rescue task forces (US&R) and incident support teams.[2] Rapid Needs Assessment Teams also were deployed to Louisiana on the Saturday before landfall.[3] In Louisiana alone, on August 28, a total of 36 trucks of water (18,000 liters per truck) and 15 trucks of MREs (21,888 per truck) were pre-staged at Camp Beauregard.[4]

FEMA's Hurricane Liaison Team, which consists of FEMA, the National Weather Service, and state and local emergency management officials and is tasked with coordinating closely with FEMA Headquarters staff by phone and video conferencing systems, was activated and deployed to the National Hurricane Center on August 24 in anticipation of Hurricane Katrina's making landfall.[5] FEMA's Mobile Emergency Response Support detachments were pre-positioned in Louisiana, Mississippi, and Alabama to provide emergency satellite communications capability.[6] According to former FEMA Director Michael Brown, prior to landfall, FEMA reached out to other agencies for assistance, such as the Department of Defense (DOD) for potential movement of strategic airlift support.[7]

By 10 a.m. on Monday, August 29, the morning Katrina made landfall, 31 teams from the National Disaster Medical System (NDMS) had been deployed to staging areas in Anniston, Alabama; Memphis, Tennessee; Houston, Dallas; and New Orleans, including 23 Disaster Medical Assistance Teams.[8] The teams, trained to handle trauma, pediatrics, surgery, and mental health problems, brought truckloads of medical equipment and supplies with them. By September 1, 72 hours after landfall, FEMA had deployed more than 57 NDMS teams and 28 US&R teams with nearly 1,800 personnel to save lives and render medical assistance. FEMA had also supplied generators and thousands of cots and blankets.[9]

Pre-landfall preparation in Mississippi

Preparations for Hurricane Katrina in Mississippi involved an array of actions, including county and state preparedness and disaster response training in the months leading up to the storm; the establishment of local, state, and federal command structures by way of emergency proclamations; activation of emergency operations centers (EOCs); evacuations, many of them mandatory, of the areas and types of homes most in danger from a hurricane; and, the opening of emergency shelters to which those evacuating could flee. Preparation by the military in Mississippi largely took place through activation of the state's National Guard and some initial requests for Emergency Management Assistance Compact (EMAC) assistance with security, engineering support, and helicopters.

Following a request from Governor Haley Barbour, on Sunday, August 28, President Bush issued an emergency declaration for Mississippi.[10] Following a further request from Barbour, on Monday, August 29, President Bush declared a major disaster in Mississippi.[11]

Disaster preparedness training — Mississippi

For several years, Mississippi's Emergency Management Agency (MEMA) has been using federal emergency preparedness grant funds to improve its counties' abilities to prepare for and respond to disasters. In 2000, 43 of Mississippi's 82 counties had active county emergency management programs; MEMA used DHS emergency

management performance grant funds, including a $1.3 million allocation in fiscal year 2005, to increase this to 79 active county programs in 2005.[12] In addition, the MEMA reported that, as of early 2005, over 1,200 first responders had received training in the National Incident Management System (NIMS).[13]

During the summer of 2005, the director of MEMA, Robert Latham, his key staff, and most of Mississippi's county emergency management directors underwent training in NIMS and the NIMS Incident Command System (ICS).[14] At approximately the same time, the FEMA officials who would later lead the federal response in Mississippi (Bill Carwile and Robert Fenton) also participated in extensive ICS training. Fenton was described by Carwile as having been involved for a long time in developing training for subjects such as the ICS and as an expert in how to adapt it for large scale operations, such as the response to Katrina. Carwile and Latham said they believe their training in the ICS and the ability it gave them to quickly establish a unified command were positive elements of the state's preparation for and response to Katrina.

Establishment of command structures in Mississippi

Mississippi issued its first Hurricane Katrina situation report on August 23 and, through Thursday, August 25, continued monitoring the storm.[15] According to this situation report, during these three days, MEMA conducted executive planning sessions to develop an EOC activation timeline as well as plans for protective actions and a proactive response.[16] It also established contact with a FEMA logistics cell and began encouraging the public to prepare for the storm.

On Friday, August 26, Mississippi activated its National Guard, and MEMA activated its EOC on Saturday, August 27.[17] At that time, it also deployed County Liaisons to six counties (Jackson, Harrison, Hancock, Pearl River, Stone, and George) and activated its State Emergency Response Team (SERT) for deployment to Camp Shelby the next day, August 28. The SERT established forward operations at Camp Shelby at 3 p.m. on August 28. According to the MEMA Director's brief, as of about 7 p.m. on August 28, 18 counties and 11 cities and towns had issued local emergency proclamations; by early morning of August 29, this had increased to 41 counties and 61 cities and towns.[18]

FEMA's liaison arrived at the state's EOC on Saturday, August 27. FEMA's Emergency Response Team-A (ERT-A) arrived the same day, August 27, when the state activated its EOC.[19] On August 28, MEMA reported that FEMA was deploying resources to a Regional Mobilization Center in Selma, Alabama, and that FEMA's ERT-A would be able to supply large quantities of water and ice to the hardest hit areas.[20]

Evacuations in Mississippi

Although the governor could order mandatory evacuations, longstanding practice in Mississippi rests that authority with local governments.[21] However, the state is generally included in any discussions about evacuation orders because, once a city or county chooses to make such an order, state responsibilities for managing traffic (including contra flow) and opening shelters can come into play.[22] In preparing for Hurricane Katrina, the state worked through the MEMA liaisons it dispatched to the counties along or near the Gulf coast as well as a representative it had stationed in Louisiana's EOC (because of contra flow agreements between Mississippi and Louisiana that provide for evacuations out of southeast Louisiana through Mississippi).

AP PHOTO/ROGELIO SOLIS

Emergency shelters—Mississippi

On August 27, MEMA urged Mississippi's coastal counties not to open local shelters in order to encourage people to evacuate north.[23] MEMA described coastal county shelters as an option of "last resort." On Sunday, August 28, MEMA reported that Red Cross shelters were open and on standby in the coastal counties.

Mississippi began opening shelters as early as August 28. MEMA reported 51 shelters open with 475 persons registered at that time and 36 additional shelters available on standby as needed.[24] In addition, MEMA indicated the Jackson Coliseum had been open as a shelter (and individuals were authorized to bring pets) and three special needs shelters had been established.[25] According to the Director's brief, also on August 28, MEMA reported the Red Cross had begun opening shelters that morning, bringing the total available shelters to 68 prior to the opening of the Jackson Coliseum.[26]

By August 29, just prior to landfall, MEMA reported 57 shelters were open with 7,610 persons registered in them. An additional 31 shelters were available on standby to open based on need.[27] The Jackson Coliseum opened as expected the day before and by early morning August 29 was reported by MEMA to be at capacity. Similarly, all Red Cross central Mississippi shelters were reported to be full as of 4:30 a.m. on August 29.[28] Two additional special needs shelters opened, bringing their total to five.[29]

Military preparation in Mississippi

Military preparation in Mississippi began as early as August 26 when, as noted earlier, the Governor activated the state's National Guard.[30] Mississippi's National Guard has over 12,000 troops, with Army and Air National Guard components, both under the direction of the Adjutant General (TAG), Major General Harold A. Cross.[31] Throughout the preparation and response to Katrina, Mississippi's Guard reported to and received taskings (or mission assignments) from MEMA.[32] The Mississippi National Guard has an Operations Plan, (OPLAN MSSTAD) on top of MEMA's Comprehensive Emergency Management Plan, that was used during Hurricane Katrina.[33] Refined and updated in an order issued to Mississippi Guard on June 1, 2005, this operations plan was validated during Hurricane Dennis, July 7 to 10, 2005.[34]

On August 27, Mississippi's Guard accelerated its preparations by alerting state emergency personnel to assemble for hurricane operations on the Mississippi Gulf coast under Joint Task Force Magnolia.[35] In doing so, Mississippi's National Guard assembled and pre-positioned at all three coastal county EOCs its special "hurricane strike" squads; each squad consisted of 10 military police (MPs), 15 engineers and five trucks.[36] In addition, the Guard placed on alert the following units from throughout the state:

223rd EN BN – Camp McCain, MS (Grenada, MS)
890th EN BN – Home Station Armories (located in the coastal region)
112th MP BN – Camp Shelby, MS (Hattiesburg, MS)
367th MAINT. CO – Home Station (Philadelphia, MS)
1687th TRANS CO – Home Station (Southaven, MS)
1387th QM WATER - Home Station (Leland, MS)
210th FINANCE – Home Station (Jackson, MS)
172nd AW – Home Station (Jackson, MS)
186th ARW – Home Station (Meridian, MS)[37]

Cross noted that these assets "were sufficient for a Category II storm, but as Katrina approached the Gulf coast on August 28, it became apparent that additional forces from outside the state would be required."[38] As a result, that afternoon, he initiated requests for assistance via the EMAC. The first such request, relayed to the on-site National Guard Bureau Liaison Officers (LNO) was for an additional MP Battalion, two more Engineering Battalions, and 3 CH-37 helicopters.[39] That same day, August 28, the National Guard Bureau Joint Operations Center in Washington, D.C., sent LNOs to Mississippi, with the first going to Mississippi's Joint Force Headquarters, followed by officers sent to the three coastal county EOCs and to MEMA's Operations Cell to facilitate out of state National Guard assets.[40]

In addition, Cross established at Gulfport a Forward Operations Center that eventually combined state and federal (including active duty) logistics support personnel.[41] In response to questions regarding the Guard's preparations, including the EMAC assistance it received, Cross said, "This greatly assisted in the command and control and situational awareness of all operations. As forces flowed into the state, more liaison teams were established in each county EOC that had Guard operations

in that county. This was a very efficient system since the National Guard headquarters was linked directly with each county for coordination of relief efforts."[42]

The Guard's preparation in Mississippi was not, unfortunately, without incident. Prior to the storm's landfall, Sgt. Joshua Russell, Detachment 1, Company A, 89th Engineers, was killed when attempting to rescue an elderly couple in Harrison County.[43]

Pre-landfall preparation in Alabama

Final preparation for Katrina in Alabama began in earnest four days prior to landfall when it became evident the path of the storm pointed towards the Gulf coast. Three days prior to landfall, the Governor's staff participated in frequent videoconference calls with personnel from FEMA, the National Hurricane Center, including its director Max Mayfield, senior staff at the White House, and senior staff from the Governors' offices from Louisiana and Mississippi.[44] The Governor's staff indicated they were satisfied with the federal support they received and that Max Mayfield's briefings were particularly valuable.[45]

In Alabama's southernmost counties, Baldwin and Mobile, preparations began five days before the storm, when they started regular consultations with the National Hurricane Center, the State of Alabama Emergency Management Agency, and the National Weather Service in Mobile to discuss the storm's likely path and strength.[46] Information was then disseminated to all local officials and first responders and staff prepared to activate the EOCs.[47]

On August 28, 2005, Governor Riley wrote to President Bush, asking that he "declare an emergency disaster declaration for the State of Alabama as a result of Hurricane Katrina beginning on August 28, 2005 and continuing."[48] That same day President Bush "declared an emergency . . . for the State of Alabama."[49]

The next day, Monday, August 29, Riley wrote to President Bush again, this time asking him to "declare an expedited major disaster . . . as a result of Hurricane Katrina beginning on August 28, 2005 and continuing."[50] That same day, President Bush issued a major disaster declaration for Alabama."[51]

Establishment of command structures in Alabama

On Friday, August 26, Riley declared a state of emergency to handle what was then thought would be a surge of evacuees from the Florida panhandle. The state went into what they call Level II response and expected to receive 10 to 15 percent of Florida's evacuees.[52] A Level II response activates the Alabama EOC on a 24-hour basis, and all relevant agencies are activated and necessary personnel are assigned to staff the EOC.

One day later, on Saturday, August 27, a Level I response was activated.[53] The EOC was operating in full force, with desks staffed for each ESF. A FEMA Emergency Response Team - Advance (ERT-A) was on site late in the day. An ERT-A team is a small FEMA contingent with capabilities for planning, operations, communications, and logistics. A total of five to eight people from the Atlanta-based FEMA region IV were on site at the EOC. The Alabama Emergency Management Agency (AEMA) expressed some frustration with FEMA's late arrival. AEMA officials believed that had FEMA been on site sooner with a larger contingent, Alabama may have been able to acquire needed resources and commodities more quickly.

President Bush spoke to Riley on Saturday, August 27, two days prior to landfall, to ensure the Governor had everything he needed. The Governor's staff indicated they felt they were better prepared for Katrina than they were for Hurricanes Dennis and Ivan.[54] In addition to implementing many of the lessons learned from previous hurricanes, the Governor's staff believes one key element of the state's response to Katrina was the state's proactive communications strategy.

On Friday, August 26, as the storm gathered in the Gulf, the Governor personally visited all of the counties in the Gulf, holding numerous press conferences to urge local residents to evacuate pursuant to the mandatory evacuation orders.[55] In Alabama, the failure to obey a mandatory evacuation order is a misdemeanor enforced by county or municipal police.[56]

The Alabama EOC is divided into five clusters of desks, and each desk is equipped with computers, telephony and other management tools.[57] The five clusters are:

- emergency services (ESF #s 1, 2, 3, 4, 9, 13)
- human services (ESF #s 6, 8, 11)
- infrastructure and support (ESF #s 10, 12)
- operations support (ESF #s 14, 15) and
- information and planning (ESF #s 5, 7).

There is a station for each ESF function and stations for all of the involved agencies, federal and state, including FEMA, EMAC, Army Corps of Engineers, National Guard, Alabama State Police, among others.[58]

One of the tools Alabama uses to respond to local disaster needs is the EM-2000 incident log, a Lotus Notes-based system which captures, in log book fashion, emergency events and requests from each of the 67 counties.[59] Each activity or request logged into the system gets assigned to one of the desks in the EOC for attention. If a report comes in regarding individuals who are trapped and in need of rescue, the event will be assigned to the personnel in the emergency services cluster. Multi-ESF teams involving state police (ESF #13), transportation (ESF #1), and urban search and rescue (ESF #9) huddle to coordinate the optimal response. Events can be reported and tracked by ESF, by status, by county, and by a number of other custom data elements. Documents related to information requests, as opposed to action requests, are later scanned and attached. The EM-2000 data files appear to serve as the central universe of actions and documents related to the state's response to the storm.

AP PHOTO/DAVE MARTIN

Applying the lessons learned from Hurricane Ivan, the state upgraded the tracking system used to determine hospital bed vacancies, giving state officials real-time visibility of surge capacity and making it possible to better direct those with special medical needs to appropriate sites.[60] The state health office also has the capability to conduct daily conference calls with county health staff to assess status and needs. Health officials staff their own emergency operations center, linked by computer and phone to the main state EOC in Clanton.

Evacuations in Alabama

Even before any evacuations began, AEMA and state transportation officials participated in the FEMA regional Evacuation Liaison Team conference calls, during which emergency managers from Florida, Louisiana, and Mississippi shared information on the status of evacuation routes, road closures, traffic volumes, hotel availability, and other interstate implications of significant population migrations in the region.[61]

On the morning of August 29, Shelby County, Alabama, posted a message on the statewide EM2000 system saying the "Shelby County Humane Society will house animals during the emergency. Can house small animals as well as farm animals for a short duration."[62] More than 50 pets were evacuated from Mississippi and brought to Maxwell Air Force Base, where they were taken in by families on the base until the pet owners could be located.[63]

Pre-landfall preparation in Louisiana

On Saturday, August 27, Louisiana Governor Blanco wrote to President Bush, requesting that he "declare an emergency for the State of Louisiana due to Hurricane Katrina for the time period beginning August 26, 2005, and continuing."[64] Later that same day, President Bush declared an emergency for the state of Louisiana.[65] William Lokey was named Federal Coordinating Officer.[66]

On Sunday, August 28, in recognition of the potential catastrophic impact of Hurricane Katrina, Blanco asked President Bush, prior to landfall, to "declare an expedited major disaster for the State of Louisiana as Hurricane Katrina, a Category V Hurricane approaches our coast . . . beginning on August 28, 2005 and continuing."[67] The next day, President Bush declared a major disaster for Louisiana.[68]

Establishment of command and safeguarding of assets

The State of Louisiana took a number of steps to prepare for the arrival of Hurricane Katrina, including getting the EOC up and running with its full staff complement by the afternoon of Friday, August 26.[69] The EOC conducted communications checks with all the state agencies and parishes on Thursday, August 25 – four days before landfall.[70]

The state EOC then began holding regular conference calls with all state agencies, key parishes, federal agencies, other states, and the Red Cross to coordinate pre-landfall activities among all the different authorities.[71] These calls began at 5:00 p.m. on Friday, August 26, with five calls on Saturday, four calls on Sunday, and a final call Monday morning as the storm hit but before communications went out. In addition, several state agencies moved key assets northward, stockpiled critical supplies, positioned teams to do post-landfall damage assessments, or otherwise prepared for the hurricane.[72] The Louisiana Department of Fish and Wildlife coordinated with the Louisiana National Guard in advance to get boats placed on trailers and pre-positioned at Jackson Barracks in New Orleans in anticipation of flooding and the need for waterborne search and rescue.[73]

There were also preparations at the parish level. As noted, the parishes participated in conference calls with the state. Plaquemines Parish, one of the southern parishes most exposed to the storm, parked vehicles on high ground, gathered administrative records and moved them north, transferred prisoners to upstate facilities, and set up an emergency command post in a local high school.[74] Jefferson Parish, part of metropolitan New Orleans, also took a number of preparatory steps. According to Emergency Management Director Walter Maestri, they implemented their "Doomsday Plan" to hunker down in their EOC with a skeleton crew to minimize the number of people exposed to the hurricane's damage.

The Louisiana National Guard (LANG) and other state agencies went on alert and began staging personnel and equipment.[75] By Saturday, August 28, the day prior to landfall, the LANG had pre-positioned 9,792 MREs and 13,440 liters of water at the Superdome, the "shelter of last resort." The state also had positioned teams north, out of harm's way, prior to landfall, and the first requests for EMAC teams were issued as well.

On Saturday, August 28, the New Orleans Regional Transit Authority (RTA) fueled up its fleet based at its Eastern New Orleans facility and moved buses not providing service to higher ground on a wharf near downtown New Orleans.[76] Buses that were providing regular service were also eventually moved to the wharf as well.

Evacuations in Louisiana

The state was actively involved in executing the Southeast Louisiana evacuation plan, with the Department of Transportation and Development and the Louisiana State Police working to manage traffic and implement "contraflow" — making all highway lanes outbound to maximize traffic flow and minimize traffic jams.[77] The Governor was personally involved in monitoring contraflow, which ran from Saturday at about 4:00 p.m. to Sunday at about 6:00 p.m.[78]

State officials coordinated the contraflow with the states of Mississippi and Texas, since Louisiana interstates fed into these states.[79] In a conference call at 6:30 a.m. Saturday morning, it was recommended that the evacuation plan for southeast Louisiana be implemented.[80] The state began staging assets necessary to execute an evacuation, including alerting and activating National Guard troops, pre-deploying traffic cones and barriers to key locations, and coordinating plans among all of the parishes.[81] Some parishes had already begun evacuation proceedings. By 6:00 p.m. on Sunday, August 28, traffic was light, so contraflow was halted, but residents could still evacuate on the outbound lanes once the highways were returned to their normal configuration.[82]

Up to 1.2 million Louisiana residents followed the evacuation orders and evacuated themselves in their private vehicles.[83] However, it later became apparent that thousands of residents, particularly in New Orleans, did not evacuate or seek shelter, but remained in their homes.

The parishes began declaring evacuations on Saturday, August 27 at 9:00 a.m. These declarations had been coordinated among the state and parishes in advance as part of Louisiana's emergency evacuation plan, which calls for the most southern parishes to evacuate first so that, as

AP PHOTO/CHERYL GERBER

they drive north, they do not encounter traffic bottlenecks in New Orleans or Baton Rouge.[84] While some parishes (e.g., Plaquemines and St. Charles) began the process with "mandatory" evacuation orders, most parishes began with "recommended" evacuation orders and upgraded these to "mandatory" orders later on Saturday or Sunday.[85] Some of the parishes farther north (e.g., St. Tammany, Tangipahoa) declared mandatory evacuation orders only for residents living in low lying areas or manufactured homes.[86]

Some parishes also asked nongovernmental organizations to help evacuate those residents that did not have their own vehicles. Both New Orleans and Jefferson Parish have a program called "Brother's Keeper" run by the parishes in conjunction with local churches and the Red Cross. According to Maestri, the parish had a phone bank in the EOC manned by volunteers that help take the calls and match up riders with drivers once the evacuation was announced.[87] By Sunday evening, most of the parishes reported empty streets and had declared dusk-to-dawn curfews.[88]

Emergency shelters in Louisiana

Louisiana also set up shelters as part of its evacuation plan. A "Sheltering Task Force" led by the Department of Social Services and the Department of Health and Hospitals, coordinated its activities with the state EOC and parishes through the aforementioned conference calls.[89] Specific shelters were designated along the main evacuation routes, including both general population shelters and special needs shelters.[90] These efforts were coordinated with both Mississippi and Texas, which set up shelters once Louisiana shelters began to fill.[91]

Several parishes also established "shelters of last resort" for residents that could not evacuate or had delayed leaving. Parish officials Ebbert and Maestri told Select Committee staff they purposefully designate these shelters at the last minute so people will not use them as an excuse to avoid evacuation.[92] New Orleans, which had already designated the Superdome as a shelter for the special needs population, also designated that facility as a "shelter of last resort" on Sunday, August 28.[93] The Louisiana National Guard pre-positioned 9,792 MREs and 13,440 liters of water at the Superdome.[94] Also in New Orleans, the RTA began running special service from 12 sites across the city to take riders to the Superdome.[95] The RTA also ran at least 10 paratransit vehicles to the Superdome and then on to the Baton Rouge area for "special needs" citizens; each of these vehicles made at least two trips.[96] All service ceased at approximately 7:00 p.m. Sunday night, approximately 11 hours before Katrina was due to make landfall and as conditions worsened.[97] Jefferson Parish also designated four facilities as "shelters of last resort."[98] According to Maestri, unlike the Superdome, these locations in Jefferson Parish did not have any prepositioned medical personnel or supplies but they did have pre-positioned food and water.

Pre-landfall preparations by DOD, the National Guard, U.S. Army Corps of Engineers, and U.S. Coast Guard

DOD

In preparation for the last part of the 2005 hurricane season, the Secretary of Defense approved a standing order on August 19 that allowed the commander, U.S. Northern Command, to use military installations and

deploy Defense Coordinating Officers (DCO) as needed to coordinate directly in support of FEMA in affected states. As the force provider to Northern Command, the U.S. Joint Forces Command issued general instructions on August 20 on how it would task units in support of any Northern Command requests to support FEMA.[99]

On August 23, Northern Command began tracking the tropical depression that became Hurricane Katrina. On August 24, the Office of the Secretary of Defense (OSD), Northern Command, and the National Guard Bureau participated in a teleconference with FEMA on what would be needed to respond to Katrina. Joint Forces Command issued a warning order to military services to be ready to support requests for assistance. Northern Command issued a similar warning order on August 25, the day Katrina struck Florida as a category 1 storm.[100]

On August 26, Northern Command issued an execute order, setting initial DOD relief actions into motion. The initial response was focused on Florida, but DCOs were also activated for Georgia, Alabama, and Mississippi.[101]

On August 27, Northern Command received its first mission assignment from FEMA, to provide Barksdale Air Force Base in Louisiana as a federal operational staging area. The same day, the Corps of Engineers positioned teams and supplies in Alabama, Louisiana, and Mississippi. In New Orleans, the commander of the Corps' New Orleans District evacuated most of his staff to alternate locations to be ready to respond when the storm passed. Other active military units ordered similar evacuations of personnel and equipment. In addition, the Louisiana National Guard aviation officer requested helicopter support from the National Guard Bureau, and support was coordinated through the EMAC.[102]

On August 28, DCOs were deployed to Mississippi and Louisiana. Northern Command took several additional steps to organize military assets that might be needed, including deployment of Joint Task Force-Forward (eventually Joint Task Force-Katrina) to Camp Shelby, Mississippi and a general alert to DOD assets potentially needed, particularly aviation assets.[103]

On the day Katrina made landfall, August 29, the Deputy Secretary of Defense led an 8:30 a.m. meeting to get damage assessment for DOD facilities and review resources that might be required from DOD to support hurricane relief. The Secretary of Defense was briefed on DOD's readiness and Northern Command issued several more alerts in anticipation of requests for assistance.[104]

National Guard

At the beginning of each hurricane season, National Guard Bureau (NGB) personnel participate in an interagency conference to assess potential response shortfalls and identify potential solutions that could be resolved through EMAC requests.[105] NGB planners conducted this EMAC conference in the spring of 2005 with participants from Alabama, Arkansas, Florida, Georgia, Louisiana, Maryland, Michigan, Mississippi, North Carolina, New York, and South Carolina. The Joint Staff J3 Joint Director of Military Support (JDOMS) also participated. The participants in these conferences believe that EMAC is capable of providing most military capabilities needed by states for hurricane disaster relief operations.

The role of the NGB grew in preparation for Guard response to Hurricane Katrina. On August 24, it issued an executive order calling on its Joint Staff to provide proactive planning and staffing support to states potentially affected by then-tropical storm Katrina. NGB Liaison Teams (LNOs) were sent to Alabama, Mississippi, and Louisiana.[106] On Wednesday, August 24, the first teleconference between NORTHCOM, the Joint Staff, Guard Headquarters, and FEMA was held to discuss DOD support to federal authorities.

The Joint Operations Center at the NGB geared up as the operations center for Katrina response.[107] The heads of the Army and Air National Guard also use this center for coordination of effort. During Hurricane Katrina preparation and response, the Joint Operations Center provided daily intelligence updates, logs of current operations, daily teleconferences, and coordination with states on logistical assistance; maintained communications with states and other agencies; and, coordinated Guard aviation assets.

On August 25, the NGB began hosting daily teleconferences with the operations officers of the Gulf states' Adjutant Generals. The Adjutant Generals reported their preparations to respond, and were asked if they needed out of state assistance.[108] Some of them had already contacted or were contacted by other nearby states to arrange for assistance via the EMAC in the form of personnel and equipment that might be needed.[109]

On Sunday, August 28, reports into NGB by state Adjutant Generals indicated that 4,444 Army National Guard and 932 Air National Guard in Florida, Alabama,

Mississippi, and Louisiana were ready to respond. Both General Bennett C. Landreneau of Louisiana and Cross of Mississippi requested additional aircraft from EMAC via NGB.[110] Consequently, these requests were considered state-to-state requests for assistance, not federal requests involving FEMA or OSD, even though NGB facilitated the assistance. On Monday, August 29, NGB noted that 65 Army National Guard aircraft were in position in Florida, Alabama, Texas, Louisiana, and Mississippi.

Louisiana National Guard

The Louisiana National Guard is an integral part of managing emergencies in the state. The Adjutant General, Landreneau, wears two hats, as he is head of both the National Guard and the Louisiana Office of Homeland Security and Emergency Preparedness (LOHSEP).[111] The National Guard plays a significant role in emergency command and control because of the dual role of the Adjutant General. Also, many of the personnel who staff the state's EOC are guardsmen.

On Friday, August 26, Blanco authorized the mobilization of 2,000 Louisiana guardsmen.[112] The next day, Landrenau called an additional 2,000 to active duty.[113] By the end of the day on Saturday, 3,085 Louisiana National Guard troops had been fully activated. Coordination also began with other states for additional aviation assets for search and rescue and EMAC support, if needed.

AP PHOTO/DAVE MARTIN

Before Katrina hit, Louisiana National Guard soldiers screen residents entering the Superdome.

The Louisiana National Guard participated in a number of preparation missions, including law enforcement, traffic control, shelter support and security, and securing operations at the Superdome.[114] Many guardsmen were also embedded with state and parish officials and later used their radios to help these officials reestablish some minimal level of communications.[115] Before Katrina hit, guardsmen provided support for general purpose shelters and special needs shelters by providing medical personnel.[116]

Alabama National Guard

The Alabama National Guard has 13,200 troops, with Army and Air National Guard components falling under its Adjutant General, Major General Mark Bowen.[117] The Adjutant General is also a member of the Governor's Cabinet, but is not dual-hatted as the emergency response coordinator. Although he participates in the state's EOC, Bowen's chain of command is a direct line to the governor. The Alabama Guard has developed and is organized around mission-oriented joint force packages, (i.e., hurricanes, snow and ice storms). Task forces typically include security forces, engineers, medical, communications, special operations forces, logistics and a command and control cell. Alabama also has a voluntary state militia that is administered by the National Guard. They are used to augment the Guard force and have approximately 2,000 to 3,000 members.

During the Alabama National Guard's preparation phase, which began six days before Katrina hit, Guard assets monitored the storm track and began discussions with the NGB.[118] By August 26, Riley ordered 3,000 Alabama National Guard soldiers and airmen to state active duty and requested Secretary of Defense approval of 180 days of military duty.[119] Approval was granted by DOD on September 7 and was retroactive to August 29.[120]

Two days before the storm, a National Guard liaison officer was dispatched to the state EOC in Clanton.[121] On August 28, two National Guard Task Forces were formed, gathered pre-positioned supplies (food, water, ice, gas) from Maxwell Air Force Base, and equipment, including generators,

fuel trucks, and aviation assets.[122] Guard assets also began deployment to assist Mobile and Baldwin County Emergency Management activities.[123]

Mississippi National Guard

The Mississippi National Guard has 12,041 troops, with Army and Air National Guard components falling under Adjutant Major General Harold A. Cross.[124] The Adjutant General reports directly to the Governor, but is not dual-hatted as the state emergency management officer. Mississippi's emergency response is handled by the state's emergency management agency, MEMA.

On August 28, 2005, the Mississippi National Guard alerted state emergency personnel to assemble for hurricane operations on the Mississippi Gulf coast under Joint Task Force Magnolia.[125] National Guard special "hurricane strike" squads were pre-positioned at all three coastal county EOCs. Recommended but voluntary evacuation of civilians brought bumper-to-bumper traffic along Highway 49 northbound, from the beach in Gulfport to Jackson. By Sunday evening, numerous mandatory evacuation orders were in effect, and Mississippi National Guard Soldiers took shelter at Camp Shelby, 62 miles north of the predicted landfall area. These Guard personnel moved south after the storm had passed to begin assisting with response and recovery efforts.

U.S. Army Corps of Engineers

The Army Corps of Engineers (USACE), another active duty military unit, provided substantial resources to prepare for and respond to Hurricane Katrina. Under the National Response Plan, the USACE, as the lead federal agency for public works and engineering (ESF #3), provides relief and response support to FEMA.[126] To meet these responsibilities, USACE has pre-awarded competitively bid contracts for all of these functions to allow quick deployment of resources prior to and immediately after an event.[127] These pre-awarded contracts are part of USACE's Advanced Contracting Initiative (ACI), which has been in place for about six years.

USACE took a number of preparatory steps in anticipation of the hurricane season in general and for Hurricane Katrina specifically.[128] Over the summer, the USACE New Orleans District participated in an annual hurricane preparedness exercise conducted by the regional headquarters. In July 2005 the district sponsored a hurricane preparedness conference for federal, state, and local emergency managers.

In addition, USACE had equipment and supplies, including those needed to repair levees, pre-positioned in various locations along the Gulf of Mexico.[129] When Katrina approached, the New Orleans District monitored the situation and evacuated most staff, establishing a temporary district headquarters in Vicksburg, Mississippi. The district commander and eight staff remained in New Orleans, retreating to a bunker designed to withstand a category 5 hurricane. Their objective was to monitor the levee system, stay in contact with local officials, and provide post-storm assessments to the USACE chain of command.

U.S. Coast Guard

Well before arriving in the Gulf of Mexico, Hurricane Katrina was closely watched by Coast Guard officials as the storm approached and eventually passed through southern Florida. By Thursday, August 25, the Seventh Coast Guard District, based in Miami, had prepared for Katrina's arrival by partially evacuating Coast Guard boats, aircraft, and personnel, and closely monitoring Katrina's progress across the Florida peninsula.[130] As Katrina cleared the Seventh District, the Eighth District was busy executing hurricane plans in anticipation of Katrina's arrival.[131]

On August 27, the Eighth Coast Guard District's Incident Management Team (IMT), based in New Orleans, relocated to St. Louis in accordance with Coast Guard hurricane plans.[132] The Eighth District set heightened readiness for all units, ordered the evacuations of personnel and dependents from units along the Gulf coast in the anticipated impact zone, and closed the entrance to the lower Mississippi river to all commercial maritime traffic.

On August 28, the Coast Guard activated personnel to support air and swift boat operations under ESF-1, and positioned liaison officers at FEMA regions IV and VI, and to state EOCs in Florida, Louisiana and Mississippi.[133]

The Coast Guard's computer hub in New Orleans dropped off-line, resulting in no computer or internet connectivity to all coastal ports within the Eighth District. Coast Guard units resorted to using phone and fax machines to communicate.

The Eighth District Commander requested additional Coast Guard air assets and personnel to support rescue and recovery operations.[134] Coast Guard aircraft and crews from Louisiana, Alabama, Florida, New Jersey, Massachusetts, North Carolina, Georgia, and Texas were pre-staged to provide rapid support.[135] Eighth District Commander Rear Admiral Robert Duncan contacted Blanco to discuss damage assessments and response efforts.[136]

Sector New Orleans operations and critical communications personnel evacuated to Alexandria, Louisiana. Non-essential Coast Guard personnel and dependents in the New Orleans area evacuated to the Naval Air Station in Meridian, Mississippi.[137] Coast Guard helicopters originally located in New Orleans relocated to Houston and Lake Charles, Louisiana to avoid Katrina's path, and prepared to begin rescue operations. All Coast Guard cutters and small boats relocated to safe locations, or traveled out to sea to avoid the storm.

In Mississippi, a Coast Guard Incident Management Team was established in Meridian.[138] Duncan contacted Barbour to discuss damage assessments and response efforts. Non-essential personnel and dependents from the Gulfport and Lockport areas relocated to Naval Air Station Meridian.[139] In Alabama, helicopters from Aviation Training Center Mobile deployed to Shreveport and Jacksonville for storm avoidance, and prepared to respond. Also, a Transportable Multi-mission Communications Center was pre-staged at Sector Mobile to provide temporary communication support. Non-essential Coast Guard personnel and dependents relocated to Maxwell Air Force Base.[140]

On August 29, the day Katrina made landfall, the Sector New Orleans Incident Management Team was established in Alexandria, LA.[141] Outside of the forecasted area of impact, Coast Guard Disaster Assistance Teams from Ohio, Kentucky, St. Louis, Pittsburgh, and Miami were pre-positioned to the region to respond as soon as conditions permitted.

During normal conditions, there are 15 helicopters assigned within the Eighth Coast Guard District, along with four fixed-wing aircraft and 16 cutters. Within 12 hours of Hurricane Katrina making landfall, the Coast Guard assigned 29 helicopters, eight fixed-wing aircraft, and 24 cutters to the area to support rescue operations.[142]

Pre-landfall preparations by the American Red Cross

The Red Cross' Gulf coast-area preparation was far along two days before Katrina made landfall in the Gulf coast. As of 2:00 p.m. on August 27, Carol Hall of the Red Cross reported to the White House and the Department of Homeland Security, among other governmental organizations that it "has every resource at its disposal on alert/moving in anticipation of this event to include personnel, equipment, and materials."[143] According to Hall, key aspects of this preparation included:

- Chapters across the region opened shelters in support of evacuations in all states.
- 275,000 HeaterMeals were staged in Baton Rouge, LA.
- 225,000 HeaterMeals were staged in Montgomery, AL.
- 15 sites were identified to bring in big kitchens with the support of Southern Baptists to provide 300,000-meals-per-day feeding capability.
- All 14 Disaster Field Supply Center warehouses loaded supplies, including 50,000 cots, 100,000 blankets, comfort and clean-up kits.
- All vehicles in the Red Cross fleet across the country were placed on alert for possible deployment and were dispatched to staging areas.
- All 8 Emergency Communications Response Vehicles (ECRVs) deployed to staging areas.
- Red Cross staff deployed to NRCC, Region VI RRCC, Region IV RRCC, ERT-As and other ESF #6 posts.

AP PHOTO/STEVE COLEMAN

Red Cross volunteers unload supplies in preparation for Katrina.

By August 28, the Red Cross started to understand the magnitude of Katrina. One of its Disaster Operations Reports remarked, if Katrina makes landfall at its current pressure, "it will be the most intense storm to hit the US mainland."[144] On the same day it was reported, "For the first time ever, an ESF6 coordination center will be set up tomorrow at American Red Cross national headquarters to coordinate the deliver [sic] mass care services with our governmental and non-governmental organization partners."[145]

As Katrina made landfall on August 29, the Red Cross was fully staffing all of the relevant state and federal EOCs, including Alabama, Louisiana, Florida, Mississippi, Georgia, South Carolina, Tennessee, FEMA Regions IV and VI's RRCC, FEMA's NRCC, as well as ERT-A teams in Florida, Alabama, Mississippi, and Louisiana.[146] Sites for 25 kitchens to feed as many as 500,000 people were identified and pre-staged.[147]

Trajectory and impact of Hurricane Katrina

Finding: The accuracy and timeliness of National Weather Service and National Hurricane Center forecasts prevented further loss of life

Timeline of Hurricane Katrina and NWS Warnings to Federal, State and Local Officials

At 5:00 p.m. Eastern Daylight Time (EDT) (4:00 Central Daylight Time (CDT), the National Weather Service (NWS) reported that Katrina's projected path had shifted 150 miles to the west (toward Mississippi) and projected that Katrina would make landfall as a category 4 storm.[148] By 10:00 p.m. CDT that same night, the NWS projected that landfall was most likely at Buras, Louisiana, 65 miles south-southeast of New Orleans.[149] NWS proved extremely accurate; the final landfall location was only 20 miles off from Friday's forecast.[150] Since meteorological conditions that affect the track and intensity of the storm were relatively stable, NWS was especially certain of the accuracy of its prediction, even 56 hours from landfall.

At 10:00 a.m. CDT, on Saturday, August 27, the National Hurricane Center (NHC) issued a hurricane watch for southeast Louisiana, including New Orleans, which was extended to Mississippi and Alabama later that afternoon.[151] Later that evening, between 7:30 and 8:00 p.m. CDT, 35 hours before landfall, Max Mayfield, the director of the NHC called state officials in Louisiana, Mississippi, and Alabama to inform them of the storm's intensity and its potential to be devastating and catastrophic.[152] At Governor Blanco's urging, Mayfield also called Ray Nagin.[153]

Despite media reports indicating Mayfield encouraged Nagin to immediately order a mandatory evacuation, Mayfield "just told [officials] the nature of the storm [and that he] probably said to the Mayor that he was going to have some very difficult decisions ahead of him."[154] Similarly, Mayfield said that the "purpose of [his] calls there to the Governors of Louisiana and Mississippi was really just to make absolutely sure that they understood how serious the situation was . . . ."[155]

In public advisories issued at 10:00 p.m. CDT Saturday, 32 hours before prior to landfall, NHC warned of storm surge forecasts.[156] At 7:00 a.m. on Sunday, August 28, NWS advisories characterized Katrina as a "potentially catastrophic" storm.[157] Additionally, at 4:00 p.m. CDT on Sunday, the storm surge was predicted to be 18 to 22 feet, and locally as high as 28 feet with "large and battering" waves on top of the surge, meaning "some levees in the greater New Orleans area could be overtopped."[158]

Although it was reported that Mayfield cautioned the levees would be breached, no such warning was issued. "What I indicated in my briefings to emergency managers and to the media was the possibility that some levees in the greater New Orleans area could be overtopped, depending on the details of Katrina's track and intensity," Mayfield said.[159]

Also on Sunday, August 28, the NWS office in Slidell, Louisiana, which is responsible for the New Orleans area, issued warnings saying, "most of the area will be uninhabitable for weeks…perhaps longer" and predicting "human suffering incredible by modern standards."[160] Ultimately, NWS and NHC proved remarkably accurate in capturing Katrina's eventual wrath and destruction.

It is important to note, the hurricane risk to New Orleans and the surrounding areas was well-recognized and predicted by forecasters long before Hurricane Katrina. "The 33 years that I've been at the Hurricane Center we have

NASA

always been saying — the directors before me and I have always said — that the greatest potential for the nightmare scenarios, in the Gulf of Mexico anyway, is that New Orleans and southeast Louisiana area," Mayfield said.[161]

The NWS and NHC are not without critics though. AccuWeather Inc., a private weather service company, has said the public should have received earlier warnings that Gulf coast residents, and New Orleans residents in particular, were directly in Katrina's path.[162] AccuWeather issued a forecast predicting the target of Katrina's landfall nearly 12 hours before the NHC issued its first warning, and argued the extra time could have aided evacuation of the region.[163]

Responding to this criticism, Mayfield said premature evacuation can lead too large of an area to evacuate, causing unnecessary traffic and congestion on the roads.[164] As Mayfield testified, "the mission here of the National Hurricane Center and then the National Weather Service, is to provide the best forecast that we possibly can, and then the emergency managers at the local and state levels will use that, then they will call for evacuations."[165]

Ultimately, as Mayfield tried to convey, NHC and NWS can only forecast, issue warnings, and provide timely information to the state and local decision-makers who determine who and when to evacuate. The timeliness and accuracy of the forecasts saved lives. No government can blame inadequate response or lack of advanced warning.

Katrina makes landfall

Hurricane Katrina made landfall at Buras, Louisiana on the southeast corner of Louisiana, at 6:10 a.m. CDT, on Monday, August 29.[166] Katrina had maximum sustained winds of 121 mph and was unusually large, measuring approximately 400 miles across. Its eye was at least 30 miles wide. Though it had weakened from a category 5 to a strong category 3 storm by landfall, the damage and loss of life from the storm was staggering, with effects extending from Louisiana through Mississippi, Alabama, Georgia, and the Florida panhandle.[167] The three states most directly affected — Alabama, Mississippi, and Louisiana — each suffered significant damage, with NHC noting that many of the most severely affected areas along the Gulf coast could take years to completely rebuild.[168]

Alabama — impact of Hurricane Katrina

Though Alabama was not where Hurricane Katrina made landfall, damages there were substantial. According to the NHC, "despite being more distant from the eye of Katrina, the storm surge over Dauphin Island, Alabama destroyed or damaged dozens of beachfront homes and cut a new canal through the island's western end."[169] Two deaths were reported during Hurricane Katrina in Alabama. However, these deaths were the result of an auto accident and unrelated to the Hurricane.[170]

Katrina caused significant damage along its coast with a wave surge of 13.5 feet, exceeding the 100-year flood level of 12 feet.[171] Bayou La Batre and (as noted above) Dauphin Island received the brunt of the storm in Alabama, losing 800 and 200 homes, respectively.[172] The storm caused wind damage as far north as Tuscaloosa County. Mobile Bay spilled into downtown and flooded large sections of the city, destroying hundreds of homes. The sheer power of the storm dislodged a nearby oil drilling platform, which became caught under the U.S. Highway 98 bridge.[173]

As of early January 2006, federal assistance to Alabama had exceeded $500 million.[174] Specifically, FEMA reported

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FEMA

that, to date, it had provided $117 million in assistance to individuals and families (for housing and rental assistance) and $348 million for public assistance, crisis counseling, disaster unemployment assistance, and various mission assignments to other federal agencies during the disaster response. The public assistance funds were provided for, among other things, infrastructure costs, debris removal, and road and bridge repair. The costs for mission assignments to other federal agencies included the use of military aircraft for rapid needs assessments, shipments of ice (280 truckloads), water (186 truckloads), MREs (103 truckloads), generators (11 truckloads), cots (27 truckloads), and blankets (32 truckloads). The Small Business Administration (SBA) has approved over $68 million in loans to homeowners, renters, and businesses.

Mississippi — impact of Hurricane Katrina

In reporting casualty and damage statistics for Hurricane Katrina, NHC noted that "the storm surge of Katrina struck the Mississippi coastline with such ferocity that entire coastal communities were obliterated, some left with little more than the foundations upon which homes, businesses, government facilities, and other historical buildings once stood."[175] According to the NHC, the Hancock County EOC recorded a storm surge of as high as 27 feet; this surge likely penetrated at least six miles inland in many portions of the Mississippi coast and up to 12 miles inland along bays and rivers.[176] Even in areas that may have been spared the destruction of the storm surge, hurricane force winds wreaked havoc—according to Pearl River County EMA Director Bobby Strahan, for example, his EOC (one county inland) twice registered wind speeds of 135 miles per hour.[177]

All told, at least 231 Mississippians died during Hurricane Katrina.[178] In the three coastal counties alone, 66,000 may have been displaced from their homes due to flooding and/or structural damage to their homes.[179] At peak levels on August 31, Mississippi's power companies reported 958,000 customers were without power and that over 19,000 households were still powerless as of the end of September.[180]

Damages to Mississippi's economy were also substantial—the state's agricultural, forestry, gaming, maritime, and poultry industries all suffered extensive damages.[181] For example, the state reported that its two biggest crops—poultry and forestry—were very hard hit, with at least two years' worth of timber destroyed (worth $1.3 billion) and the value of the poultry industry dropping by six percent due to hurricane damage (including the estimated loss of 8 million birds and damage to 2,400 of the state's 9,000 poultry houses, 300 of which were totally devastated).[182] The state's dairy industry suffered losses estimated to exceed $6 million, and 20 percent of the expected rice and corn harvests may have been lost.[183]

The costs and volume of response and clean-up activity in Mississippi reflect the enormous damage Katrina left behind. For example, a month and a half after landfall, the state reported the total cost of assistance it received via EMAC was over $327 million ($176 million in civilian costs and $151 million in National Guard expenses).[184]

According to the National Emergency Management Association (NEMA, which administers the EMAC[185]), commonly requested resources included firefighters, search and rescue personnel, HAZMAT personnel, emergency medical technicians, state police, sheriffs, fish and wildlife personnel, corrections personnel, livestock inspectors, bridge inspectors, airport maintenance personnel,

FEMA

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ambulances, medical doctors, registered nurses and National Guard Troops.[186] In total, at least 33 states aided the law enforcement response effort in Mississippi through the EMAC.[187]

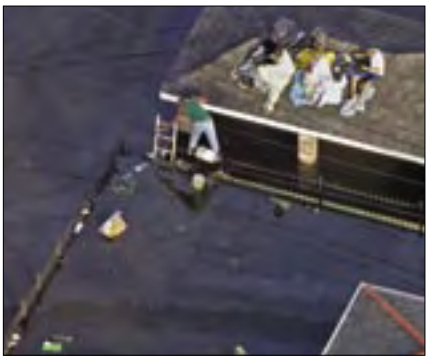
Federal costs in Mississippi have also been substantial.[188] FEMA reports that, as of January 4, 2006 it had disbursed in Mississippi just over $1 billion in assistance via its Individuals and Households Program and obligated to the state and local governments $666 million in public assistance to repair things like roads and bridges. SBA, FEMA reports, has approved home, business, and economic injury loans totaling over $529 million. USACE has installed nearly 50,000 temporary roofs through its Operation Blue Roof program (making that effort 99 percent complete) and, in addition to the efforts of local governments and contractors, removed more than 23 million cubic yards of debris. While just over 30,000 FEMA travel trailers and mobile homes are now occupied in Mississippi, four shelters housing 759 people remained open at year's end.

Louisiana — impact of Hurricane Katrina

On August 28, at 10 a.m. CDT, the NWS field office in New Orleans issued a bulletin predicting catastrophic damage to New Orleans, including partial destruction of half of the well-constructed houses in the city, severe damage to most industrial buildings rendering them inoperable, the creation of a huge debris field of trees, telephone poles, cars, and collapsed buildings, and a lack of clean water.[189] As previously noted, NWS predicted the impact on Louisiana would be a human suffering incredible by modern standards." Unfortunately, much of what the NWS predicted came to pass.

With intense gale-force winds and massive storm surge, the effect of Hurricane Katrina on Southeast Louisiana was indeed catastrophic. After 11:00 a.m. CDT on August 29, several sections of the levee-system in New Orleans breached, and 80 percent of the city was under water at peak flooding, which in some places was 20 feet deep. The extensive flooding left many residents stranded long after

NWS predicted Karina could "make human suffering incredible by modern standards."



AP PHOTO/DAVID J. PHILLIP

Hurricane Katrina had passed, unable to leave their homes. Stranded survivors dotted the tops of houses citywide. Flooding in the 9th Ward sent residents onto rooftops seeking aid. Many others were trapped inside attics, unable to escape. Some chopped their way to their roofs with hatchets and sledge hammers, which residents had been urged to keep in their attics in case of such events. Clean water was unavailable and power outages were expected to last for weeks.

Katrina took approximately 1,100 lives in Louisiana, most due to the widespread storm surge-induced flooding and its aftermath in the New Orleans area.[190] Fatalities included some of those widely seen on the media — bodies at refugee centers, such as an old woman in a wheelchair who had been covered with a cloth, and a man dead on the interstate. In addition to flooding, contaminated water also caused deaths—on September 6, *E. coli* was detected in the water supply and, according to the Centers for Disease Control and Prevention (CDC), five people died from bacterial infections caused by the toxic waters.[191]

AP PHOTO/ERIC GAY

The economic and environmental ramifications of Katrina have been widespread and could in some respects be long-lasting due to effects on large population and tourism centers, the oil and gas industry, and transportation. The hurricane severely damaged or destroyed workplaces in New Orleans and other heavily populated areas of the northern Gulf coast, resulting in thousands of lost jobs and millions of dollars in lost tax revenues for the affected communities.[192] All told, 41 of Louisiana's 64 parishes suffered serious damage.[193] Thousands of homes and businesses throughout entire neighborhoods in the New Orleans metropolitan area were destroyed by the flood. Strong winds also caused damage in the New Orleans area, including downtown, where windows in some high rise buildings were blown out and the roof of the Louisiana Superdome partially peeled away.

AP PHOTO/CHRISTOPHER MORRIS/VII

As of mid-January, 2006, the federal costs FEMA reported for Louisiana were enormous. Specifically, FEMA said it had provided $4 billion directly to Katrina victims for financial and housing assistance through its Individuals and Housing Program, an amount it projected will eventually grow to a total of $7.7 billion (including costs from Hurricane Rita in late September 2005).[194] FEMA had paid out an additional $3.1 billion in housing assistance to victims of Katrina and Rita and projected it will pay $17 billion in claims under the National Flood Insurance Program to policyholders in Louisiana.

Likewise, loan activity in the wake of Hurricanes Katrina and Rita has been substantial. FEMA has approved $539 million in Community Disaster Loans in Louisiana for essential public services in hard-hit communities, including a $120 million loan to the city of New Orleans, and SBA has approved $1.3 billion in loans to homeowners and renters and $252 million in disaster assistance loans to businesses.[195] ■

[1] Federal Emergency Management Agency (FEMA), Commodity status by site as of Aug. 28, 2005, (10:00 a.m.).
[2] Press Conference with Officials from the Department of Homeland Security, Justice Department, Defense Department, the National Guard Bureau, U.S. Coast Guard and FEMA, CNN, et al, Sept. 1, 2005 [hereinafter *DHS Press Conference*], *available at* http://www.dhs.gov/dhspublic/display?theme=43&content=4779&print=true (last visited Jan. 25, 2005).
[3] Interview by Select Comm. Staff with Bill Lokey, FEMA Federal Coordinating Officer, in Washington, DC (Dec. 2, 2005) [hereinafter *Lokey Interview*].
[4] Federal Emergency Management Agency, Commodity status by site as of Aug. 28, 2005 (10:00 a.m.).
[5] *Hearing on Hurricane Katrina: The Role of the Federal Emergency Management Agency Before Select Comm.*, 109th Cong. (Sept. 27, 2005) at 54-55 (statement of Michael Brown) [hereinafter *Sept. 27, 2005 Select Comm. Hearing*].
[6] *Id.*, at 63-64 (statement of Michael Brown).
[7] *Id.*, at 34 (statement of Michael Brown).
[8] Press Release, FEMA, Assistance Continues To Areas Impacted By Hurricane Katrina (Press Release No. HQ-05-175) (Aug. 29, 2005), *available at* http://www.fema.gov/news/newsrelease_print.fema?id=18471 (last visited Jan. 26, 2006).
[9] Press Release, Dept. Homeland Security, United States Government Response to the Aftermath of Hurricane Katrina (Sept. 1, 2005), *available at* http://www.dhs.gov/dhspublic/display?theme=43&content=4777&print=true (last visited Jan. 26, 2006).
[10] Letter from Haley Barbour, Governor of Mississippi, to George W. Bush, President of the United States (Aug. 27, 2005); Mississippi, Emergency and Related Determinations (FEMA-3213-EM), 70 Fed. Reg. 53,229 (Aug. 28, 2005).
[11] Letter from Haley Barbour, Governor of Mississippi, to George W. Bush, President of the United States (Aug. 28, 2005); Mississippi, Major Disaster and Related Determinations (FEMA-1604-DR), 70 Fed. Reg. 72,549 (Aug. 28, 2005, as amended Dec. 20, 2005).
[12] Mississippi Emergency Management Agency, Status of Emergency Management Capability (Feb. 01, 2005).
[13] *See*, DHS, *National Incident Management System*, 2 (Mar. 1, 2004), at ix, 1-4, 7, *available at* http://www.dhs.gov/interweb/assetlibrary/NIMS-90-web.pdf (last visited Jan. 22, 2006) [hereinafter *NIMS*]. NIMS was developed by the Department of Homeland Security to implement HSPD-5, which directed DHS to develop a new national plan for managing emergencies. NIMS defines the roles and responsibilities of federal, state, and local first responders during emergencies and establishes a core set of concepts, principles, terminology, and organizational processes to enable effective, efficient, and collaborative emergency event management at all levels. The concepts, principles, and processes underlying the NIMS are intended to improve the ability of different jurisdictions and first-responder disciplines to work together in various areas, such as command and communications. DHS describes the NIMS ICS as the "standardized incident organizational structure for the management of all [domestic] incidents." The ICS provides a common organizational structure for the immediate response to emergencies and involves the coordination of personnel and equipment on-site at an incident.
[14] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Mississippi, Before Select Comm.* 109th Cong. (2005), at 3 (written statement of William L. Carwile) [hereinafter *Dec. 7, 2005 Select Comm. Hearing*]; *see also, Dec. 7, 2005 Select Comm. Hearing*, at 39-40 (statement of William L. Carwile); *see also, Dec. 7, 2005 Select Comm. Hearing*, at 33-34 (statement of Robert R. Latham, Jr.).
[15] *Dec. 7, 2005 Select Comm. Hearing*, at 5 (written statement of Robert R. Latham, Jr.).
[16] *See generally*, Mississippi Emergency Management Agency, *Preparedness and Response Timeline—Hurricane Katrina* [hereinafter *MS Timeline*].
[17] *MS Timeline*, at 1-2.
[18] Mississippi Emergency Management Agency, Director's Brief as of 1900 hours, Aug. 28, 2005 (MEMA -0010688) (Aug. 28, 2005), at 3.
[19] *Dec. 7, 2005 Select Comm. Hearing*, at 2 (written statement of William L. Carwile).
[20] *Id.*, at 6 (statement of Robert R. Latham, Jr.).
[21] *Id*, at 64-65 (statement of Haley Barbour).
[22] *Id.*, at 2 (written statement of Robert R. Latham, Jr.).
[23] *MEMA Timeline*, at 2.
[24] *Id.*, at 3.
[25] Mississippi Emergency Management Agency, Director's Brief as of 0430 hours, Aug. 29, 2005 (MEMA -0010696) (Aug. 29, 2005), at 1.
[26] Mississippi Emergency Management Agency, Director's Brief as of 1900 hours, Aug. 28, 2005 (MEMA -0010688) (Aug. 28, 2005), at 3.
[27] Mississippi Emergency Management Agency, Director's Brief as of 0430 hours, Aug. 29, 2005 (MEMA -0010696) (Aug. 29, 2005), at 1.
[28] Mississippi Emergency Management Agency, Director's Brief as of 0502 hours, Aug. 29, 2005 (MEMA -0010700) (Aug. 29, 2005), at 2.
[29] *Id.*, at 2.
[30] *Hearing on Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama before Select Comm.*, 109th Cong. (2005), at 22-23 (statement of Harold A. Cross), [hereinafter *Oct. 27, 2005 Select Comm. Hearing*]; *see also,* E-mail correspondence from LTC Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russel Honoré, Commander, Joint Task Force Katrina (Aug. 27, 2005; 3:50 p.m.).
[31] Interview by Select Comm. with Major General Harold A. Cross, Adjutant General (TAG), in Jackson, MS (Oct. 12, 2005) [hereinafter *Cross Interview*].
[32] E-mail correspondence from Colonel Penn, Defense Co-ordination Office for Mississippi, to Lt. General Russel Honoré, Commander, Joint Task Force Katrina (Aug. 30, 2005; 7:47 a.m.); *see also* Mississippi National Guard Joint Force Headquarters, *Operation Secure Magnolia, Hurricane Katrina Aug. 26-Present; see also*, E-mail correspondence from LTC Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russel L. Honoré, Commander, Joint Task Force Katrina (Aug. 28, 2005; 11:26 a.m.); *see generally*, Mississippi Emergency Management Agency, Hurricane Situation Report #24 (Sept. 1, 2005; 00:35 a.m.).
[33] *Oct. 27, 2005 Select Comm. Hearing* (written response to questions for the record of Major General Harold A Cross).
[34] *Id.*
[35] *Id.*
[36] *Id.*
[37] *Id.*

[38] *Id*.

[39] *Oct. 27, 2005 Select Comm. Hearing* (written response to questions for the record of Major General Harold A Cross); *see also*, E-mail correspondence from LTC Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russel L. Honoré, Commander, Joint Task Force Katrina (Aug. 28, 2005; 11:26 a.m.); *see also*, E-mail correspondence from LTC Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russel L. Honoré; *see also*, Commander, Joint Task Force Katrina (Aug. 28, 2005; 4:42 a.m.).

[40] E-mail correspondence from LTC Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russel L. Honoré , Commander, Joint Task Force Katrina (Aug. 28, 2005; 11:26 a.m.); E-mail correspondence from Lt. Col. Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russell L. Honoré; *see also*, Commander, Joint Task Force Katrina (Aug. 28, 2005; 4:42 a.m.).

[41] E-mail correspondence from Lt. Col. Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russel L. Honoré, Commander, Joint Task Force Katrina (Aug. 28, 2005; 11:26 a.m.); E-mail correspondence from LTC Rodney Neudecker, Mississippi Sr. Army Advisor Guard, to Lt. General Russel L. Honoré; *see also*, Commander, Joint Task Force Katrina (Aug. 28, 2005; 4:42 a.m.).

[42] *Oct. 27, 2005 Select Comm. Hearing* (written response to questions for the record of Major General Harold A. Cross).

[43] *Oct. 27, 2005 Select Comm. Hearing*, at 26 (statement of Major General Harold A. Cross).

[44] *See generally*, Daily Video Teleconferences amongst officials dated Aug. 25 – Sept. 4, 2005 [hereinafter "Daily VTC"]. State and local officials from each of the impacted areas met daily with officials from, among other agencies, FEMA, and the National Hurricane Center.

[45] Interview by Select Comm. Staff with Toby Roth, Chief of Staff to Governor Barbour, and Dave Stewart, Policy Advisor to Governor Barbour, in Montgomery, AL (Oct. 12, 2005) [hereinafter *Roth / Stewart Interview*].

[46] FEMA, Chronology and Time Line, (DHS-FEMA-070-0001256).

[47] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Alabama Before Select Comm.*, 109th Cong. (2005), at 86 (statement Leigh Ann Ryals) [hereinafter Nov. 9, *2005 Select Comm. Hearing*]; *see also, Nov. 9, 2005 Hearing*, at 93 (statement Walter Dickerson).

[48] Letter from Bob Riley, Governor of Alabama, to George W. Bush, President of the United States (Aug. 28, 2005).

[49] Letter from George W. Bush, President of the United States to Bob Riley, Governor of Alabama (Aug. 29, 2005).

[50] Letter from Bob Riley, Governor of Alabama, to George W. Bush, President of the United States (Aug. 28, 2005).

[51] *See*, Letter from George W. Bush, President of the United States to Bob Riley, Governor of Alabama (Aug. 29, 2005); *see*, Alabama; Major Disaster and Related Determinations, 70 Fed. Reg. 71,540-71,541 (Aug. 29, 2005, as amended Nov. 29, 2005).

[52] Level I being the highest (a declared disaster) and Level IV being the lowest (daily operating level). The AL EOP is in the process of being revised. The State of Alabama, with a view to being NRP and NIMS compliant, has reversed its ordering of the activation levels, i.e., Level I is now Level IV. *See*, E-mail correspondence from Bill Filter, Alabama Emergency Management Agency, Operations Department, to Select Comm. Staff (Nov. 8, 2005).

[53] Interview by Select Comm. Staff with Charles Williams, Division Chief of Preparedness and Tim Payne, Branch Chief Emergency Management Program Coordinate, in Clanton, AL (Oct. 11, 2005) [hereinafter *Williams / Payne Interview*].

[54] *Williams / Payne Interview; see also, Roth / Stewart Interview.*

[55] *Roth / Stewart Interview.*

[56] *See*, ALA. CODE §§ 31-9-6 (4); 31-9-8 (4); 31-9-14 and 31-9-15 (2005).

[57] *William / Payne Interview.*

[58] *Id*.

[59] EM2000 messages from Aug. 23 through Sept. 15 were provided to the Select Comm. *See generally*, EM/2000 Tracker System Message Database (Aug. 23 – Sept. 15, 2005).

[60] Interview by Select Comm. Staff with Dr. Donald E. Williamson, MD, Alabama State Health Director, in Montgomery, AL (Oct. 12, 2005) [hereinafter *Williamson Interview*].

[61] Meeting Summaries, FEMA Regional Emergency Liaison Team Conference Calls (Aug. 28, 2005 – Sept. 02, 2005).

[62] Alabama Emergency Management Agency, EM/2000 Tracker System Message 05-1839, (Aug. 29, 2005) (Doc. No. 002771AL). The AEMA Situation Report (SitRep) #8 also contained the following: "The Department has a list of 15 facilities across the state that will house animals evacuated because of the hurricane. The list, along with contact information and type of animal is posted on the Department website as well as on the EM2000. Some of these facilities will house small animals such as dogs and cats; however, most only house horses. The total number of animals that can be accommodated is over 2,000. Late this morning it was reported that just under 100 horses were being sheltered." Alabama Emergency Management Agency / Emergency Operation Center, Situation Report #8 (Doc. No. 000235AL) (Sept. 1, 2005).

[63] Alabama Emergency Management Agency / Emergency Operation Center, Situation Report #12 (Doc. No. 000312AL) (Sept. 5, 2005).

[64] Letter from Kathleen Babineaux Blanco, Governor of LA, to George W. Bush, President of the United States (Aug. 27, 2005).

[65] Louisiana: Emergency and Related Determinations, 70 Fed. Reg. 53,238 (Aug. 27, 2005, as amended Sept. 7, 2005).

[66] Louisiana: Emergency and Related Determinations, 70 Fed. Reg. 53,238 (Aug. 27, 2005, as amended Sept. 7, 2005).

[67] Letter from Kathleen Babineaux Blanco, Governor of LA, to George W. Bush, President of the United States (Aug. 28, 2005).

[68] Louisiana; Major Disaster and Related Determinations, 70 Fed. Reg. 72, 458 (Aug. 29, 2005, as amended Dec. 5, 2005).

[69] Interview by Select Comm. Staff with LTC William Doran, Chief, Operations Division, LA Office of Homeland Security and Emergency Preparedness (LOHSEP), in Baton Rouge, LA (Nov. 7, 2005) [hereinafter *Doran Interview*]; *see* Interview by Select Comm. Staff with Jim Ballou, Operations Division, LA Office of Homeland Security and Emergency Preparedness (LOHSEP), in Baton Rouge, LA (Nov. 7, 2005) [hereinafter *Ballou Interview*].

[70] Interview by Select Comm. Staff with Rex McDonald, Information Technology and Communications Director, Department of Public Safety and Corrections, in Baton Rouge, LA (Nov. 7, 2005) [hereinafter *McDonald Interview*].

[71] Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Aug 26-28, 2005).

[72] *See* Ballou Interview; *see also*, Doran Interview.

[73] Interview by Select Comm. Staff with General Joseph B. Veillon, Louisiana National Guard Commander for Task Force Minnow, in New Orleans, LA (Nov. 3, 2005) [hereinafter *Veillon Interview*].

[74] Interview by Select Comm. Staff with Dr. Walter Maestri, Emergency Manager for Jefferson Parish, in New Orleans, LA (Nov. 8, 2005) [hereinafter *Maestri Interview*].

[75] *Superdome Personnel, MREs, and Water from 28 Aug. – 3 Sept.*, Table: provided by staff from LA Governor Blanco's office (Dec. 2005).
[76] *Hearing on Rebuilding Highway and Transit Infrastructure on the Gulf Coast following Hurricane Katrina: State and Local Officials Before the House Subcommittee on Highways, Transit and Pipelines*, 109th Cong. (Oct. 27, 2005), at 1 (statement by William J. DeVille) [hereinafter *Oct. 27, 2005 T&I Hearing*].
[77] Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Aug. 26-28, 2005).
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[94] Table: Superdome Personnel, MREs, and Water from 28 Aug. – 3 Sept., provided by staff from Louisiana Governor Blanco's office (Dec. 2005).
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[101] *DOD Timeline*, at 2.
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[103] *DOD Timeline*, at 3; *see* Col. Kranepuhl – Chief Operations, US Army, 1A Commander's Hurricane Assessment (Aug. 29, 2005), First US Army (Doc No. MMTF 00346-05) (Aug. 29, 2005); *see also*, Col. Kranepuhl – Chief Operations, US Army, 1A Commander's Hurricane Assessment (Aug. 30, 2005), First US Army (Doc No. MMTF 00349-05) (Aug. 30, 2005).
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[106] United States National Guard, Hurricane Katrina: National Guard After Action Review (Dec. 21, 2005), at 1.
[107] Interview by Select Comm. Staff with General H Steven Blum, Chief, National Guard, in Arlington, VA, (Oct. 19, 2005) [hereinafter *Blum Interview*]; *see also*, Interview by Select Comm. Staff with LT General Daniel James, III, Director of Air National Guard, in Arlington, VA, (Oct. 19, 2005) [hereinafter *James Interview; see also*, Interview by Select Comm. Staff with LT General Clyde A. Vaughn, Director of Army National Guard, in Arlington, VA, (Oct. 19, 2005) [hereinafter *Vaughn Interview*].
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[115] Interview by Select Comm. Staff with Jiff Hingle, Plaquemines Parish Sherriff, in New Orleans, LA (Nov. 7, 2005).
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[119] *Bowen Interview.*
[120] *Id*.
[121] Alabama National Guard, AL National Guard Katrina Response Notebook, 4-1.
[122] *Bowen Interview.*

[123] *Id.*
[124] *Oct. 27, 2005 Select Comm. Hearing* (written response to questions for the record of General Harold A. Cross).
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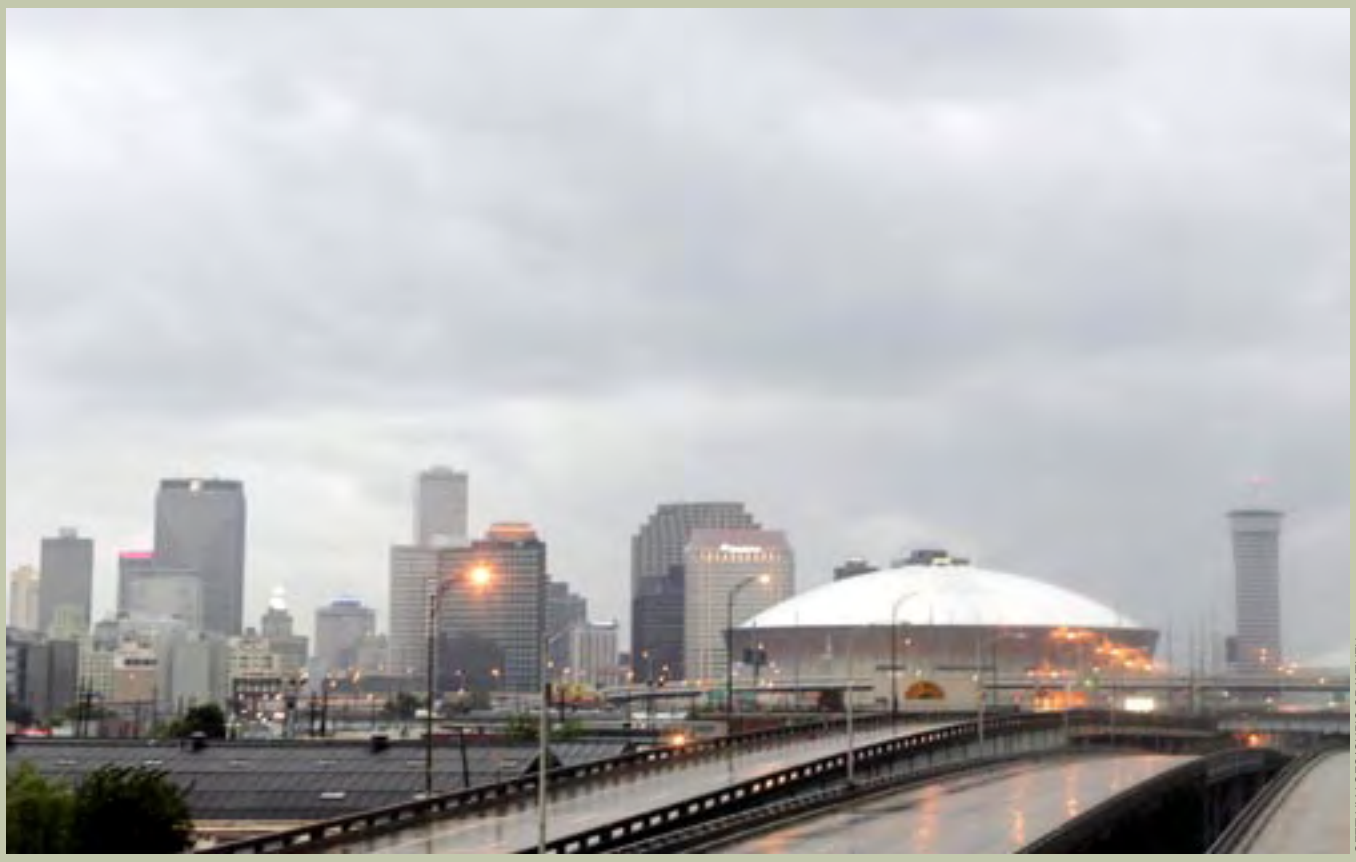

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"[Hurricane Exercise] Pam was so very prescient. And yet Katrina highlighted many, many weaknesses that either were not anticipated by Pam, or were lessons learned but not heeded.

"That's probably the most painful thing about Katrina, and the tragic loss of life: the foreseeability of it all."

Chairman Tom Davis
Select Committee Hearing, December 14, 2005

HURRICANE PAM

The Hurricane Pam exercise reflected recognition by all levels of government of the dangers of a catastrophic hurricane striking New Orleans

One of the key planning and preparedness steps many of the local, state, and federal officials involved in the response to Katrina in Louisiana took part in was the July 2004 exercise commonly known as "Hurricane Pam." FEMA funded and participated in this disaster simulation exercise in which a fictional, strong category three — with qualities of a category four — hurricane named Pam hit the New Orleans area. Emergency officials from 50 parish, state, federal, and volunteer organizations faced this scenario during the five-day exercise held at the Louisiana State Emergency Operations Center in Baton Rouge.[1]

The purpose of the exercise was to help officials develop joint response plans for a catastrophic hurricane in Louisiana. While many found the Pam exercise to be useful in executing a better response to Katrina, the exercise also highlighted lessons learned that were not implemented and did not anticipate certain weaknesses that Katrina exposed.

The Hurricane Pam scenario focused on 13 parishes in southeast Louisiana — Ascension, Assumption, Jefferson, Lafourche, Orleans, Plaquemines, St. Bernard, St. Charles, St. James, St. John, St. Tammany, Tangipahoa, and Terrebonne. Representatives from outside the primary parishes, including officials from Mississippi's Emergency Management Agency (EMA), participated because hurricane evacuation and sheltering involve communities throughout Louisiana and into Arkansas, Mississippi, and Texas.[2]

The Hurricane Pam exercise scenario was prescient. The virtual storm brought sustained winds of 120 mph, up to 20 inches of rain in parts of Southeast Louisiana, and storm surges that topped the levees and flooded the New Orleans area. The exercise assumed that:[3]

- 300,000 people would not evacuate in advance;
- 500,000 to 600,000 buildings would be destroyed;
- Phone and sewer services would be knocked out and chemical plants would be flooded;
- 97 percent of all communications would be down;
- About 175,000 people would be injured, 200,000 would become sick, and more than 60,000 would be killed;
- About 1,000 shelters would be needed for evacuees;
- Boats and helicopters would be needed for thousands of rescues because many residents would be stranded by floodwaters;
- A catastrophic flood would leave swaths of southeast Louisiana uninhabitable for more than a year.

The Pam simulation was designed and run by a private contractor, Baton Rouge-based Innovative Emergency Management Inc. (IEM). FEMA issued the Request for Proposal in 2004 asking for speedy execution of the catastrophic planning project. IEM was awarded the contract for more than a half million dollars in May 2004 and was told by FEMA it had 53 days to mount the exercise. As it can take up to eight months to write an emergency plan, 6 to 12 months to train on the plan, and about one year to issue the report, Pam was clearly a different type of plan in scope, execution, and timing. According to IEM President Madhu Beriwal, Hurricane Pam was a "planning exercise" designed to develop usable information in a much shorter timeframe.[4] FEMA and Louisiana officials accelerated the planning process because of the overwhelming consensus that a category five hurricane hitting New Orleans was one of the most likely and devastating disaster scenarios our nation faced, Beriwal explained.

This effort was part of FEMA's larger initiative for conducting catastrophic disaster planning, in which it chose 25 disaster scenarios based on priority of risk. A hurricane hitting New Orleans was picked as the first scenario to be studied. According to Beriwal, "We were still fairly early in the process" of developing a formal response plan for New Orleans when Katrina made landfall.[5]

In July of 2004, IEM held its first workshop. The initial eight day workshop had over 300 participants from federal, regional, and local agencies. The first three days were dedicated to establishing the specifics of the disaster

scenario and pre-landfall planning, the remaining five days to post-landfall logistics.

Officials were presented with a hurricane scenario designed by Louisiana State University (LSU) researchers. Ivor Van Heerden, an LSU professor who used computer modeling to help create a realistic hurricane, said, "It was a slow moving category three storm, something that could quite easily happen, and designed so that it totally flooded the city, so that the participants could try to understand the full impacts of a flooded New Orleans."[6] Indeed, experts involved in the Hurricane Pam exercise were struck by the similarity of the simulation to the actual destructive conditions wrought by Katrina. According to Beriwal, Pam's slow-moving category three "made it virtually equal in force and devastation to Katrina's category four based on its surge and wind capacity."[7] And, of course, Katrina itself was later recategorized as a strong category 3.[8]

During the Pam simulation, participants broke into groups and devised responses as the disaster scenario unfolded. The workshop focused on issues ranging from search and rescue and temporary sheltering to unwatering, debris removal, and medical care. Not all issues, however, were covered in the workshop. Beriwal said while issues related to security and communications were on the agenda, the development of a plan to coordinate the displacement of school children took precedence.[9] Beriwal also said the issue of pre-landfall evacuation was not addressed, although Exercise Pam did make the basic presumption that the state and locals were responsible for pre-landfall evacuations. Apparently FEMA directed IEM to emphasize post-landfall and recovery issues in the Pam exercise as pre-landfall evacuation had always been a focal point in prior emergency disaster planning sessions.[10]

The Southeast Louisiana Catastrophic Hurricane Plan was the product of these series of workshops. The Plan was "designed to be the first step toward producing a comprehensive hurricane response plan, jointly approved and implemented by federal, state, and city officials."[11] By January 2005, IEM sent a draft planning document to the state and localities based on the planning derived from the July workshop. The delivery of the draft was expedited to give the Southeast Louisiana emergency management planners time to prepare for the 2005 hurricane season. Indeed, IEM scurried to make the plan available at this early date so officials could use it and *translate* it into individual detailed operational plans.[12] Beriwal noted the plan was not meant to provide operational detail but rather was designed to provide general guidance, a sort of "to do list" for state and localities.[13] Beriwal further characterized the exercise as a "work in progress." She described IEM's role as "facilitator and assessors of consequences."[14]

The plan itself outlines 15 subjects that emergency managers should address during and after a catastrophic storm hitting New Orleans. The report is detailed in certain respects. It includes diagrams for makeshift loading docks to distribute water, ice, and food to storm victims — color-coded to show where pallets, traffic cones, and trash bins would be placed. Yet in other places the report is less specific; it does not identify, for example, what hospitals or airports would be used.

Numerous action plans ranging from debris removal, to sheltering, to search and rescue were developed. For example, state transportation officials took the lessons learned from the Pam exercise and previous hurricanes and revised the state's contraflow plan.[15] The revisions included making adjustments to traffic lights, cessation of construction, and greater coordination with the private sector. State officials reported that Hurricane Pam greatly improved the state's contraflow evacuation plan.[16] In fact, federal, state, and local officials across the board agreed the contra flow plan was a success story of Katrina's emergency response. Over 1.2 million were evacuated in the 48 hours prior to landfall.[17]

As part of the Pam exercise, planners also identified lead and support agencies for search and rescue and established a command structure that would include four areas with up to 800 searchers. For example, "[t]he search and rescue group developed a transportation plan for getting stranded residents out of harm's way."[18] "The medical care group reviewed and enhanced existing plans."[19] "The medical action plan included patient movement details and identified probable locations, such as state university campuses, where individuals would receive care and then be transported to hospitals, special needs shelters or regular shelters as necessary."[20]

Workshops subsequent to the initial five-day Hurricane Pam exercise were held in November 2004 and August 2005. A second Hurricane Pam Exercise was planned for the summer of 2005, but did not take place, apparently due to lack of funding.[21] Agencies had anticipated expanding on aspects of response and recovery that were not explored in the 2004 exercise.[22]

Finding: Implementation of lessons learned from Hurricane Pam was incomplete

While state and local officials turned some lessons from the Hurricane Pam exercise into improvements of their emergency plans, other important changes were not made. State health officials said the exercise had helped them better prepare for evacuation of hospital patients and special needs people.[23] Since Pam was a catastrophic hurricane with flooding of New Orleans, it required them to consider the issue of evacuating New Orleans hospitals and the Superdome's special needs shelter.[24] Subsequent to the exercise, medical officials held planning sessions focused on post-landfall care and evacuation. The contingency plan for the medical component was almost complete when Katrina made landfall.[25] Officials said although the plan was not yet finalized, it proved invaluable to the response effort.[26]

Further, in the aftermath of Katrina, varying opinions have surfaced as to the roles and responsibilities established during the Hurricane Pam exercise. Some state and parish officials said they saw Pam as a "contract" of what the various parties were going to do, and the federal government did not do the things it had committed to doing.[27] According to Dr. Walter Maestri, the Jefferson Parish Director of Emergency Management, he understood that FEMA may not provide help until 48-72 hours later—but then he expected help.[28] That is, once the state cleared the roads, he anticipated that FEMA trucks would arrive with large quantities of water, food, and ice. Although these were the parish's planning assumptions, he said FEMA did not get substantial relief to the parish until 11 days after landfall.[29] Dr. Maestri also said the Hurricane Pam documentation makes it clear what FEMA was supposed to do, but FEMA did not do those things.[30]

Beriwal said, however, the plan derived from the Pam exercise was intended as a "bridging document" designed to serve as a guide and roadmap to be used by emergency operational officials at the state and local level. In other words, it was up to state and local officials to take the Plan and turn it into more detailed individual operational plans.[31]

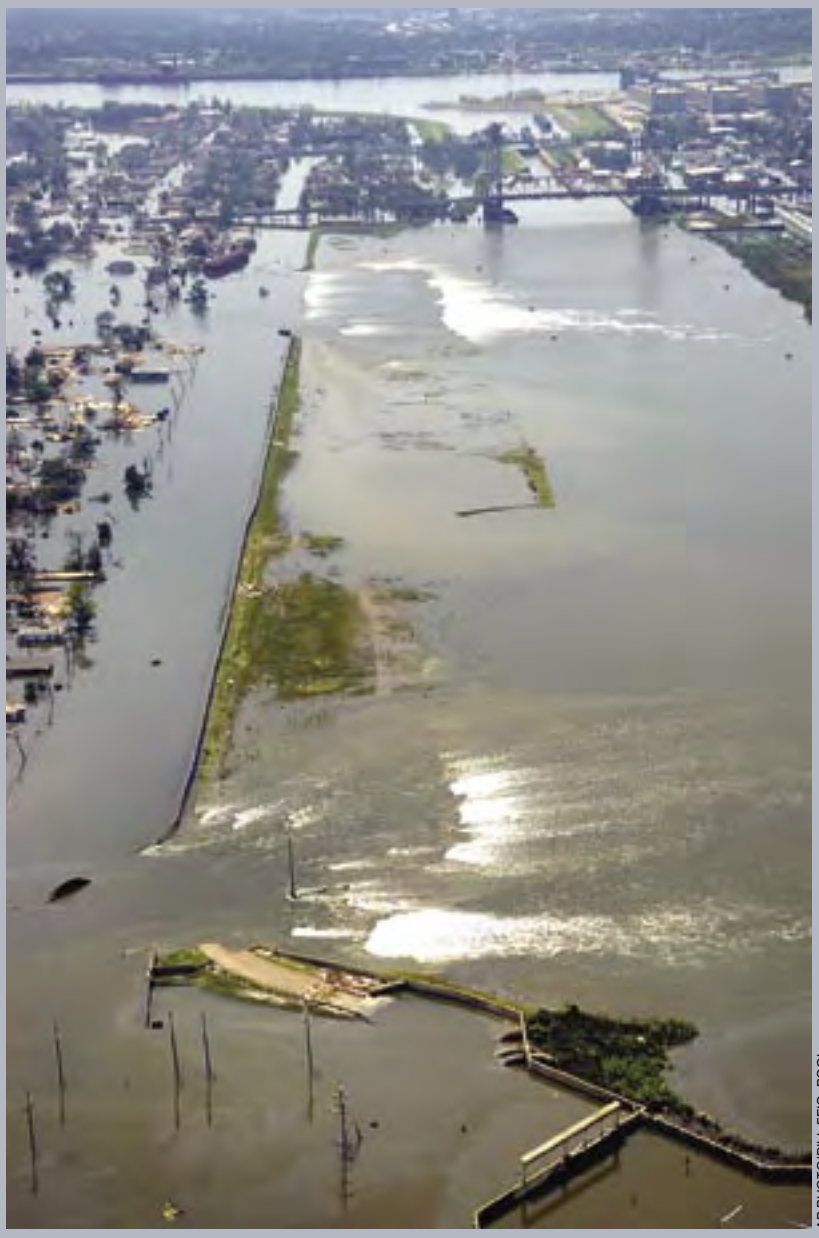
Yet, according to Scott Wells, Deputy Federal Coordinating Officer from FEMA, there were several Hurricane Pam Exercise "to do" items state or local governments did not complete.[32] For example, the state was supposed to develop more detailed concepts and plans in several areas: (1) search and rescue, (2) rapid assessment teams, (3) medical evacuation, (4) sheltering and temporary housing, (5) commodity distribution, and (6) debris removal.[33] The state's previous Louisiana Office of Homeland Security and Emergency Preparedness Deputy Director had laid these six areas out as priorities for the state to work on.[34] In Wells's view, the only one of these where the state made some progress was medical evacuation.[35]

Wells also said, however, that the need to shelter special needs people in the Superdome showed the state and city had not taken steps (which they had agreed to do after the Pam Exercise) to coordinate the movement and sheltering of these people further north, away from the Gulf.[36] As a result of the exercise and subsequent planning workshops, the state was supposed to develop "hasty plans" to address all these areas.[37] He said although he had tried to get state officials to focus on these hasty plans just before landfall, they would not do so.[38] According to Wells, the state had also agreed to learn and exercise a unified command through the incident command system.[39] Wells said the state did not do so, which led to major command and control problems during Katrina.[40]

Conclusion

Hurricane Katrina highlighted many weaknesses that either were not anticipated by the Pam exercise or perhaps were lessons learned but simply not implemented. For example, Hurricane Pam has been criticized for its emphasis on managing the aftermath of the catastrophe and not creating initiatives that would diminish the magnitude of the catastrophe. Indeed, much of the recrimination over the Hurricane Katrina response came because government authorities apparently failed to have a plan in place to assist in evacuating individuals without transportation. Nor did they appear to have an adequate sheltering plan in place. With Hurricane Pam's striking resemblance to Katrina in force and devastation, many have been left wondering at the failure to anticipate, and plan for, these essentials. Is a plan that leaves 300,000 in a flooded city and results in 60,000 deaths acceptable? ■

[1] Press Release, Fed. Emer. Mgmt. Agency (FEMA), *Hurricane Pam Exercise Concludes* (July 23, 2004), *available at* http://www.fema.gov/news/newsrelease.fema?id=13051 (last visited Jan. 12, 2006) [hereinafter July 23, 2004 FEMA Press Release].
[2] *Id*.
[3] Ron Fournier and Ted Bridis, *Katrina What Planners Feared; Hurricane Simulation Predicted 61,290 Dead*, AP, Sept. 10, 2005 [hereinafter Sept. 10, 2005 Fournier Article]; David R. Baker, *Hard Times in Big Easy Efforts Intensify to Evaluate Living, Recover Dead*, SF CHRONICLE, Sept. 9, 2005.
[4] Interview by Select Comm. staff with Madhu Beriwal, IEM, Inc., in Wash., DC (Jan. 6, 2006) [hereinafter Beriwal Interview].
[5] John McQuaid, *'Hurricane Pam' Exercise Offered glimpse of Katrina Misery*, TIMES-PICAYUNE (New Orleans), Sept. 9, 2005.
[6] *Id*.
[7] Beriwal Interview.
[8] Associated Press, *Hurricane Katrina Was Weaker Than First Thought At Landfall*, USA TODAY, Dec. 20, 2005, *available at* http://www.usatoday.com/weather/hurricane/2005-12-20-katrina-strength_x.htm.
[9] Beriwal Interview.
[10] *Id*.
[11] Sept. 10, 2005 Fournier Article.
[12] Beriwal Interview.
[13] *Id*.
[14] *Id*.
[15] Interview by Select Comm. staff with Gordon Nelson, LA Dep't of Trans., in Baton Rouge, LA (Nov. 4, 2005).
[16] *Id*.
[17] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Louisiana Before Select Comm.*, 109th Cong. (Dec. 14, 2005), at 77 (statement of Kathleen Babineaux Blanco, Governor of LA).
[18] July 23, 2004 FEMA Press Release.
[19] *Id*.
[20] *Id*.
[21] Beriwal Interview.
[22] Interview by Select Comm. Staff with Jeff Smith, State Coordinating Officer, LA. Office of Homeland Sec. and Emerg. Preparedness, in Baton Rouge, LA (Nov 7, 2005).
[23] Interview by Select Comm. Staff with Jimmy Guidry, Med. Dir., LA Dept. Health and Hospitals, in Baton Rouge, LA (Nov. 7, 2005).
[24] *Id*.
[25] *Id*.
[26] *Id*.
[27] Interview by Select Comm. Staff with Walter Maestri, Dir. of Emer. Mgmt., Jefferson Parish, in New Orleans, LA (Nov. 8, 2005).
[28] *Id*.
[29] *Id*.
[30] *Id*.
[31] Beriwal Interview.
[32] Interview with Select Comm. Staff, Scott Wells, Dep. Fed. Coordinating Officer, in Baton Rouge, LA (Nov. 9, 2005).
[33] *Id*.
[34] *Id*.
[35] *Id*.
[36] *Id*.
[37] *Id*.
[38] *Id*.
[39] *Id*.
[40] *Id*.



AP PHOTO/BILL FEIG, POOL

"What happened to us this year, however, can only be described as a catastrophe of Biblical proportions. We in Louisiana know hurricanes and hurricanes know us. We would not be here today if the levees had not failed."

Kathleen Babineaux Blanco
Governor, State of Louisiana
Select Committee Hearing, December 14, 2005

Summary

The levees protecting New Orleans were not built to survive the most severe hurricanes. It was a well-known and repeatedly documented fact that a severe hurricane could lead to overtopping or breaching of the levees and flooding of the metropolitan area. In fact, for years the U.S. Army Corps of Engineers (USACE) has had a written plan for unwatering (i.e., draining) New Orleans in such a contingency. This well-known threat was the motivation for FEMA to sponsor the "Hurricane Pam" exercise. The potential for Katrina to be "the Big One" and breach the levees was also the key reason for the National Weather Service, Governor of Louisiana, and Mayor of New Orleans to issue such dire warnings.

Once construction of the levees was completed by USACE, the responsibilities for operating and maintaining the levees were split among many local organizations, which is the standard cooperation agreement for carrying out flood control projects nationwide. The costs of constructing these projects are shared, with operation and maintenance being a 100 percent local responsibility. These include levee boards in each parish, as well as separate water and sewer boards. The number of organizations involved, and disagreements among them, makes accountability diffuse and creates potential gaps and weaknesses in parts of the flood protection system. In one case, improvements to levee strength which may have mitigated or prevented some of the critical breaches that flooded downtown New Orleans were rejected by the competing local organizations. There also appear to have been lapses in both maintenance and inspections of selected levees, including those that breached. Also, prior to Hurricane Katrina, residents along those same levees reported they were leaking, another potential lapse in maintenance.

Despite the well-known importance of the levees, and the consequences of failure, the local levee boards responsible for maintaining and operating the levees did not have any warning system in place. While federal regulations require that they monitor levees during periods of potential flooding, the requirement is impractical to implement during a hurricane. In addition to no warning system, the loss of communications and situational awareness, and only sporadic reports of flooding from a variety of sources, made it difficult to confirm that there were breaches in the levees and then to assess the damage. These factors, as well as physical difficulties of getting to the breach sites, combined to delay repair of the levee breaches.

The ultimate causes of the levee breaches, and subsequent flooding of New Orleans, are yet to be determined. At least four forensic investigations are under way to examine scientific evidence and determine the reasons for levee breaches. These include investigations by USACE's Engineer Research and Development Center, the National Science Foundation (NSF), the American Society of Civil Engineers (ASCE), and Louisiana State University (LSU). Possible causes include (1) the design was not appropriate for the purpose, (2) the storm exceeded levee design standards, (3) the levees were not actually built to the original design standards, (4) the levees were not properly maintained, or (5) a combination of these and other factors.

Finding: Levees protecting New Orleans were not built for the most severe hurricances

New Orleans is protected from flooding by a system of levees

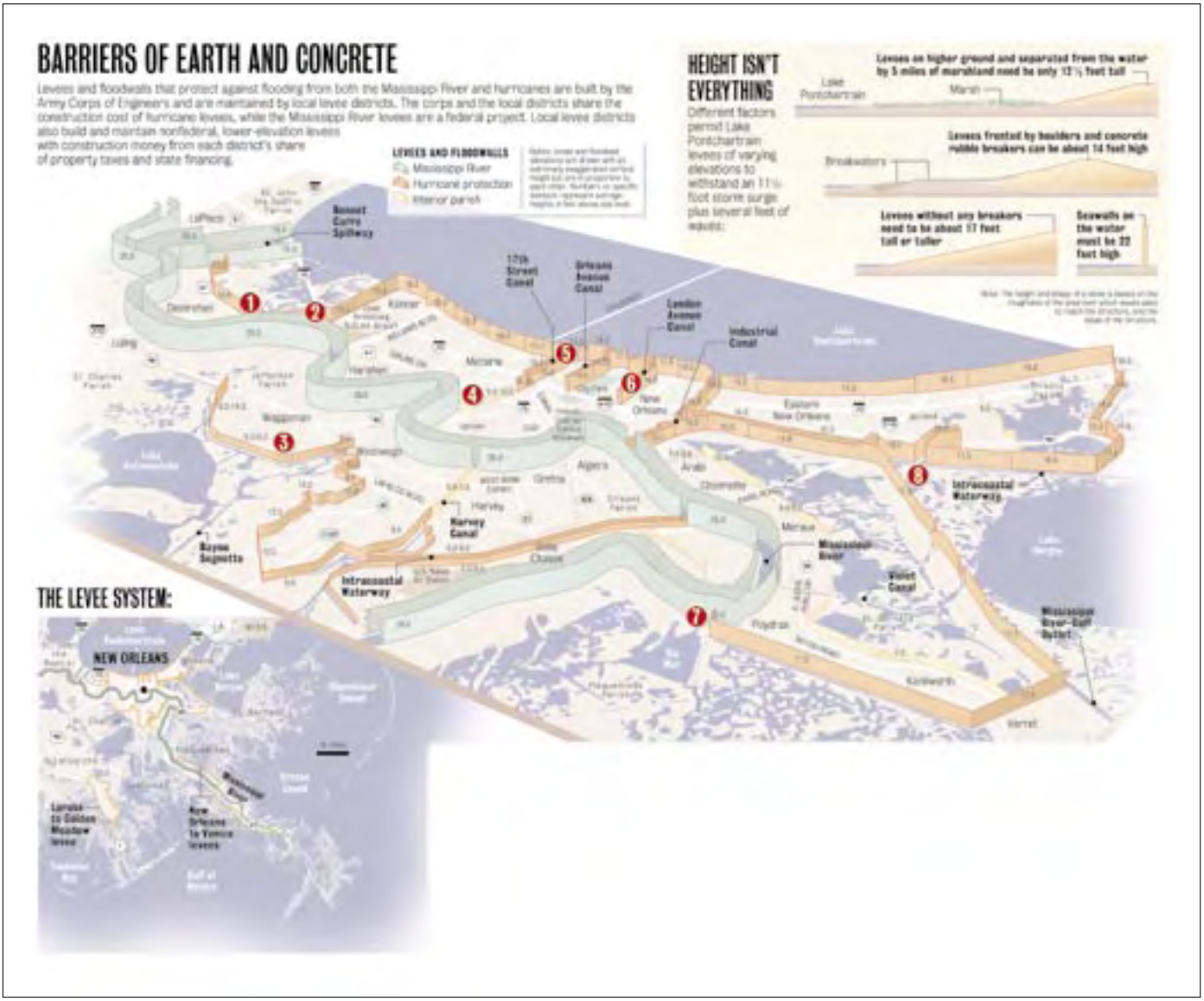
NWS

As noted in the BACKGROUND chapter, hurricanes threaten the Gulf coast every year, and New Orleans is particularly vulnerable because of its location and topography.[1] The majority of the metropolitan area is below sea level. Over the years, the city has continued to sink, due to drainage, subsidence, and compaction of the soils.[2] As an example of previous damage, Hurricane Betsy brought extensive destruction to New Orleans when it made landfall in Louisiana in September, 1965.[3] Unfortunately, many of the descriptions and

photos from Hurricane Betsy sound and look familiar to our nation as it considers the damage from Hurricane Katrina, forty years later. According to USACE's after action report on Hurricane Betsy…

- She left in her wake a path of devastation unparalleled by any other storm in the recorded history of Louisiana.[4]
- Betsy inundated over 5,000 square miles in Louisiana, including highly populated urban areas in Orleans and St. Bernard Parishes.[5]
- Extensive flooding was caused by overtopping and breaching of existing protection levees in Orleans, Plaquemines, and St. Bernard Parishes.[6]
- As Betsy's winds and tidal surge rolled inland, entire buildings were swept away from their foundations and floated as far as 10 miles away.[7]
- Betsy left 81 dead, over 17,600 injured, and caused the evacuation of 250,000 to storm shelters.[8]
- Betsy left thousands homeless in south Louisiana. Returning refugees often found only a pile of debris where their homes had stood just days before.[9]
- Betsy left numerous towns in south Louisiana with no means of communication.[10]

After Hurricane Betsy in 1965, federal and state governments proposed a number of flood control projects to deal with the threat of hurricanes and the flooding they



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might cause in New Orleans.[11] These included a series of control structures, concrete floodwalls, and levees along Lake Ponchartrain and several other waterways.[12] One of the major projects is formally called the Lake Ponchartrain and Vicinity, Louisiana Hurricane Protection Project.[13] This project included levees along the Lake Ponchartrain lakefront, the 17th Street Canal, the London Avenue Canal, the Orleans Avenue Canal, the Intercoastal waterway, the Industrial Canal,[14] the Mississippi River Gulf Outlet, and other areas.[15] Although the project was federally authorized, it was a joint federal, state, and local effort with shared costs.[16]

Levees were designed for a "standard" hurricane, not the most severe hurricanes

The levees protecting New Orleans were not designed to withstand the most severe hurricanes. According to USACE's plans for unwatering New Orleans, "the hurricane protection system is not designed for the largest storms and as a result, the metropolitan area is vulnerable to flooding from hurricane storm surges."[17] USACE originally designed the levees around New Orleans to protect against a hurricane intensity that might occur once every 200-300 years.[18] This protection level was used by USACE, in consultation with the U.S. Weather Bureau,[19] to develop specific criteria for a "standard project hurricane."[20] The "standard project hurricane" is a statistical compilation of many combined hurricane parameters or characteristics intended to simulate a natural hurricane occurrence in southeast Louisiana. The standard project hurricane was used not only for the Lake Ponchartrain project, but also nationwide for all hurricane protection projects where the loss of human life is possible.[21] According to USACE, the "standard project hurricane" was used to design the New Orleans levees and is roughly equivalent to a fast moving, or "moderate," category 3 hurricane.[22] However, there is no direct comparison of the "standard project hurricane" to a specific category on the Saffir-Simpson Hurricane Scale—which did not exist when the levees were designed.[23] As shown in the table below, the "standard project hurricane" is equivalent to a hurricane with category 2 winds, category 3 storm surge, and category 4 barometric pressure.[24]

Table 1:
Comparison of "Standard Project Hurricane" with Saffir Simpson Scale

	"Standard project hurricane"	Saffir-Simpson category 2 hurricane	Saffir-Simpson category 3 hurricane	Saffir-Simpson category 4 hurricane
Central pressure (1)	27.6 Hg	28.50-28.91 Hg	27.91-28.47 Hg	27.17-27.88 Hg
Wind speed (2)	100 mph	96-110 mph	111-130 mph	131-155 mph
Radius of maximum winds (3)	30 miles	N/A	N/A	N/A
Average forward speed (3)	6 knots	N/A	N/A	N/A
Storm surge	11.2-13 feet (4)	6-8 feet	9-12 feet	13-18 feet

Source: GAO analysis of USACE and NOAA data.[25]

Table Notes: The shaded areas indicate those parameters with the closest match between the standard project hurricane and the Saffir-Simpson Scale.

(1) Central pressure is measured in inches of mercury (Hg) or millibars.

(2) Wind speed for the standard project hurricane was measured as the maximum 5-minute average wind speed. The Saffir-Simpson Scale uses the maximum 1-minute average wind speed, a lower threshold.

(3) USACE estimated the radius of maximum winds and the average forward speed for a standard project hurricane, and the Saffir-Simpson Scale does not take either of these parameters into account.

(4) The standard project hurricane calculated maximum surge heights for different geographic areas within the Lake Ponchartrain area. The maximum surge height for the South Shore of Lake Ponchartrain—where the 17th Street, London Avenue, and Industrial Canals are located—was estimated at 11.2 feet.

In addition, there is no "standard" hurricane — the actual forces that levees need to withstand are a function of several factors. According to the preliminary NSF study, "the actual wind, wave and storm surge loadings imposed at any location within the overall flood protection system are a function of location relative to the storm, wind speed and direction, orientation of levees, local bodies of water, channel configurations, offshore contours, vegetative cover, etc. They also vary over time, as the storm moves through the region."[26] Similarly, USACE documents indicate that "[o]vertopping will depend upon the intensity of the storm, the track that the center or "eye" of the storm follows and the speed at which it travels along the track."[27]

Although the Lake Ponchartrain project is named a hurricane "protection" project, a number of factors other than saving lives and property are included in the design of such projects. For example, in addition to protecting urban and community lives and health, the design of such projects must include environmental and economic effects, and ensure that benefits of the completed project outweigh its cost of construction.[28] In discussing the design of the Lake Ponchartrain project in a 1978 hearing, USACE District Commander for New Orleans, Colonel

Early Rush, stated "Even though economists may, and in this case did, favor protection to a lower scale to produce a higher ratio of benefits to projected costs, the threat of loss of human life mandated using the standard project hurricane."[29]

Potential for Katrina to breach levees was well-known, leading to urgent warnings

Even with its hurricane protection system, it was common knowledge that New Orleans was susceptible to hurricane-caused flooding.[30] The risks of a major hurricane and flooding in New Orleans had been covered in the general media — by Scientific American (October 2001) and National Geographic (October 2004) — as well as in emergency management literature.[31] A recent article in the Natural Hazards Observer stated:

> When Hurricane Katrina came ashore on August 29, she ended decades of anticipation. There were few hazards in the United States more studied by scientists and engineers and there was ample warning that a strong storm could cause the City of New Orleans to flood.[32]

Emergency planners in the local area were particularly knowledgeable about this potentiality. A November 2004 article in Natural Hazards Observer — written by Shirley Laska, of the Center for Hazards Assessment, Response and Technology, at the University of New Orleans — laid out the hypothetical case that Hurricane Ivan had hit New Orleans. The article cites a fictional situation that is now all too real to the nation.[33]

> New Orleans was spared, this time, but had it not been, Hurricane Ivan would have… caused the levees between the lake and the city to overtop and fill the city "bowl" with water from lake levee to river levee, in some places as deep as 20 feet… Recent evacuation surveys show that two thirds of non-evacuees with the means to evacuate chose not to leave because they felt safe in their homes. Other non-evacuees with means relied on cultural traditions of not leaving or were discouraged by negative experiences with past evacuations. Should this disaster become a reality, it would undoubtedly be one of the greatest disasters, if not *the* greatest, to hit the United States, with estimated costs exceeding 100 billion dollars. Survivors would have to endure conditions never before experienced in a North American disaster. Hurricane Ivan had the potential to make the unthinkable a reality. Next time New Orleans may not be so fortunate.[34]

Because of the well-known potential for flooding, USACE has had a plan for several years for draining New Orleans — *Unwatering Plan, Greater Metropolitan Area, New Orleans, Louisiana*, dated August 18, 2000. This plan provides details on the hurricane protection system and describes methods to get the water out after catastrophic flooding from a hurricane. The premise of the plan is that a category 4 or 5 hurricane may produce storm surge water levels of sufficient height to overtop the existing protection system.[35] The plan lays out a series of scenarios that could occur, and suggests appropriate emergency responses to unwater the area.[36] For example, in one case…

> There is catastrophic flooding due to complete overtopping of the levees and floodwalls and inundation of the protected area. There will be extensive and severe erosion of levees and perhaps complete breaches. Due to the high water levels, all of the pumping stations will probably be flooded with major damages . . . . The levee districts and drainage departments may be dysfunctional to some degree.[37]

In more recent years, well before Hurricane Katrina, questions were raised about the ability of the Lake Ponchartrain project to withstand more powerful hurricanes than the "standard project hurricane," such as a category 4 or 5 hurricane. USACE had discussed undertaking a study of modifications needed to increase the strength of the existing levees, but no formal study was undertaken.[38]

As discussed earlier in the HURRICANE PAM chapter, FEMA sponsored the "Hurricane Pam" exercise to look at the response to and recovery from a catastrophic hurricane hitting New Orleans and flooding the city. In that scenario, "It was a slow moving Category three storm, something that could quite easily happen, and [the exercise scenario was] designed so that it totally flooded the city, so that the

participants could try to understand the full impacts of a flooded New Orleans" according to Ivor Van Heerden, the LSU professor who used computer modeling to help create a realistic hurricane for the exercise.[39] Again, the key reason for that exercise was the well-known potential for levee failure and catastrophic flooding in the metropolitan area.

As Katrina turned and began its track toward New Orleans, the potential for the levees overtopping or breaching and flooding New Orleans resulted in a number of dire warnings from federal, state, and local officials. As also discussed in the EVACUATION chapter, the National Weather Service issued a warning on Sunday, August 28, stating that Katrina was "a most powerful hurricane with unprecedented strength," that "devastating damage" was expected, that "most of the area will be uninhabitable for weeks," and that there will be "human suffering incredible by modern standards."[40] Governor Blanco also made dire predictions, stating in several interviews on Saturday and Sunday that flooding in New Orleans was a major concern. On Saturday at approximately 8:00 p.m., she appeared on CNN and said that in New Orleans "[t]he storm surge could bring in 15 to 20 feet of water. [People in the city of New Orleans] will not survive that if indeed that happens."[41] Similarly, in a news conference on Sunday morning, Mayor Nagin said, "The storm surge most likely will topple our levee system."[42]

Finding: Responsibilities for levee operations and maintenance were diffuse

USACE oversees design and construction then turns levees over to local sponsors

Several organizations are responsible for building, operating, and maintaining the levees surrounding metropolitan New Orleans. USACE generally contracts to design and build the levees.[43] After construction, USACE turns the levees over to a local sponsor.[44] USACE regulations state that once a local sponsor has accepted a project, USACE may no longer expend federal funds on construction or improvements. This prohibition does not include repair after a flood. Federally authorized flood control projects, such as the Lake Ponchartrain project, are eligible for 100 percent federal rehabilitation if damaged by a flood.[45] The Mississippi River levees are the exception to the arrangement just described. USACE operates and maintains these levees. These levees generally withstood Hurricane Katrina, except for a breach south of New Orleans in Plaquemines Parish—the parish that took the full force of Hurricane Katrina at landfall.[46]

The local sponsor has a number of responsibilities. In accepting responsibilities for operations, maintenance, repair, and rehabilitation, the local sponsor signs a contract (called a Cooperation Agreement) agreeing to meet specific standards of performance.[47] This agreement makes the local sponsor responsible for liability for that levee.[48] For most of the levees surrounding New Orleans, the Louisiana Department of Transportation and Development was the state entity that originally sponsored the construction. After construction, the state turned over control to local sponsors.[49] These local sponsors accepted completed units of the project from 1977 to 1987, depending on when the specific units were completed.[50] The local sponsors are responsible for operation, maintenance, repair, and rehabilitation of the levees when the construction of the project, or a project unit, is complete.[51]

Local sponsors do not have control over all factors that could affect their parts of the levee system

The local sponsors include a variety of separate local organizations. For example, different parts of the Lake Ponchartrain and Vicinity, Louisiana Hurricane Protection Project, were turned over to four different local sponsors — to include the Orleans, East Jefferson, Lake Borgne, and Ponchartrain levee districts.[52] In addition, there are separate water and sewer districts that are responsible for maintaining pumping stations.[53] The USACE unwatering plan notes these arrangements by stating that, among other factors, "the political boundaries with internal local levees have resulted in this series of loops or bowls of low lying ground encircled by levees and floodwalls. Each of these areas is served by its own drainage collection and pumping stations."[54]

The different local organizations involved had the effect of diffusing responsibility and creating potential weaknesses. For example, levee breaches and distress were repeatedly noted at transition sections, where different organizations were responsible for different pieces and

thus two different levee or wall systems joined together. According to USACE, "[a]t sections where infrastructure elements were designed and maintained by multiple authorities, and their multiple protection elements came together, the weakest (or lowest) segment or element controlled the overall performance."[55] Similarly, a scientist working on the NFS study, Raymond Seed, stated there needs to be better coordination of these transition sites.[56] Peter Nicholson, head of an ASCE team investigating the levees, said in response to a question of whether transition sections mattered:

> Well, certainly we find that each individual organization will do as they see fit, and when the two sections of the flood control system operated or owned, designed, maintained by each of those different organizations come together, they may be in two different manners. They may have two different heights. They may be two different materials.[57]

The different organizations also have different agendas, and sometimes these can thwart efforts to improve the safety of the overall system. Seed also provided an example where USACE had suggested improvements to the strength of the system that were rejected by the competing organizations. According to Seed:

> No one is in charge. You have got multiple agencies, multiple organizations, some of whom aren't on speaking terms with each other, sharing responsibilities for public safety. The Corps of Engineers had asked to put flood gates into the three canals, which nominally might have mitigated and prevented the three main breaches that did so much destruction downtown. But they weren't able to do that because, unique to New Orleans, the Reclamation Districts who are responsible for maintaining the levees are separate from the Water and Sewage District, which does the pumping. Ordinarily, the Reclamation District does the dewatering pumping, which is separate from the water system. These guys don't get along.[58]

While required inspections of levees were done, some deficiencies in maintenance were not fully addressed

Both USACE and the local sponsors have ongoing responsibility to inspect the levees. Annual inspections are done both independently by USACE and jointly with the local sponsor.[59] In addition, federal regulations require local sponsors to ensure that flood control structures are operating as intended and to continuously patrol the structure to ensure no conditions exist that might endanger it.[60]

Records reflect that both USACE and the local sponsors kept up with their responsibilities to inspect the levees. According to USACE, in June 2005, it conducted an inspection of the levee system jointly with the state and local sponsors.[61] In addition, GAO reviewed USACE's inspection reports from 2001 to 2004 for all completed project units of the Lake Ponchartrain project. These reports indicated the levees were inspected each year and had received "acceptable" ratings.[62]

However, both the NSF-funded investigators and USACE officials cited instances where brush and even trees were growing along the 17th Street and London Avenue canals levees, which is not allowed under the established standards for levee protection.[63] Thus, although the records reflect that inspections were conducted and the levees received acceptable ratings, the records appear to be incomplete or inaccurate. In other words, they failed to reflect the tree growth, and of course, neither USACE nor the local sponsor had taken corrective actions to remove the trees.

In addition, there was apparently seepage from one canal before Hurricane Katrina, indicating problems had developed in the levee after construction. Specifically, residents of New Orleans who live along the 17th Street Canal said water was leaking from the canal and seeping into their yards months before Hurricane Katrina caused the levee system to collapse. The leaks, they said, occurred within several hundred feet of the levee that later failed.[64] National Public Radio, which reported the story, said:

> State and federal investigators say that a leak may have been an early warning sign that the soil beneath the levee was unstable and help explain why it collapsed. They also say if authorities had investigated and found that a leak was

undermining the levee, they could have shored it up and prevented the catastrophic breach.[65]

National Public Radio also reported that work orders confirm that the Sewerage and Water Board had visited the location of the seepage a number of times. However, both USACE and the Orleans Levee District, with shared responsibilities for inspecting the levees, reported that they had not received any reports of seepage at the site.[66]

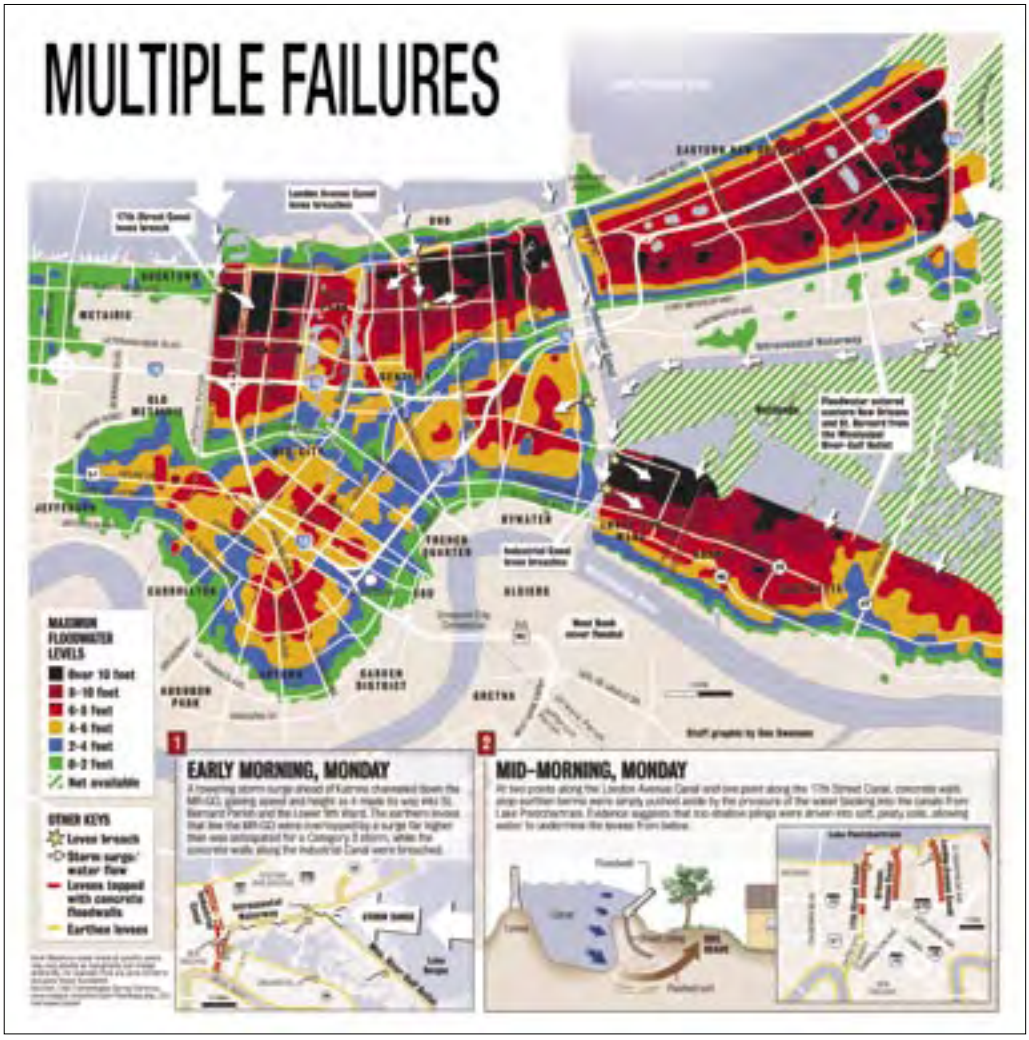
Finding: The lack of a warning system for breaches and other factors delayed repairs to levees

Actual levee breaches caused catastrophic flooding in New Orleans

Katrina made landfall as an "extraordinarily powerful" hurricane.[67] Katrina was expected to be a category 4 or 5 storm, although a recent updated analysis from the National Weather Service concluded it made landfall at the upper end of a category 3 hurricane (with estimated maximum sustained winds of 110 knots) near Buras, Louisiana.[68] While Katrina had weakened from its peak intensity of category 5, it remained a very large hurricane — the extent of tropical-force and hurricane-force winds were as large as predicted when Katrina was at maximum intensity.[69] Due to Katrina's large size, it is possible that sustained winds of category 4 strength briefly affected the extreme southeastern tip of Louisiana.[70] However, the sustained winds over all of metropolitan New Orleans and Lake Ponchartrain likely remained weaker than category 3 strength.[71]

The storm surge, not the winds, is the most destructive part of a hurricane,[72] and Katrina produced a massive storm surge. A precise measurement of Katrina's storm surge in the New Orleans area is difficult to measure, in part because of the widespread failures of tide gauges. However, various efforts are under way to make a definitive determination, particularly near the levees.[73] While the surge varied by location, some preliminary estimates are that the storm surge off Lake Borgne, which abuts New Orleans, was approximately 18-25 feet.[74]

One of the highest credible reports of storm surge came from the Hancock County, Mississippi, emergency operations center, where the storm surge was 27 feet.[75] One reason for the large size of the storm surge was that Katrina, although making landfall as a strong category 3, had already generated large northward propagating swells when it was a category 4 and 5 hurricane during the 24 hours before landfall.[76] One of the instrument buoys



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located south of Dauphin Island, Alabama, measured a wave height of 55 feet — which matches the largest significant wave height ever measured by such a buoy.[77]

Because the eye of Katrina passed just slightly to the east of New Orleans, the hurricane threw unusually severe wind loads and storm surges on the flood protection systems.[78] The surge overtopped large sections of the levees during the morning of August 29 east of New Orleans, in Orleans and St. Bernard Parish, and it also pushed water up the Intercoastal waterway and into the Industrial Canal. The water rise in Lake Ponchartrain strained the floodwalls along the canals adjacent to its southern shore, including the 17th Street Canal and the London Avenue Canal.[79] Breaches along all of these canals led to flooding of 80 percent of New Orleans to depths up to 20 feet.[80] The flooding of central New Orleans led to the most widespread and costly damage of the hurricane. It also led to the difficulties encountered by emergency responders that are documented elsewhere in this report.

The lack of warning systems and degraded communications prevented situational awareness of the breaches in the levees, and delayed repairs

Despite the well-known importance of the levees, and the consequences of failure, the local levee boards responsible for maintaining and operating the levees do not have any warning system in place.[81] Federal regulations require local sponsors to ensure that flood control structures are operating as intended and to continuously patrol the structure *during flood periods* to ensure that no conditions exist that might endanger it.[82] However, it would be impractical to monitor the levees during a hurricane. The Executive Director of the Orleans Levee District, Max Hearn, stated:

> As the hurricane approached, and as water levels began to rise, District employees monitored the water levels and patrolled the flood control system. As weather conditions deteriorated and became unsafe, the District's employees were pulled into sheltered areas to ride out the storm.[83]

Again, with the large number of local organizations involved, it was not always clear who would be responsible for monitoring the levees and sounding the alarm if there was a breach. According to one scientist, "If the lines of responsibility and who is in charge aren't clear, it is very hard to decide who needs to be issuing warnings and public notices…."[84]

Given that Hurricane Katrina led to the loss of power and severely degraded communications, as discussed in the COMMUNICATIONS and COMMAND AND CONTROL chapters, it is not clear that any warning system would have survived or have been effective. In the absence of communications that would have provided situational awareness, there were many rumors of flooding and its causes that had to be confirmed before assessment teams and repair teams could be dispatched. There were many sources of these reports of flooding.

- Monday August 29, at 6:00 a.m., floodwaters began flowing into Jackson Barracks, according to Louisiana National Guard officers. Jackson Barracks is near the Orleans Parish – St. Bernard Parish line, and the floodwaters were determined later to be from the Industrial Canal breach. By late Monday morning, the floodwaters were 8-10 feet deep at Jackson Barracks, requiring the Louisiana National Guard to abandon their operations center and re-establish it at the Superdome.[85]

- Monday, August 29, at 7:30 a.m., the state Emergency Operations center (EOC) received reports of flooding in the last conference call before communications were lost. Jefferson Parish relayed unconfirmed reports of significant flooding in the east bank. New Orleans reported extensive flooding in the east and on the lake front. St. Bernard Parish reported "overtopping" of the Industrial Canal and 3 feet of water in Arabi. When the State Coordinating Officer (SCO) Jeff Smith asked if those flooding rumors were confirmed, the parish deputy sheriff said they were confirmed and noted that his building was surrounded by white caps. Smith also stated he was aware of 3-4 feet of floodwaters at Jackson Barracks.[86]

- Monday, August 29, morning (exact time unknown), USACE district commander first heard sporadic reports about levee overtopping and breaches.[87] The sources of these early reports included local radio stations and a USACE employee reporting overtopping at the Industrial Canal.[88] Later that day, the USACE district commander issued a situation report, noting flooding

with 4-5 feet of water in Kenner (Jefferson Parish); flooding with 10 feet of water in Arabi (St. Bernard Parish); and water coming into Lakeview (New Orleans) from the 17th Street Canal. The report also said that there was a one-block section of the Industrial Canal that had breached.[89]

- Monday, very late evening (exact time unknown), off duty police officers began calling their police stations from their residences to report flooding near the 17th Street and London Avenue Canals, according to the New Orleans Police Department. Deputy Chief Lonnie Swain said that these reports were the department's first knowledge that flooding was moving into central New Orleans — they had been aware of flooding in East New Orleans (from Lake Ponchartrain) and the Lower Ninth Ward (from the Industrial Canal).[90]

Beyond these reports known to the National Guard, the EOC, and the New Orleans Police Department, USACE was trying to determine the detailed status of the levee system. However, the USACE district commander in New Orleans also suffered from a lack of communications capabilities.[91] As noted earlier, there is no early warning system for levee breaches in New Orleans.[92] On Monday at about 3:00 p.m., the commander and a team ventured out to conduct early assessments of the situation. They were unable to conduct a thorough review because of the high winds, debris, and flooding. Although they had to return to the bunker, it was clear to them at that point that New Orleans had suffered catastrophic flooding and they began to review plans for unwatering New Orleans.[93]

On Tuesday, August 30, at about 9:00 a.m., the USACE district commander was able to get a helicopter and see the extent of the flooding from the air.[94] The USACE district office began to develop more detailed plans for repairing the levees after the airborne reconnaissance on August 30.[95] USACE has authority to provide a variety of emergency response actions when levees fail or are damaged.[96] Any repairs to federally constructed levees are funded 100 percent by the federal government.[97]

There were also physical barriers that made assessments and repair difficult. Specifically, emergency repair operations to close some of the breaches were seriously hampered by lack of access roads. USACE regulations generally require access roads on top of levees to allow for inspections, maintenance, and flood-fighting operations, and most USACE levees built in the United States meet this requirement.[98] However, in New Orleans, exceptions were made to these regulations because of its highly urban nature. Access roads were foregone when it was decided to use I-walls in the levee crowns to minimize right-of-ways into surrounding neighborhoods.[99] When Hurricane Katrina led to the breaches in the levees, the lack of access roads atop the levees resulted in very significant increases in time and cost to repair the damaged areas.

FEMA

Poor communications, difficulties in doing assessments, and physical barriers all served to delay efforts to repair the levees. Levee repairs did not begin until Wednesday, when USACE began marshalling resources — such as contractors, materials, and equipment — at the 17th Street Canal site.[100] The Louisiana National Guard was also involved in these early efforts to conduct emergency repairs of the 17th Street Canal. That afternoon, USACE began dropping 3,000 pound sandbags into the breach.[101] The next day contractors started delivering sand, gravel, and rock to the breach site on a newly-built access road. At both the 17th Street Canal and the London Avenue Canal, Army Chinook and Blackhawk helicopters dropped 7,000 pound sandbags—an average of 600 per day—into the breaches. One breach took over 2,000 sandbags before engineers could see the bags under the water surface. According to one witness before the Select Committee, the need for sand was so great that USACE broke into a local business and "took" $580,000 worth of sand.[102] One week later, the 17th Street Canal breach was closed.[103]

Once the levee repairs were underway, USACE turned its attention to unwatering New Orleans and other flooded areas.[104] Since at least 2000, USACE has had a detailed plan for unwatering greater New Orleans in

the event of flooding. These unwatering plans were also discussed in the "Hurricane Pam"exercise (discussed previously).[105] The exercise assumed the levees did not breach, however there was flooding due to overtopping which inundated New Orleans with at least 10 feet of water. The purpose of the USACE unwatering mission was to remove water from flooded areas (New Orleans), seal off canals from Lake Ponchartrain, repair breaches, create a series of deliberate breaches in the levee system (to help drain them), and pump out final excess with existing and temporary pumps.[106]

Through an emergency contracting process, USACE contacted four companies to complete the unwatering activities and, according to USACE, only one company—Shaw Environmental of Baton Rouge—could respond in a timely manner.[107] Projections made prior to Hurricane Katrina that it would take nine weeks to unwater New Orleans proved unfounded.[108] On October 11 (43 days after Katrina landfall) USACE reported that all floodwaters had been removed from the city of New Orleans.[109]

Finding: Ultimate cause of levee failures is under investigation, results to be determined

Several investigations are under way to assess causes of levee failure

There are at least four ongoing "forensic" investigations to determine the cause of the levee breaches around New Orleans. These are being done by USACE's Engineer Research and Development Center; the Center for the Study of Public Health Impacts of Hurricanes, LSU; the National Science Foundation, and ASCE. Each of these investigations has somewhat similar charters and overlapping membership.[110]

- Interagency Performance Evacuation Task Force (IPET). The USACE Chief Engineer appointed the IPET, headed by the Engineer Research and Development Center, to examine and analyze data in a variety of areas (e.g., Geodetic Reference Datum, Storm and Surge Wave Modeling, Hydrodynamic Forces). At the request of the Secretary of Defense, the results will be analyzed independently by ASCE and the National Research Council.[111]

- Louisiana State University (LSU). The Hurricane Center was appointed by the State of Louisiana to lead the state's forensic investigation of the Hurricane Katrina levee failures. The investigation team includes engineers and coastal scientists conducting analysis of the storm surge levels, levee construction, and levee failures.[112]

- National Science Foundation (NSF). NSF assembled a Levee Investigation Team consisting of leading national and international experts in major disasters.[113] Participating teams of scientists are from the University of California, Berkeley; the Geo-Institute of ASCE; the Coasts, Oceans, Ports and Rivers Institute of ASCE; and the Hurricane Research Center of LSU.[114]

- American Society of Civil Engineers (ASCE). ASCE assembled an independent team of experts, consisting of professional engineers with a wide range of geotechnical engineering expertise in the study, safety, and inspection of dams and levees. The purpose of the team is to collect data and make observations to determine why certain sections of the levee system failed and others did not.[115]

Preliminary results suggest some levees did not withstand forces they were designed to withstand

Some of the investigators testified or released reports on their preliminary findings. For example, at a November 2, 2005, Senate Hearing, witnesses included Paul Mlakar, of IPET; Ivor Van Heerden, of LSU; Raymond Seed of the University of California, Berkeley, representing the NSF; and Peter Nicholson of the University of Hawaii, representing the ASCE.[116] These witnesses (except Mlakar) testified on the preliminary findings from their investigations. In addition, the NSF and ASCE investigators released a joint interim report, with initial findings, at that hearing.[117] A month after the Senate Hearing, IPET released an interim report with a summary of its field observations, which generally concurred with the NSF/ASCE interim report.[118] In evaluating the causes of levee and floodwall failure, these preliminary reports indicated the impact of the hurricane, and thus the potential causes of the breaches, varied by location.[119]

According to preliminary information from NSF, ASCE, and LSU, most of the levees and floodwall breaches on the east side of New Orleans were caused by overtopping,

as the storm surge rose over the tops of the levees and/or their floodwalls and produced erosion that subsequently led to breaches.[120] A variety of factors led to overtopping of the Industrial Canal and the Mississippi River Gulf Outlet (MR-GO). An LSU Scientist, Hassan Madhriqui, said that MR-GO worked as a funnel which increased the height of the storm surge and "caused floodwaters to stack up several feet higher than elsewhere in the metro area and sharply increased the surge's speed as it rushed through the MR-GO and into the Industrial Canal."[121] The overtopping eroded the backside of the canals, scoured out the foundations, and led to their collapse and thus major flooding of adjacent neighborhoods. According to Seed, "A majority of them [levee breaches] were the result of overtopping, and that simply means that the hurricane was bigger than the levees were built to take…."[122]

In contrast, there was little or no overtopping along most of the levees in the vicinity of Lake Ponchartrain. The only breach along Lake Ponchartrain was in New Orleans East, which was probably due to overtopping. But in the drainage canals that feed into Lake Ponchartrain — the 17th Street and London Avenue Canal — there was no overtopping, and the failures were likely caused by weaknesses in the foundation soil underlying the levees, the weakness in the soils used to construct the earthen levee embankments themselves, or weaknesses caused by vegetation growing along the levees. These were the most costly breaches, leading to widespread flooding of central New Orleans — to include the downtown area and several large residential neighborhoods.[123] According to Van Heerden of LSU, "the surge in Lake Ponchartrain wasn't that of a category 3 storm, and nor did it exceed the design criteria of the standard project hurricane."[124] Nicholson of ASCE concurred with this assessment, adding, "If the levees [on Lake Ponchartrain] had done what they were designed to do, a lot of the flooding of New Orleans would not have occurred, and a lot of the suffering that occurred as a result of the flooding would not have occurred."[125]

However, these findings are preliminary.[126] Most of the investigations will not issue their final reports until the spring or summer of 2006. For example, the USACE IPET report is scheduled to be completed in June 2006.[127] Possible causes of the levee breaches include a design not appropriate for the actual application (indicating a shared deficiency), storm conditions simply too overwhelming for the designed levees to withstand (indicating an act of nature); levee walls not secured deeply enough into the soil or otherwise improperly constructed (indicating a USACE deficiency); improper maintenance of the levees (indicating a local deficiency); or a combination of factors.

Conclusion

STATE OF LOUISIANA

Hundreds of miles of levees were constructed to defend metropolitan New Orleans against storm events. These levees were not designed to protect New Orleans from a category 4 or 5 monster hurricane, and all the key players knew this. The original specifications of the levees offered protection that was limited to withstanding the forces of a moderate hurricane. Once constructed, the levees were turned over to local control, leaving the USACE to make detailed plans to drain New Orleans should it be flooded.

The local sponsors — a patchwork quilt of levee and water and sewer boards —were responsible only for their own piece of levee. It seems no federal, state, or local entity watched over the integrity of the whole system, which might have mitigated to some degree the effects of the hurricane. When Hurricane Katrina came, some of the levees breached — as many had predicted they would — and most of New Orleans flooded to create untold misery.

The forces that destroyed the levees also destroyed the ability to quickly assess damage and make repairs. The reasons for the levee failures appear to be some combination of nature's wrath (the storm was just too large) and man's folly (an assumption that the design, construction, and maintenance of the levees would be flawless). While there was no failure to predict the inevitability and consequences of a monster hurricane — Katrina in this case — there was a *failure of initiative* to get beyond design and organizational compromises to improve the level of protection afforded. ■

[1] *See* Eric S. Blake, et al., Tropical Prediction Center, U.S. Dep't of Commerce, NOAA Technical Memorandum NWS TPC-4, *The Deadliest Costliest, and Most Intense U.S. Tropical Cyclones from 1851 to 2004* (and Other Frequently Requested Hurricane Facts, (Aug. 2005) *available at* http://www.nhc.noaa.gov/paststate.shtml (last visited Jan. 24, 2006); Anu Mittal, U.S. Gov't Accountability Off., Pub. No. GAO-05-1050T, *Testimony Before the Subcommittee on Energy and Water Development, Committee on Appropriations, House of Representatives, Army Corps of Engineers: Lake Pontchartrain and Vicinity Hurricane Protection Project* [hereinafter GAO *Hurricane Protection Project*], at 2 (Sept. 28, 2005); R.B. Seed, et al., U. of Calif. at Berkely and Am. Soc'y of Civil Engineers, Rept. No. UCB/CITRIS – 05/01, *Preliminary Report on the Performance of the New Orleans Levee System in Hurricane Katrina on August 29, 2005* [hereinafter *Report on Levee Performance*], at 1-4 (Nov. 2, 2005) (support for subsidence); IEM, Inc., IEM/TEC04-070 r5, *Southeast LA Catastrophic Hurricane Functional Plan [SE LA Functional Hurricane Plan*], at 5 (Jan. 5, 2005).

[2] U.S Army Engineer District, New Orleans, *Un-watering Plan Greater Metropolitan Area, New Orleans, LA* [hereinafter *Un-Watering Plan*], at 1 (Aug. 18, 2000).

[3] New Orleans District, U.S. Army Corps of Engineers, *Hurricane Betsy, September 8-11, 1965: After Action Report*, 1-5 (July 1966) (Included as App. E in *Un-Watering Plan*).

[4] *Id*. at 2.

[5] *Id*. at 4.

[6] *Id*. at 32.

[7] *Id*. at 24.

[8] *Id*. at 5.

[9] *Id*. at 29.

[10] *Id*. at 26.

[11] *Hearing on Hurricane Katrina: Who's In Charge of the New Orleans Levees? Before U.S. Senate Committee on Homeland Security and Governmental Affairs* [hereinafter *Senate Hearing: Who's in Charge of Levees*], 109th Cong. (Dec. 15, 2005) at 2 (written statement of Max. L. Hearn, Executive Director, Orleans Levee District); *Report on Levee Performance*, at 1-3.

[12] GAO *Hurricane Protection Project*, at 2.

[13] Flood Control Act of 1965. Pub. L. No. 89-298, § 204, 79 Stat. 103, 1077 (1965) (The Flood Control Act of 1965 authorized this project).

[14] The Industrial Canal is also known as the Inner Harbor Navigation Canal.

[15] *Senate Hearing: Who's in Charge of Levees*, at 1-2 (written statement of Col. Richard P. Wagenaar, Commander and District Engineer, New Orleans District, U.S. Army Corps of Engineers); GAO Hurricane Protection Project, at 3.

[16] Interview by Select Comm. Staff with David Pezza [hereinafter Pezza Interview], U.S. Army Corps of Engineers (Dec. 9, 2005); GAO *Hurricane Protection Project*, at 3.

[17] *Un-Watering Plan*, at 1.

[18] GAO *Hurricane Protection Project*, at 4; U.S. Army Corps of Engineers, Release No. PA-05-08, *News Release: U.S. Army Corps of Engineers Hurricane Relief Support and Levee Repair*, (Sept. 3, 2005) (hurricane protection projects were designed to withstand forces of a hurricane that has a 0.5 percent chance of occurrence in any given year).

[19] The U.S. Weather Service is now the National Weather Service.

[20] GAO *Hurricane Protection Project*, at 4-5.

[21] *Hearing on Hurricane Protection Plan for Lake Pontchartrain and Vicinity Before the House Comm. on Public Works and Transportation Subcommittee on Water Resources* [hereinafter *1978 Hearing on Protection Plan for Lake Pontchartrain*], 95th Congress, 45 at 16, (Jan. 5, 1978) (statement of Col. Early Rush, District Engineer, US Army Engineer District, New Orleans) (When USACE designs flood protection projects, it models forces that were expected from the most severe combination of meteorological conditions reasonably characteristic of the region approaching from different paths. This is one of the reasons why, there is a great deal of variability among the heights of the different parts of the flood protection system).

[22] USACE *News Release: Levee Repair*; GAO *Hurricane Protection Project*, at 1, 4; Anu K. Mittal, U.S. Gov't Accountability Office, Pub. No. GAO-06-322T, *Testimony Before the Committee on Homeland Security and Governmental Affairs, U.S. Senate: Hurricane Protection: Statutory and Regulatory Framework for Levee Maintenance and Emergency Response for the Lake Pontchartrain Project* [hereinafter GAO *Hurricane Protection: Statutory Framework*], at 2 (Dec. 15, 2005); *Un-Watering Plan*, at 3.

[23] GAO *Hurricane Protection: Statutory Framework*, at 4-5.

[24] *Id*.

[25] *Id*. at 5.

[26] *Report on Levee Performance*, at 1-3, 1-4.

[27] *Un-Watering Plan*, at 6.

[28] U.S. Water Resources Council, *Economic and Environmental Principals for Water and Related Land Resourcess Implementation Studies*, at iv, vi, 12 (Mar. 10, 1983) (These guidelines apply to USACE, among other agencies, and require calculations of impact on (a) national economic development, (b) environmental quality, (c) regional economic impact, and (d) other social effects. The last category includes "urban and community impacts: life, health, safety" and others).

[29] *1978 Hearing on Protection Plan for Lake Pontchartrain*, at 16 (statement of Col. Early Rush).

[30] *See* Eric Lipton, *White House Was Told Hurricane Posed Danger*, N.Y. TIMES, Jan. 24, 2006, at A6.

[31] William L. Waugh, Jr., *The Disaster That Was Katrina*, NATURAL HAZARDS OBSERVER, Vol. XXX No. 2, Nov. 2005, at 7-8.

[32] *Id*.

[33] Shirley Laska, *What if Hurricane Ivan Had Not Missed New Orleans?*, NATURAL HAZARDS OBSERVER, Vol. XXIX No. 2, Nov. 2004, at 5-6.

[34] *Id*.

[35] *Un-Watering Plan*, at 1.

[36] *Id*. at 7.

[37] *Id*.

[38] GAO *Hurricane Protection Project*, at 8.

[39] Bob Marshall, *Hurricane Pam Exercise Offered Glimpse of Katrina Misery*, TIMES PICAYUNE (New Orleans) Sept. 9, 2005.
[40] National Weather Service, New Orleans, LA, Urgent - *Weather Message, ...Devastating Damage Expected...*, 10:11 AM CDT (Aug. 28, 2005).
[41] Interview of Kathleen Babineaux Blanco, Governor of LA, CNN Saturday Night, (Aug. 28, 2005) (8:00 p.m. ET).
[42] Press Conference by C. Ray Nagin, Mayor of New Orleans, and Kathleen Babineaux Blanco, Governor of LA, MSNBC, et al, Aug. 28, 2005.
[43] Pezza Interview; *Senate Hearing: Who's in Charge of Levees,* at 2 (written statement of Director Hearn); *Report on Levee Performance*, at 6-1; GAO *Hurricane Protection Project*, at 3.
[44] Pezza Interview; *Senate Hearing: Who's in Charge of Levees*, at 2 (written statement of Director Hearn); *Report on Levee Performance*, at 6-1; GAO *Hurricane Protection Project*, at 3.
[45] 33 U.S.C. §701t (2005) (They are eligible as long as they are active in USACE's Rehabilitation Inspection Program. To be eligible, they have to pass annual inspections by USACE, which was the case for the Lake Ponchartrain project).
[46] Pezza Interview.
[47] Pezza Interview; *Senate Hearing: Who's in Charge of Levees*, at 3 (written statement of Director Hearn); GAO *Hurricane Protection: Statutory Framework*, at 6.
[48] *Hearing on Hurricane Katrina: Why Did the Levees Fail? Before U.S. Senate Committee on Homeland Security and Governmental Affairs* [hereinafter *Senate Hearing: Why Did Levees Fail*], 109th Cong. (Nov. 2, 2005) (statement of Raymond B. Seed, Professor of Civil and Environmental Engineering, University of California, Berkley)
[49] *Senate Hearing: Who's in Charge of Levees* (written statement of Col. Wagenaar at 2); GAO *Hurricane Protection: Statutory Framework*, at 6.
[50] Pezza Interview; GAO *Hurricane Protection: Statutory Framework*, at 8.
[51] Pezza Interview; GAO *Hurricane Protection: Statutory Framework*, at 9.
[52] *Senate Hearing: Who's in Charge of Levees* (written statement of Col. Wagenaar at 2); GAO *Hurricane Protection: Statutory Framework*, at 6.
[53] *Senate Hearing: Why Did Levees Fail* (statement of R.B. Seed).
[54] *Un-Watering Plan,* at 4.
[55] Interagency Performance Evaluation Task Force, *Interim Report to Task Force Gaurdian, Summary of Field Observations Relevant to Flood Protection in New Orleans* [hereinafter *Interim Report on Flood Protection in New Orleans*], LA, at 7 (Dec. 5, 2005).
[56] *Senate Hearing: Why Did Levees Fail* (statement of R.B. Seed).
[57] *Senate Hearing: Why Did Levees Fail* (statement of Peter Nicholson, Associate Professor, Civil and Environmental Engineering, University of Hawaii).
[58] *Senate Hearing: Why Did Levees Fail* (statement of R.B. Seed).
[59] Pezza Interview; *Senate Hearing: Who's in Charge of Levees,* at 3 (written statement of Director Hearn).
[60] Pezza Interview; GAO *Hurricane Protection: Statutory Framework*, at 9.
[61] *Senate Hearing: Who's in Charge of Levees,* at 2 (written statement of Col. Wagenaar).
[62] GAO *Hurricane Protection: Statutory Framework*, at 10.
[63] Pezza Interview; *Report on Levee Performance*, at 2-2.
[64] Frank Langfitt, *Residents Say Levee Leaked Months Before Katrina National Public Radio*, NATIONAL PUBLIC RADIO, MORNING EDITION (Nov. 22, 2005), *available at* http://www.npr.org/templates/story/story.php?storyId=5022074 (last visited Feb. 1, 2005).
[65] *Id*.
[66] *Id*.
[67] Richard D. Knabb, et al., National Hurricane Center, Dep't of Commerce, *Tropical Cyclone Report: Hurricane Katrina 23-30 August 2005* [hereinafter NHC: *Hurricane Katrina*], at 1, (Dec. 20, 2005).
[68] *Id*. at 1.
[69] *Id*.
[70] *Id*. at 7.
[71] *Id*. at 8.
[72] *Id*. at 11; GAO Hurricane Protection Project, at 2.
[73] NHC: *Hurricane Katrina*, at 8.
[74] *Report on Levee Performance*, at 1-4.
[75] NHC: *Hurricane Katrina*, at 8.
[76] *Id*. at 9.
[77] *Id*.
[78] *Report on Levee Performance*, at 1-2; NHC: *Hurricane Katrina*, at 9 (Additional support that the surge severely strained the levee system).
[79] NHC: *Hurricane Katrina*, at 9.
[80] *Id*.
[81] Pezza Interview.
[82] GAO *Hurricane Protection: Statutory Framework*, at 9.
[83] *Senate Hearing: Who's in Charge of Levees*, at 4 (written statement of Director Hearn).
[84] *Senate Hearing: Why Did Levees Fail* (statement of R.B. Seed).
[85] Interview by Select Comm. Staff with General Joseph B. Veillon, Assistant Adjutant General for Air, LA Air Nat'l Guard in Baton Rouge, LA (Nov. 3, 2005).
[86] Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Aug. 26-29, 2005).
[87] *Senate Hearing: Who's in Charge of Levees*, at 4 (written statement of Col. Wagenaar).
[88] *Id*. at 5.
[89] Richard P. Wagenaar, Col., New Orleans District, U.S. Army Corps of Engineers, *Situation report: Event Hurricane Katrina*, (Aug. 29, 2005).
[90] Interview by Select Comm. Staff with Lonnie Swain, Deputy Police Superintendent, New Orleans Police Dep't, in New Orleans, LA, (Nov. 9, 2005).
[91] *Senate Hearing: Who's in Charge of Levees* (written statement of Col. Wagenaar).

[92] Pezza Interview.
[93] *Senate Hearing: Who's in Charge of Levees* (written statement of Col. Wagenaar).
[94] *Id*. at 5.
[95] *Id*. at 6.
[96] Flood Control Act of 1941 § 5, 33 U.S.C. § 701n (2005) (Authorizes USACE to conduct emergency operations and rehabilitation activities when levees fail or are damaged and allows USACE to provide emergency operations to include technical assistance and direct assistance—providing sandbags and pumps, emergency contracting, and levee reinforcement. USACE administrative policies, guidance, and operating procedures for natural disaster preparedness, response, and recovery activities are set out in 33 C.F.R. Part 203 (2005).); *see Senate Hearing: Who's in Charge of Levees*, at 3 (written statement of Col. Wagenaar); also GAO *Hurricane Protection: Statutory Framework*, at 14-15.
[97] GAO *Hurricane Protection: Statutory Framework*, at 10.
[98] U.S. Army Corps of Engineers, Manual No. 1110-2-1913, *Engineering and Design: Design and Construction of Levees*, 8-9 (Apr. 30, 2000).
[99] *See Interim Report on Flood Protection in New Orleans*, at 12-13.
[100] Lieutenant Colonel Pease, U.S. Army Corps of Engineers, US Army Corps of Engineers Support to Hurricane Katrina Response, (Aug. 31, 2005).
[101] *Id*.
[102] *Hearing on Hurricane Katrina: Voices from Inside the Storm Before Select Comm*., 109th Cong., (Dec. 6, 2005) (statement of Harry Alford, President, National Black Chamber of Commerce).
[103] *Senate Hearing: Who's in Charge of Levees* (written statement of Col. Wagenaar).
[104] *Id*.
[105] *See Un-Watering Plan; SE LA Functional Hurricane Plan*, at 6-7.
[106] *U.S. Army Corps of Engineers, USACE/ESF#3: Hurricane Season 2005*, at 23 (Oct. 28, 2005) (on file with the Select Comm.).
[107] *Hearing on Hurricane Katrina: The Federal Government's Use of Contractors to Prepare and Respond Before the Select Comm.*, 109th Cong., (Nov. 2, 2005) (written statement of Norbert Doyle, Col., Principal Assistant Responsible For Contracting (Acting), U.S. Army Corps Of Engineers).
[108] Shirley Laska, *What if Hurricane Ivan Had Not Missed New Orleans?*, NATURAL HAZARDS OBSERVER, Vol. XXIX No. 2, Nov. 2004, at 6.
[109] NHC: *Hurricane Katrina*, at 9; *see* SE LA Functional Hurricane Plan, at 6.
[110] *Senate Hearing: Why Did Levees Fail* (statement of Sen. Susan M. Collins, Chairman).
[111] *Senate Hearing: Why Did Levees Fail* (written statement of Paul F. Mlakar, Ph.D., P.E., Senior Research Scientist, U.S. Army Research and Development Center).
[112] Louisiana State U. Hurricane Center, *Newsbriefs*, http://hurricane.lsu.edu/newsbriefs.htm (last visited Jan. 29, 2006).
[113] *Senate Hearing: Why Did Levees Fail* (statement of Peter Nicholson).
[114] *Senate Hearing: Why Did Levees Fail* (statement of R.B. Seed).
[115] *Report on Levee Performance*, at 1-1.
[116] *See Senate Hearing: Why Did Levees Fail*.
[117] *Senate Hearing: Why Did Levees Fail* (statement of Sen. Collins).
[118] *See Interim Report on Flood Protection in New Orleans.*
[119] *Report on Levee Performance*, at v; *Senate Hearing: Why Did Levees Fail* (written statement of Paul F. Mlakar).
[120] *Report on Levee Performance,* at iv; *Senate Hearing: Why Did Levees Fail* (statement of Ivor L. van Heerden, Ph.D., Deputy Director, LA State U. Hurricane Center).
[121] *Report on Levee Performance,* at 1-5; Matthew Brown, *Katrina may mean MR-GO has to go*, TIMES-PICAYUNE (New Orleans), Oct. 24, 2005, at 1; *Senate Hearing: Why Did Levees Fail* (statement of Ivor L. van Heerden).
[122] *Senate Hearing: Why Did Levees Fail* (statement of R.B. Seed).
[123] *Report on Levee Performance*, at 1-5; *Senate Hearing: Why Did Levees Fail* (written statement of Paul F. Mlakar) and (statement of Ivor L. van Heerden).
[124] *Senate Hearing: Why Did Levees Fail* (statement of Ivor L. van Heerden).
[125] *Senate Hearing: Why Did Levees Fail* (statement of Peter Nicholson).
[126] *Report on Levee Performance*, at cover, v.
[127] U.S. Army Corps of Engineers, Release No. PA-05-18, *News Release: Interagency Performance Evaluation Task Force – Testing Report on Sheet Pile Foundation Lengths in New Orleans Levees*, (Dec. 9, 2005).

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"At the local level, I think the biggest failure was leadership didn't take into account the fact that poor residents had no way of evacuating. I also think Governor Blanco should have called for a mandatory evacuation sooner and that Mayor Nagin should have coordinated better with Amtrak."

Terrol Williams
New Orleans Citizen and Evacuee
Select Committee Hearing, December 6, 2005

"We estimate that over 1 million people, or approximately 90 percent of the affected parishes' populations, evacuate[d] in about a 40-hour period. I don't know of any other evacuation that has occurred with that many people under these circumstances with that high of percentage of people being evacuated in that short of a time period."

Colonel (Ret.) Jeff Smith
Deputy Director, Louisiana Office of Homeland Security
and Emergency Preparedness
Select Committee Hearing, December 14, 2005

Failure of complete evacuations led to preventable deaths, great suffering, and further delays in relief

Summary

Evacuation is a critical part of emergency preparation for a hurricane. Such preparation includes both detailed evacuation planning and implementation of the evacuation plan in potentially affected areas once a hurricane is projected to make landfall. The states of Alabama, Mississippi, and Louisiana, and many of their localities (e.g., New Orleans) have hurricane evacuation plans and years of experience implementing them.

In Alabama and Mississippi, the state or localities declared mandatory evacuations as Hurricane Katrina approached, and implementation of their evacuation plans went relatively well. In Louisiana, the state and local implementation of evacuation plans for the general population also went well, resulting in one of the largest emergency evacuations in history.

Two of Louisiana's most populous localities, New Orleans and Jefferson Parish, declared mandatory evacuations late or not at all. While the definition of "mandatory" evacuation and the associated obligations and liabilities that local governments assume are still being debated, early designation of the evacuation of New Orleans as mandatory could have increased the number of people that left, resulting in a more complete evacuation, saving lives, and reducing suffering. New Orleans city officials, who were responsible for executing an evacuation plan and who had the authority to commandeer resources to assist in the evacuation, failed to evacuate or assist in the evacuation of more than 70,000 individuals who did not leave either before the announcement of the mandatory evacuation or before the storm hit. Those who did not evacuate included many who did not have their own means of transportation. Despite the declaration of a mandatory evacuation on Sunday before landfall, New Orleans officials still did not completely evacuate the population. Instead, they opened the Superdome as a "shelter of last resort" for these individuals.

Problems sheltering this population, beyond emergency planners' general preference for evacuation, were exacerbated by inadequate preparations for a large population at the Superdome. For those with medical or special needs, New Orleans and other institutions also failed to evacuate them, but instead sheltered them — a decision that also had negative consequences and is discussed in detail in the MEDICAL CARE chapter. Those individuals in all states who had the means to evacuate, but did not do so, must also share the blame for the incomplete evacuation and the difficulties that followed.

The failure of a more complete evacuation led to catastrophic circumstances when Katrina made landfall, particularly in New Orleans where the force of the hurricane breached the levee system in multiple locations throughout the metropolitan area. As the resulting floodwaters spread through low lying urban areas,

AP PHOTO/DAVE MARTIN

AP PHOTO/DAVID J. PHILLIP, POOL

thousands of people who were trapped in their homes climbed to their roofs or fled into flooded streets. Fortunately, thousands of these people were saved by a massive and heroic search and rescue effort. But many were not as fortunate, and hundreds of people died in their homes or other locations, presumably from drowning. Those who were in the Superdome, or those that found shelter and high ground at other locations, suffered horrible conditions. The floodwaters, which had been anticipated and even predicted from a large hurricane such as Katrina, furthered the misery and delayed the immediate relief of the remaining population.

The incomplete evacuation and floodwaters also required a post hurricane evacuation, for which federal, state, and city officials had not prepared. Because of a lack of preparations, planning had to be accomplished in emergency circumstances, where communications and situational awareness were in short supply. Requirements for buses kept growing as a lack of willing drivers and diversions of buses continued to delay the evacuation of the Superdome and other locations. Finally, the combination of more buses and supplemental airlifts resulted in a complete evacuation of New Orleans.

Finding: Evacuations of general populations went relatively well in all three states

Evacuation is a critical part of emergency preparation for a hurricane

Because of the destructive forces of hurricanes, evacuation planning is very important. Preparation for an approaching hurricane includes both detailed evacuation planning and implementation of that plan in potentially affected areas once a hurricane is projected to make landfall. Federal Emergency Management Agency (FEMA) officials told Select Committee staff that emergency planners prefer evacuation to sheltering people within affected areas because the sheltered population is subject to the most intense dangers of the storm and because it may be a slow and difficult operation to get relief personnel and supplies back into hurricane ravaged areas.

The state of Louisiana has an evacuation plan, which was revised following Hurricane Ivan in 2004. The evacuation for that storm had caused massive traffic jams leading out of New Orleans. Those traffic jams were the result of the southernmost parishes trying to evacuate at the same time as Orleans and Jefferson Parishes, the two most populous parishes. The new plan called for a staged evacuation with the southernmost parishes evacuating first, followed by Lower Orleans and Jefferson Parishes, and then Upper Orleans and Jefferson Parishes, facilitated by the implementation of contraflow (one-way outbound traffic) on the highways leading out of New Orleans.[1]

AP PHOTO/BILL HABER

In addition to the Louisiana state plan, local governments have emergency evacuation plans. The City of New Orleans Comprehensive Emergency Management Plan ("New Orleans Plan") provides: "The authority to order the evacuation of residents threatened by an approaching hurricane is conferred to the Governor by Louisiana statute."[2] But this power "is also delegated to each political subdivision of the State by Executive Order."[3]

The New Orleans Plan further explains: "This authority empowers the chief elected official of New Orleans, the Mayor of New Orleans, to order the evacuation of the parish residents threatened by an approaching hurricane."[4] Under this authority, the Mayor of New Orleans is responsible for giving the order for a mandatory evacuation and supervising the actual evacuation of his population. The Mayor's Office of Emergency Preparedness must "[c]oordinate with the State . . . on elements of evacuation"

and "[a]ssist in directing the transportation of evacuees to staging areas."[5]

The importance of evacuations is expressed in the New Orleans Plan: "The safe evacuation of threatened populations . . . is one of the principle reasons for developing a Comprehensive Emergency Management Plan."[6] In furtherance of that goal, "[t]he city of New Orleans will utilize all available resources to quickly and safely evacuate threatened areas."[7]

Mississippi also has a state evacuation plan, one that takes account of local plans because of the key role that counties play in declaring evacuations. According to the testimony of the Director of the Mississippi Emergency Management Agency (MEMA), Robert Latham, the authority to make decisions about mandatory evacuations in Mississippi rests with local governments.[8] However, the state is generally included in any discussions about evacuation orders because, once a city or county chooses to make such an order, state responsibilities for managing traffic (including contraflow) and opening shelters can come into play.[9] In preparing for Hurricane Katrina, the Mississippi officials worked through the MEMA liaisons it dispatched to the counties along or near the Gulf Coast as well as a representative it had stationed in Louisiana's emergency operations center (because of contraflow agreements between Mississippi and Louisiana that provide for evacuations out of southeast Louisiana through Mississippi).[10]

Alabama also has an evacuation plan and recently revised it. Lessons learned during Alabama's response to Hurricanes Ivan and Dennis helped refine the state's actions as Katrina neared. Having been criticized for triggering evacuations that turned out to be unnecessary, Alabama officials practiced to reduce the time required to reverse traffic flows on the major routes and encouraged

AP PHOTO/CHERYL GERBER

AP PHOTO/JOHN DAVID MERCER, POOL

county and local officials to define smaller evacuation zones within their jurisdictions to better target evacuation actions. According to Governor Riley:

> On Katrina there was an evacuation plan that was a little more moderate than I had hoped for, and we convinced everyone in the room to expand it. The time before, as I said earlier, we got some criticism because we may have expanded it too much. We have gone back and built a zone type process. But we take all of the local team, because you have to have local buy-in because it won't work if you don't.[11]

Alabama state and county officials testified that one of their difficulties in planning evacuations is that Army Corps of Engineers data used as the basis for evacuation plans and models is outdated. According to Alabama Emergency Management Agency (AEMA) Director Bruce Baughman:

> The two coastal counties have had studies done by the [Army] Corps of Engineers. Those studies were about five years old. In the case of Mobile County, the data did not include the windfields. So it doesn't give you complete information when you are trying to make decisions on clearance times …. [I]t is based upon dated information. Baldwin County has grown by leaps and bounds so that you have got a higher population. And not only that, before Labor Day, you have got probably 100,000 people … as far as outside individuals that are tourists down in that area, and that is not computed into your clearance

times. What we have done is we have taken the data that is available that is between 22 and 24 hour clearance times for those two counties, and generally we allow 26 to 28 hour clearance times. But that is a best guess. What we need to do is based upon some real time data, so other studies need to be done in that particular area. That used to be funded out of the Hurricane Preparedness Program, and those studies are lagging way behind.[12]

Mississippi declared mandatory evacuations which generally went well

Mississippi evacuations were generally mandatory and went relatively well. Five Mississippi counties — Hancock, Jackson, Harrison, Stone, and Pearl River — issued mandatory evacuation orders on or before August 28 for specific areas or zones of their counties and/or those living in mobile homes.[13] For example, Harrison County first issued a mandatory evacuation order for its zones A and B, which include all of its Gulf-front and low-lying areas, at 10 a.m. on August 28; it strongly advised, but did not mandate, that residents in its highest elevations (zone C) evacuate the county.[14] According to Governor Haley Barbour, he has the authority to usurp county officials' decisions — that is, order a mandatory evacuation if they have not — but he chose not to do so because county officials are closer to the situation than he is.[15]

STATE OF MISSISSIPPI

During the evacuation, Mississippi Department of Transportation personnel collected and reported traffic flow information along evacuation routes, including areas where contraflow was in place for those evacuating Louisiana. At 7 p.m. on August 28, traffic counts were "consistently high" and the contraflow areas showed a continuous increase in traffic.[16] According to traffic counts, by 11 p.m. that evening, traffic along the evacuation/contraflow routes had decreased substantially.[17]

Rep. Gene Taylor asserted, however, that evacuation planning ought to include providing people with gasoline, especially at the end of the month:

> The other thing that I find interesting is that in all these scenarios that I'm sure you've thought out, did FEMA bother to realize that it is the 28th of the month, a lot of people live on fixed income, be it a Social Security check or a retirement check, they've already made their necessary purchase for the month. What they couldn't envision is having to fill up their gas tank one more time, at almost 3 bucks a gallon just to get the heck out of there. What I think no one is really focused on is a heck of a lot of people who stayed behind were people with limited means.[18]

Former Undersecretary Brown strongly opposed the suggestion that FEMA should have supplied gasoline:

> Congressman, FEMA is not there to supply gasoline, transportation; it is not the role of the federal government to supply five gallons of gas for every individual to put in a car to go somewhere. I personally believe that is a horrible path to go down. And while my heart goes out to people on fixed incomes, it is primarily a Sate and local responsibility.[19]

Whether providing gasoline should be a federal or state and local responsibility, there may very well have been victims of Hurricane Katrina who did not evacuate because at the end of the month they had run out of money for gasoline and found no other way to get gasoline or evacute.

Alabama mandatory evacuations also went relatively well

Alabama began implementing the evacuation early, and its evacuation also went well. Even before any Alabama evacuations began, AEMA and state transportation officials participated in the FEMA regional Evacuation Liaison Team conference calls during which emergency managers from Florida, Louisiana, and Mississippi shared information on the status of evacuation routes, road closures, traffic volumes, hotel availability, and other interstate implications of significant population migrations in the region.[20]

As it became clear Katrina would have a significant impact on the Alabama coast, Baldwin County emergency management officials called for a voluntary evacuation of all coastal, flood-prone, and low lying areas at 5 p.m. on Saturday, August 27.[21] State emergency management officials asked the Governor to declare a mandatory evacuation for threatened areas of Baldwin and Mobile Counties on Sunday, August 28.[22] According to the announcement released by the Governor's office, "In Baldwin County, the order calls for the evacuation of those on Plash Island, the Fort Morgan peninsula, and all areas south of Fort Morgan Road for Gulf Shores. The order also calls for the evacuation of those living in Perdido Key and south of Perdido Beach Boulevard. Those in all low lying and flood-prone areas south of I-10 in Baldwin County and those living along the Mobile Bay Area and other water inlets also fall under the evacuation order."[23] Governor Riley testified:

> . . . [W]e made it voluntary 36 hours out, and then shortly thereafter we made it mandatory. As it comes closer, as the cone begins to funnel in and we have a higher likelihood that it is going to happen, we make it mandatory. We ask people to leave. We do everything we can to encourage them to leave. But, again, the limiting factor is the amount of time. The difference between trying to evacuate our beaches before Labor Day and after Labor Day is like daylight and dark, because we have so many more vacationers there. And then when you layer on top of that the number of people that will be coming out of the Florida panhandle that will come through Alabama, if we don't start it three days early, you just physically do not have the capacity to take care of it.[24]

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Alabama did not implement reverse lane strategies (i.e., contraflow) in response to Hurricane Katrina, as road closures were limited and traffic volume never warranted it. The state reported 118,900 applications for evacuation assistance by Alabama residents, of which 23,853 were by out of state residents.[25]

Louisiana evacuation of general population was very successful

The Louisiana evacuation for the general population, including contraflow, worked very well. Governor Kathleen Babineaux Blanco and other state officials labeled the implementation of this evacuation as "masterful" and as one of the most successful emergency evacuations in history.[26] Based on National Weather Service reports of Katrina's "dramatic shift" toward Louisiana on Friday, the state had less time than planned to prepare for contraflow and had to implement it in a compressed timeframe.[27]

Nevertheless, the contraflow planning and implementation went smoothly. The state effectively used conference calls to coordinate among the parishes. Some parishes declared some level of evacuation for the entire parish as early as Saturday morning, August 27, at 9:00 a.m. These were generally the lower parishes (LaFourche, Plaquemines, St. Bernard, and St. Charles), which was consistent with the Louisiana state plan for getting these populations to evacuate ahead of the metropolitan New Orleans population.

The parishes generally started with the declaration of a "recommended" evacuation and changed these to a "mandatory" evacuation as Katrina got closer. The state also coordinated closely with Mississippi and Texas on traffic and/or sheltering issues. For example, Friday afternoon Blanco called Barbour to coordinate that portion of the contraflow plan that involved highways leading out of Louisiana into Mississippi, and Governor Barbour agreed to the contraflow plan.[28]

Finding: Despite adequate warning 56 hours before landfall, Governor Blanco and Mayor Nagin delayed ordering a mandatory evacuation in New Orleans until 19 hours before landfall

Terms for voluntary and mandatory evacuations lack clear definitions

A wide variety of terms were used to describe the levels of evacuation orders, indicating a lack of clarity and a potential point of confusion for the resident population. For example, the different parishes used a wide variety of terms to describe the level of evacuation imposed before declaring a mandatory evacuation. These terms included a "precautionary" evacuation, a "voluntary" evacuation, a "recommended" evacuation, a "highly recommended" evacuation, and a "highly suggested" evacuation.[29] It appeared many of these officials were bending over backward to avoid using the term mandatory.

Throughout our discussions in all three states, Select Committee staff were unable to find a clear and consistent definition of mandatory evacuation. However, there was a consensus among almost all officials in all three states that even under a mandatory evacuation, authorities would not forcibly remove someone from their home. For example, in the case of Louisiana, both Blanco and LOHSEP Deputy Director Colonel Jeff Smith emphatically rejected the idea that people could be forcibly removed from their homes even under a mandatory evacuation order. Blanco said, "Well, in the United States of America you don't force people [out of their homes], you urge them."[30] Smith said: "It is America. You can't force people on to buses; you can't go into their houses at gunpoint and leave [sic]."[31]

Under Alabama state law, a mandatory evacuation declaration by the Governor is required before counties can take certain actions to ensure maximum compliance with local orders by those at risk.[32] But, regarding the practical meaning and effect of "mandatory" versus "voluntary" evacuations, Riley said:

> We probably need to come up with a better definition of what mandatory is. We call it a mandatory evacuation because everyone else calls it a mandatory evacuation. But do we arrest anyone? No. Do we send people door to door? Absolutely. We have a phone system, that they can explain to you in just a moment, where we have an automated system that calls every resident, asks them to leave, advises them with a phone message of how important it is. We keep doing it until we get in touch with everyone. Do you ever get to the point that everyone is going to leave? I don't think so.[33]

Nevertheless, it is clear to the Select Committee that declaring a mandatory evacuation delivers a more powerful statement to the public than declaring a voluntary or similarly worded evacuation. A mandatory evacuation implies that individuals do not have a choice, that the government will not be able to protect them and provide relief if they remain, and it generally conveys a higher level of urgency.

Federal, state, and local officials recognized the potential for catastrophe and flooding and communicated that potential among themselves and to the public

Regardless of the various terms used for evacuations, federal officials fully informed Blanco and New Orleans Mayor C. Ray Nagin about the threat to New Orleans. On the evening of August 27, National Hurricane Center Director Max Mayfield called Blanco and later spoke to Nagin about the power of Hurricane Katrina.[34] Also on Sunday, President Bush called Blanco to express his concern for the people of New Orleans and the dangers they faced and urged a mandatory evacuation.[35] On Sunday, the Slidell Office of the National Weather Service, issued a very strongly worded warning at approximately 10:00 a.m.:

> Devastating damage expected . . . Hurricane Katrina . . . a most powerful hurricane with unprecedented strength . . . rivaling the intensity of Hurricane Camille of 1969… Most of the area will be uninhabitable for weeks . . . perhaps longer. At least half of well constructed homes will have roof and wall failure. All gabled roofs will fail . . . leaving those homes severely damaged or destroyed… Water shortages will make human suffering incredible by modern standards.[36]

AP PHOTO/ANDY NEWMAN

State and local officials also urged the public to evacuate by foretelling the potentially catastrophic consequences. For example, beginning on Saturday, August 27, Blanco publicly urged citizens to evacuate the city, expressing her concern for the strength of the levees against at least a Category 4 storm.[37] In several interviews on Saturday and Sunday, Blanco stated that flooding in New Orleans was a major concern. On Saturday at approximately 8:00 p.m., she appeared on CNN and said that in New Orleans "[t]he storm surge could bring in 15 to 20 feet of water. [People in the city of New Orleans] will not survive that if indeed that happens."[38] In the Sunday morning papers, it was reported that she had said the water levels could reach as high as 20 feet.[39] In a television interview on Sunday, Blanco was asked if the 15 foot levees could survive the storm, and she replied: "I don't think anything can tolerate a storm surge of 15-20 feet."[40]

In a Fox News interview on Sunday, Nagin was very specific about the threat. He said whether the levees would hold was the "big question."[41] He said he hoped people who stayed in the French Quarter would go up to their homes' second or third story and bring something to chop through their roofs.[42] He expressed his worry that "[the levees] have never truly been tested the way they're getting ready to be tested. If there's a breach and if they start to fail, it probably will create somewhat of a domino effect which would pour even more water into the city."[43]

Blanco's staff also called ministers on Saturday to urge them to tell their congregations to get out.[44] And apparently, the Mayor and his staff did similar things.[45] But these steps were clearly insufficient.

The declarations of a "mandatory" evacuation were delayed or never made in metropolitan New Orleans

Neither Blanco nor Nagin, however, ordered a mandatory evacuation until Sunday morning. According to the Saturday newspapers, Nagin said "he will make a decision about evacuations and other emergency procedures [Saturday] about noon."[46] At a news conference on Saturday, Nagin announced: "Ladies and Gentlemen, this is not a test. This is the real deal."[47] But as late as Saturday afternoon, according to news reports, Nagin was consulting city lawyers about legal liability to the city's businesses for lost revenue from evacuating customers.[48]

In addition, despite express authority to commandeer resources and enforce or facilitate the evacuation of the City of New Orleans and despite recognition of the probability that Hurricane Katrina would cause breaches of the levees and flooding of the city, Blanco and Nagin did not exercise those authorities by declaring a mandatory evacuation and enforcing it or using state and city resources to facilitate the evacuation of those who could not or would not, absent extraordinary measures and assistance, evacuate. This extraordinary storm required extraordinary measures, which the Governor and Mayor did not take.

Finally, on Sunday morning at around 11:00 a.m. central time — 19 hours before projected landfall, Nagin announced the issuance of a mandatory evacuation order.[49] According to the New Orleans Plan, that gave the Mayor the authority to "direct and compel, by any necessary and reasonable force, the evacuation of all or part of the population from any stricken or threatened area within the City if he deems this action necessary for the preservation of life, or for disaster mitigation, response, or recovery."[50] As previously noted, the New Orleans Plan also recognizes that "[t]he safe evacuation of threatened populations when endangered by a major catastrophic event is one of the principle reasons for developing a Comprehensive Emergency Management Plan" and that "[s]pecial arrangements will be made to evacuate persons unable to transport themselves or who require special life saving assistance."[51]

In a joint news conference on Sunday morning, Blanco and Nagin continued to express their concerns and explain the reason for the Mayor's issuing a mandatory evacuation order. Their comments raise the question as to why, given the severity of the predicted catastrophe, the mandatory evacuation was not ordered sooner.

> Mayor Nagin: Ladies and gentlemen, I wish I had better news for you. **But we are facing a storm that most of us have feared.** I do not want to create panic. But I do want the citizens to understand that

> this is very serious, and it's of the highest nature. And that's why we are taking this unprecedented move.
>
> **The storm is now a Cat 5, a Category 5, as I appreciate it, with sustained winds of 150 miles an hour, with wind gusts of 190 miles per hour.**
>
> **The storm surge most likely will topple our levee system.** So we are preparing to deal with that also. So that's why we're ordering a mandatory evacuation . . . .
>
> . . . .
>
> This is a once in probably a lifetime event. The city of New Orleans has never seen a hurricane of this strength to hit it almost directly, which is what they're projecting right now.[52]

During the press conference Blanco stated:

> I want to reiterate what the mayor has said. This is a very dangerous time. **Just before we walked into this room, President Bush called and told me to share with all of you that he is very concerned about the citizens. He is concerned about the impact that this hurricane would have on our people. And he asked me to please ensure that there would be a mandatory evacuation of New Orleans.**
>
> The leaders at the highest ranks of our nation have recognized the destructive forces and the possible awesome danger that we are in. **And I just want to say, we need to get as many people out as possible.** The shelters will end up probably without electricity or with minimum electricity from generators in the end. **There may be intense flooding that will be not in our control, which would be ultimately the most dangerous situation that many of our people could face.**
>
> Waters could be as high as 15 to 20 feet. That is what the Miami National Weather Service, the National Hurricane Center, has shared with us. That would probably be ultimately the worst situation. We're hoping that it does not happen that way. We need to pray, of course, very strongly, that the hurricane force would diminish. But just remember, even if it diminishes to 1, there were six people lost in Florida when it was a Category 1 hurricane. So there's still imminent danger. There seems to be no real relief in sight, and it has been startling to see how accurate the path was predicted, and how it is following the predicted path.
>
> So we have no reason to believe right now that it will alter its path.
>
> Hopefully, you know, it could move just a little bit in one direction or another and not keep New Orleans in its sights. But we don't know that that would happen. That would be — we would be blessed if that happened.[53]

Jefferson Parish — the other major component of metropolitan New Orleans — never did declare a mandatory evacuation, except for the lower parts of the parish on the Gulf Coast. In a conference call among parish officials, Jefferson Parish President Aaron Broussard said he did not have the "resources to enforce" a mandatory evacuation.[54] Resource or enforcement issues, however, were not raised by any of the other parishes that declared mandatory evacuations. In addition, no one requested that the state or federal government provide resources to supplement those of the parish to implement a more complete evacuation.

STATE OF LOUISIANA

Finding: The failure to order timely mandatory evacuations, Mayor Nagin's decision to shelter but not evacuate the remaining population, and decisions of individuals led to incomplete evacuation

Earlier mandatory evacuation could have helped get more people out

While the Mayor and the Governor recognized the dangers and expressed them to the public, they did not implement evacuation procedures for all of the citizens of New Orleans that reflected the seriousness of the threat. The results demonstrate the flaw of the evacuation — tens of thousands of citizens did not get out of harm's way.

Specifically, the failure to order a mandatory evacuation until Sunday, the decision to enforce that order by "asking" people who had not evacuated to go to checkpoints for bus service, and then using that bus service to take people only as far as the Superdome did not reflect the publicly stated recognition that Hurricane Katrina would "most likely topple [the] levee system" and result in "intense flooding" and "waters as high as 15 or 20 feet," rendering large portions of the city uninhabitable.[55] As a result, more than 70,000 people remained in the City to be rescued after the storm.[56]

While Blanco, Nagin, and Broussard, and leaders from other parishes carefully managed the phased contraflow evacuation, that only facilitated the evacuation of those who had the means to evacuate the city. Nagin testified that, on Saturday, August 27, he "called for a strong voluntary evacuation, urging all citizens that were able to evacuate the city."[57] Although Nagin was rightly proud of the achievement of the contraflow evacuation of the region, he also conceded that "it probably wasn't as good as we — all of our citizens needed."[58]

Some citizens of New Orleans believed that a mandatory evacuation should have been called earlier and that the government needed to assist people to evacuate. New Orleans citizen and evacuee Doreen Keeler testified, "If a mandatory evacuation [order] would have been called sooner, it would have been easier to move seniors

AP PHOTO/MARI DARR-WELCH

out of the area and many lives would have been saved."[59] She further testified that "[g]oing to [senior citizens] with, yo, this is a mandatory evacuation, you do not have a choice, you have to leave, I feel would definitely help me to get my senior citizens out without waiting as long as I did in order to leave. And I think that if by some miracle there was any type of evacuation plan available, it could have been put into play earlier if a mandatory evacuation had been called."[60]

New Orleans citizen and community leader Dyan French asked: "Why would you get in the public media and ask a city, where 80 percent of its citizens ride public transit, to evacuate? What [were] they supposed to do? Fly?"[61] New Orleans citizen and evacuee Terrol Williams observed, "I think, unfortunately, a lot of the destruction that we saw, that persons were unable to safely evacuate, was because they were basically poor,"[62] which was echoed by Doreen Keeler: "They suffered through it because they had no way of getting out."[63]

New Orleans citizen and evacuee Leah Hodges complained that "[t]he stray animals from the animal shelter, most of whom would have been euthanized, were

evacuated 2 days before the storm, and the people were left to die. Buses that could have gotten our people, who otherwise could not get out, were left to flood, and people were left to die."[64] And Barbara Arnwine, Executive Director for the Lawyers Committee for Civil Rights, testified: "We know that people were not able to evacuate because some people just didn't own cars."[65]

In contrast to New Orleans, officials in adjoining Plaquemines Parish cited their early declaration of a mandatory evacuation as the key to achieving a high evacuation rate. Plaquemines Parish President Benny Rousselle (according to Plaquemines Parish Sheriff Jiff Hingle) declared a mandatory evacuation on television at 9:00 a.m. on Saturday, August 27.[66] Sheriff's deputies started working the intersections to turn off traffic lights and expedite outbound traffic.[67] On Sunday, August 28, Placquemines Parish Sheriff's deputies went door-to-door to warn people to evacuate and to identify those who needed help doing so.[68] Hingle said these efforts resulted in Plaquemines Parish having an evacuation rate of 97 to 98 percent, which helped account for the small number of fatalities there — only three.[69]

The shelter of last resort for those who could not or would not evacuate was inadequate

A critical part of evacuation planning is accounting for those who cannot evacuate on their own, including those without access to private transportation. State and local emergency operations plans task transportation agencies with primary responsibility to assemble buses and other resources to operate this response function. For example, Alabama's Mobile County EOP states: "The principle mode of transportation during an emergency situation will be private vehicles. There will be citizens in Mobile County that do not have private vehicles nor are able to obtain transportation. These people will be looking to the City and County government to provide this emergency transportation. The Mobile County Emergency Management Agency has been given the responsibility of managing and coordinating this task."[70] An annex to the Baldwin and Mobile County plans is more explicit:

> Evacuation preparedness plans consider all persons who do not have access to a private vehicle and therefore would have to rely on public transportation for evacuation. Local governments attempt to arrange for adequate resources to meet the demand for public transportation. Planning for adequate special needs emergency transportation for residents in private homes is usually the responsibility of local emergency management officials, while transportation for those in health-related facilities is the responsibility of the individual facilities. Although detailed information concerning residents of private homes may be difficult to obtain, each local government is developing procedures for maintaining an up-to-date roster of persons likely to need special assistance. Non-ambulatory patients will require transportation that can easily accommodate wheelchairs, stretchers, and, possibly, life-sustaining equipment. Lack of resources for these needs could result in critical evacuation delays and increased hazards for the evacuees. The Special Needs population for each county changes from year to year and requires public cooperation and assistance to maintain an up-to-date listing.[71]

AP PHOTO/DAVID J. PHILLIP

Similarly, the New Orleans Plan specifically addresses the issue of those without access to transportation. The plan states that "[s]pecial arrangements will be made to evacuate persons unable to transport themselves…. Additional personnel will be recruited to assist in evacuation procedures as needed."[72] The New Orleans Plan further warns that "[i]f an evacuation order is issued without the mechanisms needed to disseminate the information to the affected persons, then we face the possibility of having large numbers of people either stranded and left to the mercy of the storm, or left in areas impacted by toxic materials."[73]

Specifically, the New Orleans Plan provides that "[t]ransportation will be provided to those persons requiring public transportation from the area," placing the Regional Transit Authority as the lead agency for transportation, supported by multiple federal, state, and local agencies, including the Orleans Parish School Board, New Orleans Equipment Maintenance Division, Louisiana Department of Transportation, Louisiana National Guard, Port of New Orleans, U.S. Coast Guard, New Orleans Public Belt Railroad, and Amtrak.[74] The tasks allotted to the RTA include: "plac[ing] special vehicles on alert to be utilized if needed[,] [p]osition[ing] supervisors and dispatch[ing] evacuation buses [and i]f warranted by scope of evacuation, implement[ing] additional service."[75] The New Orleans Plan expressly acknowledges that "[a]pproximately 100,000 Citizens of New Orleans do not have means of personal transportation."[76] Following the mandatory evacuation order, city officials sent the police and fire department through the city "asking" people to go to checkpoints where buses circulating through the city would pick them up — but only to take them to the Superdome which had been opened as a refuge of last resort that day.[77]

Despite the New Orleans Plan's acknowledgement that there are people who cannot evacuate by themselves, the city did not make arrangements for their evacuation. Instead, city officials decided to shelter them in New Orleans. As stated previously, emergency planners prefer evacuation to sheltering, because the sheltered population is subject to the most intense dangers of the storm. Evacuation is also favored because it may be slow and difficult to get relief personnel and supplies back into hurricane ravaged areas.

In addition, New Orleans preparations for sheltering these individuals were woefully inadequate. On Sunday morning, New Orleans officials, instead of working to move individuals out of New Orleans and out of harm's way, were drafting a plan to seize private facilities to create additional "refuges of last resort."[78] Ultimately, city officials designated only the Superdome as such a refuge.

FEMA

As will be discussed later in this chapter, the Superdome proved to be inadequate for the crowds that had to take refuge there. Only at the last minute did the City ask for food and water and medical personnel for the Superdome. As discussed in the MEDICAL CARE chapter, some of the federal medical assistance teams were called in so late they did not make it to the Superdome before landfall. On Sunday morning, the New Orleans Director of Homeland Security, Terry Ebbert, predicted "nightmare" conditions in the Superdome.[79]

Individuals share the blame for incomplete evacuation

The role of the individual was also an important factor in metropolitan New Orleans' incomplete evacuation. In Louisiana, state and parish officials said that it is generally the individual's responsibility to evacuate or identify themselves as having special needs if they need help. State and parish officials noted varying degrees of cooperation with evacuations among the individuals in the general

population. They said many residents evacuate early on their own, even before an evacuation is declared. These individuals watch the weather reports when a hurricane is in the Gulf and make their own informed choices.

Some residents play "hurricane roulette."

Officials know from experience, however, that some percentage (from 10-25 percent) will not evacuate. The Governor and other state officials said some residents play "hurricane roulette."[80] That is, against the advice of the authorities, they stay and take the risk that the hurricane will hit somewhere else or that they will be lucky and relatively unaffected.

Select Committee staff heard similar comments in Mississippi. Testimony from county emergency management officials as well as Mississippi's governor indicated that "hurricane fatigue" as well as the expense of repeatedly evacuating when storms threaten may have caused some to not heed the mandatory evacuation orders. For example, Barbour testified that various areas in the state had undergone mandatory evacuations for Hurricane Ivan in 2004 and Hurricane Dennis earlier in 2005, but in both instances the storms ultimately made landfall farther east, sparing Mississippi.[81]

Both state and parish officials in Louisiana said the older population, some of whom might be classified as special needs, make up a substantial portion of those playing "hurricane roulette." They said there are a few reasons for this. First, many of the older residents had experience "sitting out" earlier hurricanes such as Betsy (1965) or Camille (1969) and reasoned they could "sit out" Katrina. Second, some of them were just "set in their ways" and would not listen to others' advice, even that of their own adult children, to evacuate. In addition, Katrina was originally headed for the Florida Panhandle, and its turn to the west caught many residents by surprise. Finally, it was the end of the month, when people did not have money for gas to evacuate.[82]

Regardless of their reasons for not evacuating, those that had the means to evacuate and did not do so must share some of the blame. Many of these people paid for their poor choices with their lives — as rising floodwaters drown them in their homes. Others who stayed, but could have left, suffered the less severe consequences of walking through floodwaters to crowded shelters or other high ground. These individuals suffered in horrible conditions — some with shelter and food and water and some without any of these — while they awaited evacuation, which they could have done for themselves earlier.

Finding: The incomplete pre-landfall evacuation led to deaths, thousands of dangerous rescues, and horrible conditions for those who remained

AP PHOTO/PAUL SANCYA

Failure of complete evacuation resulted in hundreds of deaths and severe suffering for thousands

Contrary to Blanco's claim that "[t]he word 'mandatory' doesn't mean any more than us getting up, saying, get out[,]"[83] the delay in calling a mandatory evacuation and not enforcing or facilitating that evacuation had real consequences for the city and for the protection of

"Hurricane Fatigue" — May have caused some people to not heed the mandatory evacuation orders.

ordinary people. As noted above, many residents believed that an earlier declaration of a mandatory evacuation would have helped get more people out. The President of the Louisiana Nursing Home Association also told Select Committee staff that at least one nursing home had been unable to evacuate its patients prelandfall because it could not find bus drivers by the time the mandatory evacuation order was issued.[84]

While these warnings were sufficient to motivate more than a million citizens to evacuate using the state's revised, well-planned and executed, phased contraflow evacuation plan, more than 70,000 people did not evacuate.[85] Those who did not evacuate were exposed first to the dangers of drowning in the flood waters after the breach of the levees and then to deprivation of food, water, and shelter as they awaited rescue from other locations.

The anticipated flooding of New Orleans, unfortunately, occurred in an environment where a population of more than 70,000 had not evacuated, with thousands of these people remaining in their homes. Hundreds of these people died as floodwaters enveloped low lying neighborhoods in waters above the roof lines.[86] In tours of the affected areas, Select Committee staff noted the debris lines from the floodwaters were halfway up the roof of many single-story houses in St. Bernard Parish. The parish Director of Homeland Security and Emergency Preparedness Larry Ingargiola told Select Committee staff that during the storm, he had answered emergency cell phone calls from desperate people trapped in their attics, who had no way to escape the rising floodwaters.[87]

AP PHOTO/DAVE MARTIN

As stated before, many of these deaths were the result of hurricane roulette — individuals making decisions not to evacuate, or, for the poor population and those who procrastinated, not to seek shelter in the Superdome or other refuges of last resort in other parishes. As discussed in the MEDICAL CARE chapter,, there were also many deaths among those in medical and nursing home facilities.

An analysis of these deaths indicates that the flooding had a broad impact across all neighborhoods in New Orleans and the immediate surrounding parishes. The Knight Ridder news organization, using preliminary data from the Louisiana Department of Health and Hospitals, reviewed the location, ethnicity, sex and age of the victims. The results of their analysis were published in the Baton Rouge *Advocate* newspaper on December 30, 2005.[88] According to the analysis, "[t]he bodies of at least 588 people were recovered in neighborhoods that engineers say would have remained largely dry land had the [levees] not given way. . . ."[89] However, according to Orleans Parish coroner Dr. Frank Minyard, "[t]he cause of death for many will never be known because their bodies were too badly decomposed by the time they were recovered."[90] Dr. Minyard, however, did estimate that 20 percent of Katrina's New Orleans victims drowned,[91] and scores of others died of other causes awaiting rescue, trapped by floodwaters. Similarly, St. Bernard Parish Coroner, Dr. Bryan Bertucci, is cited as saying that most of the parish's 123 victims drowned in their homes.[92]

The analysis found that the victims of Hurricane Katrina were roughly proportionate to the pre-landfall population (based on census data) in terms of ethnicity, sex, and wealth. In terms of ethnicity, the dead in New Orleans were 62 percent black, compared to 66 percent for the total parish population.[93] The dead in St. Bernard Parish were 92 percent white, compared to 88 percent of the total parish population.[94] The percentage of the dead by sex was approximately the same as the overall population.[95] In terms of wealth, the analysis found that the percentage of dead bodies found in poorer New Orleans and St. Bernard Parish neighborhoods—as measured by poverty rates and median household incomes—was roughly equivalent to their percentage in the overall population.[96]

The finding about wealthier residents comports with statements by Louisiana First Assistant Attorney General Nicholas Gachassin, Jr. who said that many New Orleans area residents with the wealth and the means to evacuate and who decided not to do so paid for that decision with their lives.[97] Gachassin said that there were approximately 250,000 vehicles left in New Orleans, which he said demonstrated that there were many people with the means to leave the city who chose not to do so.[98] Similarly, the *Advocate* article stated that "at many of the addresses where the dead were found, their cars remained in their driveways, flood-ruined symbols of fatal miscalculation."[99]

KNIGHT RIDDER WASHINGTON

Failure of complete evacuations required heroic search and rescue efforts

The fortunate ones — among those who had stayed in their homes — were those that were able to climb to their roofs or flee into flooded streets. Many of these individuals had to use tools or other objects to chop through their roofs to escape the rising floodwaters. Thousands of these people were saved by a massive and heroic search and rescue effort. The U.S. Coast Guard alone reported that it rescued more than 33,000.[100] The Louisiana National Guard reported initial rescues of more than 25,000.[101] These people were pulled out of the floodwaters into boats or plucked from roofs into helicopters operated by a wide array of government

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agencies, non-governmental organizations, and citizen volunteers. State rescuers included personnel from the Department of Wildlife and Fisheries, local police, and the National Guard.[102] Federal rescue personnel included the Coast Guard, the Department of Defense, and several law enforcement agencies. All 28 of FEMA's Urban Search and Rescue teams (who come from a variety of states and local governments across the nation) were also involved in the rescues. The chapters on THE MILITARY and LAW ENFORCEMENT have more details on the search and rescue efforts by the military and law enforcement, respectively.

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The massive search and rescue effort, while necessary under the circumstances, distracted emergency managers and diverted key assets from other critical missions. According to National Guard officials involved in search and rescue, the entire focus of Monday and Tuesday was on saving lives; that was the Governor's top priority.[103] While the Select Committee does not question Blanco's urgency and priority on saving lives *after* the flooding took place, the same urgency and priority on a more complete evacuation of New Orleans *before* the flooding would have saved lives. If there had been a more complete evacuation, the number of flood victims requiring search and rescue would have been greatly reduced. This would have allowed federal, state, and local emergency response officials to focus earlier on re-establishing communications and situational awareness, and moving commodities into hard hit parishes beyond New Orleans. Many of the helicopters used for search and rescue could have been utilized for these tasks.

Those in shelters or on high ground suffered through horrible conditions

Those who escaped to shelters or high ground suffered horrible conditions at a number of locations including the Superdome, the Convention Center, and the Cloverleaf, where they arrived through a number of different means. Some had walked or driven before landfall, some had walked after the floodwaters reached their homes, and some had been dropped off by search and rescue boats or helicopters. Each of the locations had their own miserable conditions.

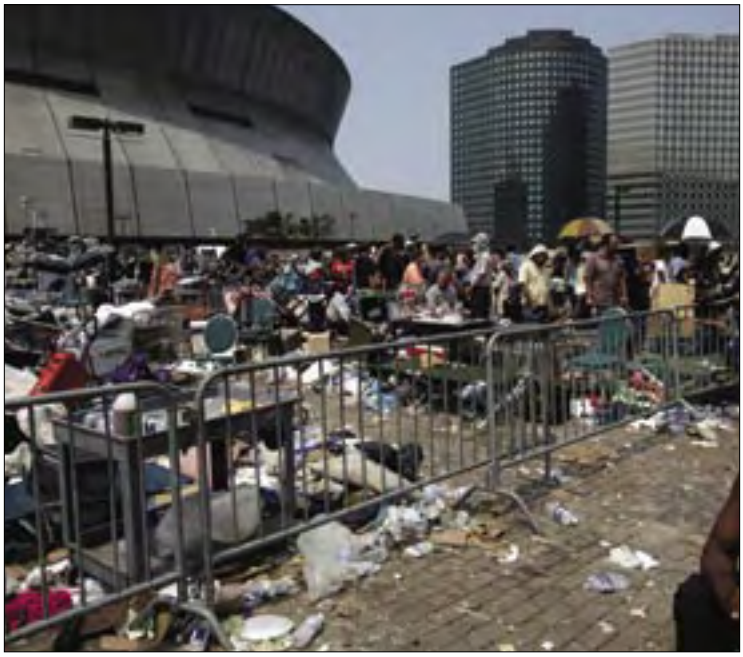
New Orleans opened the Superdome as a "refuge of last resort."[104] As such, it was set up to allow people to survive a storm passing over; it was not intended to house, feed, and water thousands of people for several days. A cadre of more than 200 New Orleans Police and the Louisiana National Guard searched all people entering the Superdome for weapons and contraband.[105] In addition, FEMA and the National Guard had prepositioned food and water in the Superdome, and some additional food and water was trucked in at the last minute.[106] Some of the people arriving had listened to the Mayor's suggestion and had brought a three day supply of food and water, sleeping bags, and clothes. Those who came to the Superdome after the flooding brought nothing but the clothes on their backs.

The conditions in the Superdome soon deteriorated. The initial calm situation Sunday night changed early Monday morning when the dome's roof opened up and the building lost power. While the Superdome was still structurally sound, the hole in the roof scared people; it made noise and water started coming in.[107] The National Guard had to suddenly move thousands of people from the field up into the seating sections.[108] Later, after the flooding, the power went out across the city.

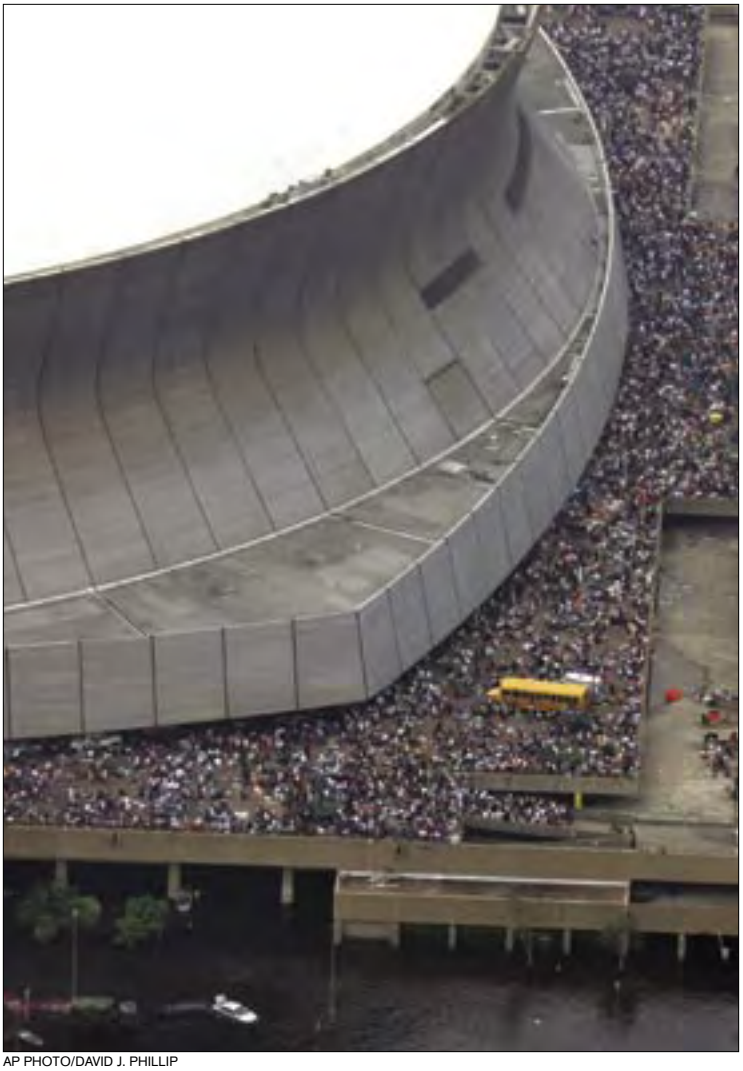
Without power, the only lighting in the Superdome was emergency lighting that ran off the emergency generator. This was not the same as full lighting, and with no power, the air conditioning was also not working. Related to the power outage, the water system went out, causing the toilets to back up, creating an awful stench that grew progressively worse as the days wore on.

Many people could not stand the heat and smell and gathered outside on the surrounding walkway area, which thus became very crowded. Although the situation was bad and deteriorating, there was never a shortage of food and water; they were distributed twice a day at first and continuously later.[109] In general, people were hot, it smelled, and they were anxious to leave. This deteriorating situation led to the increasing urgency among officials and the population to evacuate the Superdome.[110]

Conditions were also unbearable in the Convention Center. The Select Committee was unable to determine exactly when the Convention Center became a shelter and when officials became aware of the deteriorating



AP PHOTO/RON HAVIV/VII


AP PHOTO/DAVID J. PHILLIP

conditions there. None of the officials who spoke with the Select Committee staff were willing to take responsibility for the operation of the Convention Center as a "shelter," and none claimed that they knew about the situation until Wednesday morning or afternoon, August 31.

While these officials stated that the Convention Center was never designated as a shelter like the Superdome, Mayor Nagin's testimony suggested that the city had sanctioned that location. In his prepared statement, the mayor stated that "[t]he swelling crowd at the Superdome and the number of people needing shelter required us to open the Convention Center as another refuge."[111] Brown was widely criticized for saying on Thursday night that he only found out that afternoon about the people at the Convention Center.[112] Late that same night, however, the city of New Orleans finally requested that the National Guard secure and evacuate the Convention Center in conjunction with the New Orleans Police Department the next day.[113]

People initially went to the Convention Center after the breaches of the levees late Monday night or early Tuesday morning. As the floodwaters rose, people left their homes and headed for higher ground. The Convention Center is near the Mississippi River levee, one of the higher elevations in New Orleans. The National Guard estimated that there were 19,000 people there.[114] Conditions in the Convention Center were notably worse than the Superdome in several ways. Like the Superdome, the Convention Center had no electrical power, no lighting, no air conditioning, and no functioning toilets. But unlike the Superdome, the Convention Center had no authorities or security on hand, no weapon screening, no food and no water.[115]

AP PHOTO/ERIC GAY

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Other high ground spots became spontaneous gathering points with miserable conditions. Many people went to these locations on their own, because their houses were flooded and they were looking for dry land. In addition, many people were dropped off at these sites by rescuers. Because of initial emphasis on saving lives, people were just dumped off there by helicopters or boats without any initial concerns for providing them with food or water.

Unlike the Superdome or the Convention Center, there was no shelter from the sweltering sun. Specific locations

where evacuees found themselves included the Cloverleaf (where two highways met), the Industrial Canal levees, the Mississippi River levees, and Broad Street levees. These locations had generally not been manned with security personnel such as police, nor had there been any plans to supply them with food, water, or medical treatment.

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The "Cloverleaf" on the interstate was one of the worst locations. The site was being used for medical triage and evacuation, so there was initially some food and water there, at least for the medical patients. However, additional people arrived on their own or by the helicopters or boats that rescued them from the water. The supply of food and water was not sufficient for the crowd, which eventually grew to 6,000-7,000 people.[116]

Flooding further hampered relief efforts for those not initially evacuating

Efforts to provide relief to those stranded at the Superdome, Convention Center, the Cloverleaf, and other positions of high ground were stymied by the floodwaters. Simple tasks, such as trucking food and water to these locations, were complicated by flooded highways that necessitated the use of high clearance vehicles or long detours. Some of these sites were very difficult to supply or evacuate later because they were "islands" completely surrounded by water. As mentioned in the COMMUNICATIONS and the COMMAND AND CONTROL chapters, the lack of communications, situational awareness, command and control, and effective logistics systems further hampered efforts to identify many of these locations and coordinate relief. The floodwaters also complicated efforts to conduct a post landfall evacuation, as discussed in the next section.

Finding: Federal, state, and local officials' failure to anticipate the post-landfall conditions delayed post-landfall evacuation and support

Federal, state, and local officials had not prepared for post landfall evacuation despite predictions of extensive flooding

While these victims endured horrendous conditions, hundreds of city buses and school buses that could have been used for evacuation sat useless, flooded or without drivers. Nagin testified that the school buses belong to the New Orleans school district and, to his credit, he is now considering a cooperative agreement with the school district to move the school buses out of the area for the next storm.[117] Nagin also testified that the RTA buses were "always staged, or have been staged, in an area that has been high and dry throughout every storm that has ever hit the City of New Orleans; and we expected the same for this event. Unfortunately, those buses flooded also because 80 percent of the city went under water."[118] He testified that he had had trouble getting drivers even for the 20 buses that had taken residents to the Superdome prelandfall "because most [drivers] had evacuated" and that the National Guard was not available to drive buses.[119]

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By the time Hurricane Katrina made landfall at 6:10 a.m. central time on Monday, August 29, approximately 10-12,000 people were sheltered in the Superdome.[120] The massive flooding led to urgent search and rescue operations throughout the city and in other parishes as well. Those search and rescue operations moved tens of thousands of people off of their roofs and out of the flood waters to shelter or high ground. As the flood waters rose, people also self-evacuated from the city to the Superdome, the Convention Center, and other high ground around the city.

As previously noted, the Governor and the Mayor were well aware of the probability of levee breaches and flooding in New Orleans following a Category 4 or 5 hurricane. Federal officials were also aware of that probability. When Brown was asked by Select Committee Member Congressman Hal Rogers: "Was it known by you and others that the flood wall around New Orleans was only rated to take a category 3 hurricane,"[121] he replied, "Yes. That was a fact that came out in [the Hurricane Pam Exercise] that the levees may or may not hold, that the storm surge may or may not top them, they could top — the storm surge could top the levees without breaking and they could top and also break the levees. So we knew both of those were potential."[122] As Vice Mayor of Newport News, Virginia, and city planner Charles Allen testified before the Select Committee: "[I]t is clear from information in the news that the U.S. Government, in the form of the U.S. Weather Service [sic], the Federal Emergency Management Agency, and the U.S. Corps of Engineers [sic] understood the magnitude of this storm."[123]

Planning for the post landfall evacuation had to be done in emergency environment

Despite the advance knowledge of extensive flooding, the first task order for buses by the federal government to evacuate New Orleans post landfall was not issued until 1:30 a.m. on Wednesday, August 31.[124] Although Blanco claims that Brown told her that he had 500 buses standing by and that she was concerned when those buses did not materialize sooner,[125] the Select Committee found no other evidence that any such buses were, in fact, "standing by" or that Brown had made such a statement to Blanco.

Developing a plan to evacuate the Superdome and other locations after the flooding was a complicated endeavor. That planning included determining the number of buses needed, accessible routes to the

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Superdome and other locations, security needs, and the ultimate destination of those evacuated. This planning occurred in a highly degraded environment that included limited communications that prevented a full understanding of the scope of the needs and even the visibility of deployed resources. Repeatedly, during the daily video teleconferences, state and federal officials expressed their frustrations with the level of communications.[126]

In assessing the needs for the Superdome alone, Homeland Security Operations Center (HSOC) Spot Report Number 30, prepared at 2:00 a.m. on Wednesday, August 31, (even after the federal task order for buses) reflects that (1) there are 12-15,000 people at the Superdome, (2) the water is not rising as rapidly as previously feared, (3) the loss of electricity does not appear imminent, (3) the intention was to begin evacuations that day and continue them over the next few days, (4) alternate shelters have not been identified, and (5) two days of food and water is on hand.[127] According to that document, neither the means of egress to the buses for the Superdome population nor the alternative location to which they would be evacuated had been determined.[128] Options for egress from the Superdome included walking once the State Police can verify a route, constructing temporary bridging, "construct[ing] a sandbag dyke to allow for walk[ing] out," "us[ing] DOD landing craft to shuttle . . . to buses," and using helicopters for short flights to buses.[129] Alternative shelters included "stadiums in the State college system but other options are possible."[130] As we now know, many of the buses took people to the Astrodome in Houston. But as of Wednesday morning, FEMA officials were still concerned that Blanco had not spoken to Texas Governor Rick Perry to confirm that part of the plan.[131]

The planning process for the post-landfall evacuation did not really begin until Tuesday, August 30. Blanco testified that she did not realize the full consequences of the levee breaches until Tuesday morning, when she was able to travel to New Orleans and see the effects of the flooding for those sheltered in the Superdome.[132] At the noon video teleconference, Smith asks only that

> [Y]ou realize what's going on and the sense of urgency here needs to be ratcheted up. Everybody is being fully cooperative, but in the deployment of some of these Federal assets, especially transportation for the evacuation effort that we're trying to coordinate, we don't need anything to slow that down. The push of the resources and so forth to date has not been an issue, but we don't need to let it become an issues [sic] because we're going to literally have tens of thousands of people that we've got to push these supplies too [sic].[133]

Later that day and into the evening, FEMA official Phil Parr and others sheltered in the Superdome, apparently unaware of the evacuation planning at the EOC, began their own planning to evacuate the Superdome as they observed the rising waters around the building and realized that people would not be able to walk out of the dome and return home.[134] According to Parr, the team inside the Superdome devised a plan involving the use of helicopters to airlift people away from the Superdome. They concluded that they needed at least nine helicopters, of which the Louisiana National Guard had three.[135]

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They communicated this plan to the FEMA Regional Response Center (FEMA RRC) in Denton, Texas and got initial approval for it, with the RRC searching for the assets to implement it.[136] They believed their plan would have been able to move virtually all of the evacuees from the Superdome at that time in about 30 hours.[137] The next day, Parr learned that Commander of Joint Task Force Katrina Lt. General Russel L. Honoré had stopped that plan as he came to Louisiana to lead Joint Task Force Katrina.[138]

At the same time, there remained some doubt about the consequences of the levee breaches. General Don Riley of the Army Corps of Engineers reported at the noon video teleconference on Tuesday, August 30, that "[t]he lake [Pontchartrain] level may recede quickly enough before we can get anything in there [to fill the breach] and then we can turn that pump station on with the city and turn that water around and pump it back into the lake.[139] FEMA Federal Coordinating Officer (FCO) Bill Lokey discussed at the same video teleconference that they were "developing the distribution plan [for commodities] that we can get them out to the communities as the water does recede in some areas . . . ."[140] The FEMA Acting Director for Response during Hurricane Katrina, Ed Buikema, also said that on Tuesday and Wednesday, August 30 and 31, there was still some hope that the breaches in the levees could be repaired quickly.[141]

By the Wednesday, noon video teleconference, the numbers at the Superdome had swollen to approximately 23,000.[142] Reggie Johnson from the U.S. Department of Transportation reported that there were 455 buses under contract and "it looks like we've got about 200 that are currently in place, with the remainder that should be coming in on a staggered basis."[143] The next day, Johnson reported:

> 120 buses . . . departed for [the] Houston Astrodome last night. And there are 300 buses in the New Orleans area. You may not see those because actually they're staging at what's called the Poker Palace Texaco refueling site, and that's in a place in Louisiana, and I understand that they are drawing down from that site. They're bringing in about 40 buses at a time. There are 155 buses that were requested, and they are en route and should arrive at the truck stop by midnight tonight. We have not received any other requests . . . .[144]

Blanco also attempted to deploy state resources. She issued an executive order on August 31 to commandeer school buses to assist in the evacuation.[145] While these buses could handle short trips (such as to the airport or other local shelters), they were not appropriate for long trips, such as the trip to Houston.

Lack of willing drivers and diversions of buses further delayed Superdome evacuation

But even as the buses were arriving there were further delays. There was evidence that drivers refused to drive into New Orleans because of perceived security problems.[146] Although the state had found 100 school buses, the drivers, according to Smith, "are little old ladies, and I don't blame them, they don't want to go and drive in and do evacuations."[147] He added that 100 military police had just arrived at Belle Chasse Naval Air Station right across from the Superdome and that two Chinooks with National Guard MPs were arriving.[148]

Although the state had found 100 school buses, the drivers, according to Smith, "are little old ladies, and I don't blame them, they don't want to go and drive in and do evacuations."

In addition, there were concerns that drivers had to meet the requirements for limiting hours of service between rests. In that same video teleconference, Smith reported that the Governor would waive the commercial drivers license requirements.[149] DOT's Johnson advised that he would "coordinate with the bus companies to ensure that we can start doubling up on the drivers."[150] Smith responded to this report by advising that they were about to run out of buses and that he had just made a new request for 500 buses.[151]

Finally, the buses for the Superdome did not always get to the Superdome. Parr said that the Governor diverted some buses from the Superdome to other locations like the Cloverleaf and other high ground where, unlike the Superdome, there was no food, water, or shelter.[152] Buikema agreed that buses that were intended for the Superdome actually picked people up off the highway and filled up before getting to the Superdome.[153]

Strangely, the video teleconference transcripts never refer to evacuating the Convention Center. At one point, Smith seems to recognize that the evacuation problem is broader than the Superdome, when he says on September 1, "I would ask you to quit referring to evacuation from the Superdome, but maybe an evacuation from the greater New Orleans area from the Superdome."[154]

The insatiable demand for more buses was a constant source of frustration

On September 2, Smith expressed substantial frustration with the number of available buses: "I've got 2500 people on Algiers Point right now, which is not right in the downtown area, that we could be sending missions to and getting off. Those people have been on levees for a day and a half. Get us the transportation assets with drivers, and we'll start making that happen quicker and more effectively, and I told you all that yesterday.[155] But by September 2, DOT's Johnson reported that of apparently 1,100 buses in the system, "800 of those buses . . . are actually operating throughout."[156] Despite having 1,100 buses operating, DOT recognized at that time that it "appears that what we're going to have to do is increase the amount of buses from the 1,100 to an additional 5-600 buses for their operation."[157] But DOT had no "visibility of how many buses [were] right now within the state of Louisiana and getting close to staging areas."[158] Louisiana National Guard General Graham, who was coordinating the bus evacuation for the state reported that there were 40 commercial buses "on the ground."[159]

Despite the large number of buses deployed, there were still not enough. Some delays were inherent in the system. DOT's Johnson related that buses were delayed at "chokepoints" at their destinations where it takes three to four hours to unload at times.[160] And Graham reported that buses would be held up to allow drivers to rest: "Many bus drivers have driven a long way and must rest prior to driving."[161] These factors alone could not have accounted for the shortage. More likely, the degraded environment prevented Smith and other federal officials from realizing the full scope of the need for evacuation by bus that even 1,100 buses could not satisfy.

Airlift operations supplemented evacuations by the buses

The effort to evacuate New Orleans was greatly facilitated by the establishment of an air evacuation component at the New Orleans International Airport. This activity required significant coordination regarding obtaining aircraft and crews, passenger screening, security (crowd control), air traffic control, passenger boarding, availability of passengers for departure, and itinerary management. According to Air Transport Association (ATA) officials, late Thursday, September 1, Deputy Secretary Michael Jackson called the ATA President Jim May and said they had 25,000 people who needed to be evacuated.[162] That night, airplanes from Washington, D.C. were in transit to New Orleans.[163] Friday morning, planes started arriving with Transportation Security Administration (TSA) officials, flight crews, volunteers, and supplies. Planes were loaded around the clock from that weekend through most of the following week. A total of 13,000 evacuees were moved using 129 airplanes.[164]

Despite their overall success, airlift operations needed to feed into an overall management system. There were times when the military and the private carriers were duplicating efforts. Moreover, the coordination of all the parts was complex. For example, there were no pre-existing contracts in place for air support.[165] Landstar asked carriers like Delta, Jet Blue, Spirit, and approximately a dozen commercial airlines for help.[166] These airlines provided planes ("hot spares" or back-up planes) flight crews, and additional staff, asking at most for jet fuel reimbursement. In the future airlines may be interested in entering into a Civil Reserve Air Fleet (CRAF) program (a contractual program where civil airlines augment military operations during a crisis in exchange for Defense Department business).

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Conclusion

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None of this had to happen. The potential effects of a Category 4 or 5 storm were predictable and were in fact predicted. Declarations of mandatory evacuations — declarations that could have resulted in a more complete evacuation — were delayed or not done at all. New Orleans' decision to shelter instead of evacuate the population, as well as individuals' reluctance to leave, further resulted in an incomplete evacuation. The thousands of people left in New Orleans suffered death or had to be rescued to await an evacuation that should have already occurred before landfall.

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Regarding the post landfall evacuation, neither the New Orleans Plan nor the state's Emergency Plan expressly provided for the protection of vital transportation assets to evacuate the City after flooding. State and local officials also failed to prepare for such an eventuality, regardless of the plans. Nor did the expert federal agency anticipate the needs of the state and city to bring to bear immediate relief. As DHS Secretary Chertoff observed, planning was not what it should be at DHS.[167] Despite years of recognition of the threat that was to materialize in Hurricane Katrina, no one — not the federal government, not the state government, and not the local government — seems to have planned for an evacuation of the city from flooding through breached levees. Having failed to anticipate these needs, poor communications that hampered situational awareness, hours of service limits, security needs, and logistical problems further delayed the deployment of buses to evacuate the city. ■

[1] State of LA and U.S. Dep't of Homeland Security, Louisiana Citizen Awareness & Disaster Evacuation Guide [hereinafter *LA Evacuation Flyer*]; *see also*, State of LA, Emergency Operations Plan, (Apr. 2005) [hereinafter *LA State Plan*]; Supplement 1A: Emergency Operations Plan: Southeast Louisiana Hurricane Evacuation and Sheltering Plan (Rev. Jan. 2000) [hereinafter *LA State Evacuation Plan*].

[2] City of New Orleans, Comprehensive Emergency Management Plan, (2004) at 51 [hereinafter *New Orleans Plan*].

[3] *Id.*

[4] *Id.*

[5] *Id.* at 54.

[6] *Id.* at 48.

[7] *Id.* at 50.

[8] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Mississippi Before Select Comm.*, 109th Cong. (2005) at 63-64 (statements by Haley Barbour, Governor of MS, and Robert R. Latham, Jr., Exec. Dir., MS EMA) [hereinafter *Dec. 7, 2005 Select Comm. Hearing*].

[9] *Id.*

[10] *Id.* at 34 (statement of Robert R. Latham, Jr., Exec. Dir., MS EMA).

[11] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Alabama Before Select Comm.*, 109th Cong. (2005) at 46 (statement of Bob Riley, Governor of AL) [hereinafter *Nov. 9, 2005 Select Comm. Hearing*].

[12] *Id.* at 122-123 (statement of Bruce Baughman, Dir., AEMA).

[13] Director's Brief, Director of MS Emergency Management Agency, Brief as of 1900 hours, Aug. 28, 2005 (MEMA -0010688) (Aug. 28, 2005) at 3.

[14] *Dec. 7, 2005 Select Comm. Hearing* at 2 (written statement of Brent Warr); *see also id.* at 157 (statement of Benjamin J. Spraggins, Dir., Harrison County EMA).

[15] *Id.* at 64, 74 (statement of Haley Barbour).

[16] Director's Brief, Director of Mississippi Emergency Management Agency, Brief as of 1900 hours, Aug. 28, 2005 (MEMA -0010688) (Aug. 28, 2005) at 3.

[17] *See generally*, Director's Brief, Director of Mississippi Emergency Management Agency, Brief as of 0430 hours, Aug. 29, 2005 (MEMA -0010696) (Aug. 29, 2005).

[18] September 27 hearing at 68-9.

[19] *Id.* at 70.

[20] Meeting Summaries, FEMA Regional Emergency Liaison Team Conference Calls (Aug. 28, 2005 – Sept. 02, 2005).

[21] Baldwin County, AL, Hurricane Katrina Time Line of Events (Doc. No. 002553AL). The notation on the Time Line reads "volunteer evacuation" which Select Comm. Staff interpreted as a "voluntary evacuation."

[22] Memo to Files, Alabama Emergency Management Agency EM/2000 Tracker System message 05-1675, (Aug. 28, 2005). Two days before the request for a mandatory evacuation in Alabama, AEMA officials had already requested transportation assistance for purposes of coordinating evacuation traffic flow out of Florida. Memo to Files, Alabama Emergency Management Agency EM/2000 Tracker System message 05-1611, (created Aug. 26, 2005; completed Aug. 28, 2005).

[23] Press Release, Office of Gov. of AL, Governor Riley Orders Evacuation for Parts of Mobile and Baldwin Counties (Doc. No. 002580AL); Press Release, Office of Gov. of AL, Governor Riley Orders Evacuation for Parts of Mobile and Baldwin Counties (Aug. 28, 2005), *available at* http://www.governorpress.alabama.gov/pr/pr-2005-08-28-02-katrina_evac_order.asp [last visited Jan 21, 2006].

[24] *Nov. 9, 2005 Select Comm. Hearing* at 28 (statement of Bob Riley).

[25] Memo to Files, Evacuee Population Presently in AL by County as of 9/28/05, AL Emergency Management Agency (Oct. 10, 2005) (Doc. No. 002576AL).

[26] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Louisiana Before Select Comm.*,109th Cong. (2005) at 67 (statement of Kathleen Babineaux Blanco) (Blanco: "I am very happy to talk about our evacuation process, because it is the one thing that we did masterfully.") [hereinafter *Dec. 14, 2005 Select Comm. Hearing*]; *id.*, at 94 (statement of Kathleen Babineaux Blanco, Governor of LA) (Chairman Davis: "This was the most successful evacuation you ever had, right?" Blanco: "Absolutely without a doubt.").

[27] *Id.* at 68-69 (statement of Jeff Smith, State Coordinating Officer and Deputy Dir., LA Office of Homeland Security and Emergency Preparedness).

[28] *Dec. 7, 2005 Select Comm. Hearing* at 61 (statement of Haley Barbour).

[29] *See* Audio recordings of Hurricane Katrina Conference Calls, Louisiana State Emergency Operations Center (Aug. 26-28, 2005).

[30] *Dec. 14, 2005 Select Comm. Hearing* at 138 (statement of Kathleen Babineaux Blanco).

[31] *Id.* at 88 (statement of Jeff Smith). However, despite this insistence that forcing people out of their homes prelandfall was not an option, it was apparently still a very live option post landfall and may have been carried out, even if not ordered. *See* E-mail correspondence from John Jordan, Military Assistant to then FEMA Director Michael Brown, to Michael Brown, et al. (Sept. 4, 2005) (10:33 a.m.) ("Appears state is reluctant to execute a true mandatory evacuation – i.e., forced if necessary. Therefore, State is pushing for shelters (includes all life support) in [New Orleans] to house citizens that will not leave voluntarily."); *see* E-mail correspondence from John Jordan, Military Assistant to then FEMA Director Michael Brown, to Michael Brown, et al. (Sept. 5, 2005) (9:13 a.m.) ("Governor Blanco has decided not to force any evacuations in New Orleans. Resident are still encouraged to evacuate. Buses were sent through NO on previously in deified evac routes today and no additional residents would board buses for voluntary evacuation. It appears that the evacuation phase of operations is winding down, or may be completed. Since FEMA did not anticipate reversal of decision for mandatory evacuation, crisis-action planning is now underway to provide this support."); *see* E-mail correspondence from John Jordan, Military Assistant to then FEMA Director Michael Brown, to Michael Brown, et al. (Sept. 5, 2005) (10:04 a.m.) ("Evacuations are slowing to a trickle."); *see* E-mail correspondence from John Jordan, Military Assistant to then FEMA Director Michael Brown, to Michael Brown, et al. (Sept. 6, 2005) (11:17 a.m.) ("Decision by Governor Blanco to not force any evacuations in New Orleans remains in place. Mayor of New Orleans is not forcing evacuations in NO and is not prohibiting residents from returning. Residents are still strongly encouraged to evacuate. . . . [S]ince NO is not being fully evacuated, requirements exist to provide all commodities to the remaining population."). *See also Hearing on Hurricane Katrina: Voices from inside the Storm Before Select*

Comm., 109th Cong. (2005) at 18 (statement of Terrol Williams) ("I was [in my mother's home] for about a week until September 8th or so, at which point a rescue crew comprised of State and local police as well as armed military officers forced me to evacuate. They arrived in a truck and two tanks and confiscated my weapons. I didn't resist them, and the officers weren't rough with me . . . . The rescue team took me to the Convention Center . . . . and from there I was immediately taken by helicopter to the airport. The next morning I was put on a Delta 757 airplane. . . . Passengers weren't told where they were going until after the plane had taken off.") [hereinafter *Dec. 6, 2005 Select Comm. Hearing*].

[32] *See* ALA. CODE §§ 31-9-6 (4); 31-9-8 (4); 31-9-14 and 31-9-15 (2005).

[33] *Id.* at 22 (statement of Bob Riley).

[34] *Dec. 14, 2005 Select Comm. Hearing* at 65 (statement of Hal Rogers) ("Saturday evening at 7:30, Max Mayfield, the head of the National Hurricane Warning Center, personally, for the second time in his 36-year career, personally, called the mayor [of New Orleans] and the [Louisiana] Governor, all the Governors, by phone to reiterate the severity of this upcoming storm. 8 p.m., Mayfield telephones Mayor Nagin."); *see also id.* at 72 (statement of Kathleen Babineaux Blanco) ("On Saturday morning, indeed, Max Mayfield didn't call until – in fact he didn't call until Saturday night.").

[35] Press Conference by C. Ray Nagin, Mayor of New Orleans, and Kathleen Babineaux Blanco, Governor of LA, MSNBC, et al. Aug. 28, 2005 (Blanco: "Just before we walked into this room, President Bush called . . . and asked me to please ensure that there would be a mandatory evacuation of New Orleans.") [hereinafter Nagin-Blanco Press Conference].

[36] Public Advisory, National Weather Center (New Orleans, LA), Urgent Weather Message: Devastating damage expected (Aug. 28, 2005; 10:11 a.m. CDT).

[37] Interview of Kathleen Babineaux Blanco, CNN Saturday Night, (Aug. 28, 2005) (8:00 p.m. ET) (Blanco: "We are very concerned about the people in the City of New Orleans and some of the people in the region as well, who have not actually gotten the message. They went to bed last night thinking the hurricane was going to Florida. And some have just gotten busy in their day and not gotten – you know, had any media contact, and don't even know this is happening. So, we're hoping that by tonight, that they're watching you and getting the message that it's a real threat. It's very serious. We want them to get out of town.").

[38] *Id.*

[39] Gordon Russell, *Ground Zero*, TIMES-PIC. (New Orleans), Aug. 29, 2005 at 1.

[40] Interview of Kathleen Babineaux Blanco, ABC News Good Morning America, (Aug. 28, 2005).

[41] Interview of C. Ray Nagin, At Large with Geraldo Rivera, Fox News Channel, (Aug. 28, 2005) (10:00 p.m. ET).

[42] *Id.*

[43] *Id.*

[44] *Dec. 14, 2005 Select Comm. Hearing*, at 74 (statement of Kathleen Babineaux Blanco).

[45] *Id.*

[46] Mark Schleifstein, *Katrina Puts End to Lull*, TIMES-PIC. (New Orleans) Aug. 27, 2005 at 1.

[47] Bruce Nolan, *Katrina Takes Aim*, TIMES-PIC. (New Orleans) Aug. 28, 2005 at 1.

[48] *Id.*

[49] Nagin-Blanco Press Conference.

[50] *New Orleans Plan* at 12.

[51] *Id.* at 48, 50.

[52] Nagin-Blanco Press Conference (emphasis supplied).

[53] *Id.* (emphasis supplied).

[54] Audio recordings of Hurricane Katrina Conference Calls, Louisiana State Emergency Operations Center (Aug. 28, 2005) (12:00 p.m.) (statement of Aaron Broussard).

[55] Nagin-Blanco Press Conference.

[56] *Dec. 14, 2005 Select Comm. Hearing* (written statement of Jeff Smith). This figure was arrived at based upon the reported number of individuals evacuated by officials from New Orleans.

[57] *Id.* at 162 (statement of C. Ray Nagin).

[58] *Id.*

[59] *Dec. 6, 2005 Select Comm. Hearing* at 23 (statement of Doreen Keeler).

[60] *Id.* 90 (statement of Doreen Keeler).

[61] *Id.* at 49-50 (statement of Dyan French).

[62] *Id.* at 61 (statement of Terrol Williams).

[63] *Id.* (statement of Doreen Keeler).

[64] *Id.* at 64 (statement of Leah Hodges).

[65] *Id.* at 137-138 (statement of Barbara Arnwine).

[66] Interview by Select Comm. Staff with Sherriff Hingle, Plaquemines Parish Sherriff, in New Orleans, LA (Nov. 7, 2005).

[67] *Id.*

[68] *Id.*

[69] *Id.*

[70] Mobile County, AL, *Comprehensive Emergency Operations Plan*, Mobile County Emergency Mgmt. Agency (July 1, 2004), at ESF1-11.

[71] Baldwin County, *Emergency Operations Plan, Annex O: "Alabama Hurricane Evacuation Study, Technical Data Report for Mobile and Baldwin Counties"* (May 2001).

[72] *New Orleans Plan* at 50.

[73] *Id.* at 45.

[74] *Id.* at 50, 24.

[75] *Id.* at 54.

[76] *Id.* at 55.

[77] *Dec. 14, 2005 Select Comm. Hearing* at 172 (statement of Terry Ebbert, Dir. of Homeland Security, City of New Orleans).
[78] *See* Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Aug. 26-28, 2005).
[79] *Id.* (statement of Terry Ebbert).
[80] *Dec. 14, 2005 Select Comm. Hearing* at 73 (statement of Kathleen Babineaux Blanco).
[81] *Dec. 7, 2005 Select Comm. Hearing* at 62 (statement of Haley Barbour).
[82] *Hearing on Hurricane Katrina: The Role of the Federal Emergency Management Agency Before Select Comm.*, 109th Cong. (Sept. 27, 2005) at 67-69 (statements of Michael Brown and Gene Taylor) [hereinafter *Sept. 27, 2005 Select Comm. Hearing*].
[83] *Dec. 14, 2005 Select Comm. Hearing* at 74 (statement of Kathleen Babineaux Blanco).
[84] Interview by Select Comm. Staff with Joseph Donchesse (Pres., LA Nursing Home Assoc.) in Baton Rouge, LA (Nov. 10, 2005).
[85] *See generally Dec. 14, 2005 Select Comm. Hearing* (written statement of Jeff Smith).
[86] John Simerman, *Breaches took toll: N.O. ruin greatly increased*, ADVOCATE (Baton Rouge) Dec. 31, 2005 at 1A, 8A [hereinafter *Breaches Article*].
[87] Interview by Select Comm. Staff with Larry Ingargiola, St. Bernard Parish Director of Homeland Security and Emergency Prepaedness, in St. *Bernard Parish*, LA (Nov. 3, 2005).
[88] *Breaches Article*, 1A; *see also*, Knight Ridder Tribune News, *Most Katrina Victims Older; many white*, ADVOCATE (Baton Rouge) Dec. 30, 2005 at 9A [hereinafter *Analysis Article*].
[89] *Breaches Article* at 1A.
[90] *Breaches Article* at 8A.
[91] *Id.*
[92] *Id.*
[93] *Analysis Article* at 9A.
[94] *Id.*
[95] *Id.*
[96] *Id.* ("The comparison showed that 42 percent of the bodies found in Orleans and St. Bernard parishes were recovered in neighborhoods with poverty rates higher than 30 percent. That's only slightly higher than the 39 percent of residents who lived in such neighborhoods, according to the census data. Similarly, 31 percent of the bodies turned up in areas with poverty rates below 15 percent, where 30 percent of the population lived. The median household income in neighborhoods where Katrina victims were recovered was about $27,000 a year, just under the $29,000 median for the overall area. One-fourth of Katrina deaths fell in census tracts with median incomes above $35,300. One-fourth of the area's pre-storm population lived in tracts with median incomes above $37,000.")
[97] Interview by Select Comm. Staff with Nicholas Gachassin, Jr., First Assistant Attorney General, LA Department of Justice, in Baton Rouge, LA (Nov. 6, 2005).
[98] *Id.*
[99] *Analysis Article* at A3.
[100] *Hearing on Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama Before Select Comm.*, 109th Cong. (2005), at 2 (written statement of R. Dennis Sirois), [hereinafter *Oct. 27, 2005 Select Comm. Hearing*]; *see also id.* at 37 (statement of R. Dennis Siros).
[101] LA Nat. Guard, *Overview of Significant Events Hurricane Katrina* at 23-24 (Dec. 7, 2005) [hereinafter *LANG Overview*].
[102] *Dec. 14, 2005 Select Comm. Hearing* (written statement of Jeff Smith).
[103] *See* Interview by Select Comm. Staff with General Brod Veillon, LA National Guard Commander for Task Force Minnow, in New Orleans, LA (Nov. 3, 2005); *see also* Interview by Select Comm. Staff with Colonel Barry Keeling, LA National Guard Commander of Task Force Eagle, in New Orleans, LA (Nov. 3, 2005).
[104] Nagin-Blanco Press Conference (Nagin: "At noon today, the Superdome will then be opened up as a refuge of last resort, where we will start to take citizens that cannot evacuate.").
[105] *LANG Overview* at 6.
[106] *See* Interview by Select Comm. Staff with Jacques Thibodeaux (LtC, LA Nat'l Guard) in New Orleans (Nov. 3, 2005) [hereinafter Thibodeaux Interview]; *see* Interview by Select Comm. Staff with Mark Mouton (Col, LA Nat'l Guard) in New Orleans, LA (Nov. 3, 2005) [hereinafter Mouton Interview]; Interview by Select Comm. Staff with Scott Wells (Field Officer, FEMA) in Baton Rouge, LA (Nov. 9, 2005) [hereinafter Wells Interview]; *see also* E-mail correspondence from David Passey (Dep't Homeland Security) to Cindy Taylor (Dep't Homeland Security), et al. (Aug. 28, 2005) (Doc. No. DHS 007265) ("Seven trucks (5 water and 2 MREs) are less than 2 hours away from the Superdome.").
[107] Thibodeaux Interview; Mouton Interview.
[108] *Id.*
[109] *Id.*
[110] *Id.*
[111] *Dec. 14, 2005 Select Comm. Hearing* at 3 (written statement of C. Ray Nagin).
[112] *See FEMA Chief Mike Brown* (NPR: All Things Considered broadcast, Sept. 5, 2005) (playing audio clip from CNN interview by Paula Zahn, CNN anchor, and Michael Brown, FEMA Director:

> "Mr. MICHAEL BROWN (FEMA Director): We just learned about that today. And so I have directed that we have all available resources to get to that Convention Center to make certain that they have the food and water. And I'll tell you...
>
> Ms. PAULA ZAHN (CNN): But, sir, you're not telling me that you just...
>
> Mr. BROWN: ...also—and I will tell you...
>
> Ms. ZAHN: ...learned that the folks at the Convention Center didn't have food and water until today are you?
>
> Mr. BROWN: Paula, the federal government did not even know about the Convention Center people until today [Thursday, Sept. 2,

2005]."); *see NBC Today Show* (NBC television broadcast Sept. 10, 2005) (New Orleans co-host, Lester Holt: "That's right Campbell. If you'll recall, Michael Brown, the head of FEMA, acknowledged it was about 24 hours after those first TV reports of people holed up here [the New Orleans Convention Center] without food, in need of water, that he found out about it. That opened him up to a lot of criticism."); *see,* Editorial Opinion, *Bush: First the Head of FEMA; Would you trust your safety to Michael Brown?*, DAILY NEWS (Phila.), Sept. 7, 2005, at 17 ("Here was a clueless bureaucrat [Mr. Brown] who didn't seem to believe the horror stories coming out of the New Orleans convention center."); *see, Leadership: Some tragedy avoidable*, CHARLESTON GAZ. (W. Va.), Sept. 3, 2005, at 4A ("FEMA Director Michael Brown admitted that he did not know until Thursday that thousands of people had been stranded at the New Orleans Convention Center for days without water of foods, as well as in the Superdome. How could he not know? Anyone listening to local radio knew.").

[113] LA Nat. Guard, *Timeline of Significant Events Hurricane Katrina*, at 7 (Dec. 7, 2005) [hereinafter *LANG Timeline*].
[114] Thibodeaux Interview; Mouton Interview; *LANG Overview* at 23-24.
[115] Thibodeaux Interview; Mouton Interview.
[116] Interview by Select Comm. Staff with Gordon Mitchell (LA State Police) in Baton Rouge, LA (Nov. 4, 2005).
[117] *Dec. 14, 2005 Select Comm. Hearing* at 200, 202 (statement of C. Ray Nagin). It is important to remember, however, that the school district is already a support agency for transportation under the New Orleans Plan.
[118] *Id.* at 201 (statement of C. Ray Nagin). There was evidence that a portion of the RTA bus fleet was saved by being moved to the wharf by the Mississippi River. Email from Leo Bosner to Linda Mammett-Morgan, et. al., transmitting Final Version DHS 0230 Situation Report input for Sept. 2, 2005, Doc. No. DHS-FEMA-0051-03122-03151, at 03128 (Sept. 02, 2005). According to RTA General Manager William DeVille, 197 of the RTA's 372 buses were destroyed. *Hearing on Rebuilding Highway and Transit Infrastructure on the Gulf Coast following Hurricane Katrina: State and Local Officials Before House Subcomm. on Highways, Transit and Pipelines of the Comm. on Transportation and Infrastructure*, 109th Cong. (2005) (statement of William J. DeVille). Whether the buses were available or not, no drivers were apparently available.
[119] *Dec. 14, 2005 Select Comm. Hearing* at 201 (statement of C. Ray Nagin).
[120] Thibodeaux Interview; Mouton Interview.
[121] *Sept. 27, 2005 Select Comm. Hearing* at 57 (statement of Rep. Hal Rogers).
[122] *Id.* at 58 (statement of Michael Brown).
[123] *Dec. 6, 2005 Select Comm. Hearing* at 107 (statement of Charles Allen).
[124] E-mail correspondence from Tony Robinson, Response and Recover Division Director, FEMA, to Jeff Smith, Col. Dep. Dir. LA Off. of Homeland Security and Emergency Preparedness, (Sept. 15, 2005).
[125] *Dec. 14, 2005 Select Comm. Hearing* at 131 (statement of Kathleen Babineaux Blanco).
[126] *See generally* Daily Video Teleconferences amongst officials dated Aug. 25 – Sept. 4, 2005 [hereinafter "Daily VTC"]. State and local officials from each of the impacted areas met daily with officials from, among other agencies, FEMA, and the National Hurricane Center.
[127] Memorandum of Spot Report regarding FEMA Co-ordination Calls, Doc. No. DHS-FEMA-00510001220–21 (Aug. 31, 2005).
[128] *Id.*
[129] *Id.*
[130] *Id.*
[131] E-mail correspondence from Gary Jones, FEMA, to Edward Buikema, FEMA Acting Director for Response during Hurricane Katrina, (Aug. 31, 2005) ("Jack Colley just advised me that Gov Perry has not received a call from Gov Blanco regarding this plan [to move LA evacuees to the Houston Astro Dome]. Jack said he heard that she was going to make the call early this morning, again this has not happened.").
[132] *Dec. 14, 2005 Select Comm. Hearing* at 155-156 (statement of Kathleen Babineaux Blanco) (Chairman Davis: "One last question, when did you realize that the tens of thousands of people in the Superdome would have to be evacuated out of New Orleans . . . .?" Blanco: "I recognized it on Tuesday [Aug. 30], when I was able to do – well, I knew about it before, but I had, you know, with my own eyes, made an evaluation.").
[133] Daily VTC (Aug. 30, 2005) at 10.
[134] Interview by Select Comm. Staff with Phil Parr, Dep. Fed. Coord Officer, FEMA in Washington, DC (Dec. 8, 2005) [hereinafter "Parr Interview"]; *see generally Dec. 14, 2005 Select Comm. Hearing* (statement of Phil Parr).
[135] Parr Interview.
[136] *Id.*
[137] *Id.*
[138] *Id.*
[139] Daily VTC (Aug. 30, 2005) at 11-12.
[140] *Id.* at 14 (emphasis supplied).
[141] Interview by Select Comm. Staff with Edward Buikema, FEMA acting Director for Response during Hurricane Katrina, in Washington, DC (Jan. 6, 2006) [hereinafter "Buikema Interview"].
[142] Daily VTC (Aug. 31, 2005) at 3.
[143] *Id.* at 26.
[144] Daily VTC (Sept. 1. 2005) at 9.
[145] Executive Order, Louisiana Governor Kathleen Babineaux Blanco, Emergency Evacuation by Buses, Exec. Order No. KBB 2005-31 (Aug. 31, 2005).
[146] E-mail correspondence from Miles Bruder, LA State Official, to "All Gov. Staff" regarding co-ordination of bus service (Aug. 31, 2005).
[147] Daily VTC (Sept. 1, 2005) at 8.
[148] *Id.*
[149] *Id.;* Executive Order, Louisiana Governor Kathleen Babineaux Blanco, Emergency Evacuation by Buses, Exec. Order No. KBB 2005-25 (Sept. 2, 2005). Note, this differs from the Executive Order issued on Aug. 31, 2005, in that it waves the commercial drivers license requirement for bus drivers.
[150] VTC (Sept. 1, 2005) at 9.

[151] *Id.* at 11.
[152] Parr Interview.
[153] Buikema Interview.
[154] VTC (Sept. 1, 2005) at 14.
[155] *See generally, Id*. Daily VTC (Sept. 2, 2005).
[156] *Id.* at 4-5.
[157] *Id.* at 5.
[158] *Id.* at 5-6.
[159] *Id.* at 3.
[160] *Id.* at 5.
[161] *Id.* at 3.
[162] Interview by Select Comm. Staff with Jim McVaney, Director of Government Relations for Air Transport Association, in Washington, DC (Oct. 24, 2005).
[163] *Id.*
[164] *Id.*
[165] *Id.*
[166] *Id.*
[167] *Hearing on Hurricane Katrina: The Role of the Department of Homeland Security Before Select Comm.*, 109th Cong. (Oct. 19, 2005) at 48 (statement of Michael Chertoff); *see also* H. R. Conf. Rep. No. 105-297, at 127 (1997) (appropriating $500,000 for a "comprehensive analysis and plan of all evacuation alternatives for the New Orleans metropolitan area"); *see also* H.R. Conf. Rep. No. 106-379, at 151 (1999) (directing FEMA to develop an evacuation plan for the New Orl eans area). Whatever plans resulted from these federal directives, they were clearly inadequate.

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"The one-two combination of a catastrophic hurricane and massive flood overwhelmed the normal disaster relief system. Some things worked well. But there were shortcomings that we must urgently address.

"This tragedy has emphasized how critical it is that we ensure our planning and response capabilities perform with seamless integrity and efficiency in any type of disaster situation – even one of cataclysmic nature."

Michael Chertoff
Secretary, U.S. Department of Homeland Security
Select Committee Hearing, October 19, 2005

Critical elements of the national response plan were executed late, ineffectively, or not at all

Summary

Similar to the troubled national responses to Hurricanes Hugo and Andrew in 1989 and 1992 respectively, the federal government failed to recognize the magnitude of the situation presented by Hurricane Katrina prior to landfall, adequately project future needs, fully engage the President, and respond in a proactive and timely manner. While the Federal Emergency Management System had evolved since Andrew to include a developed protocol for responding proactively to catastrophic disasters, important aspects of the National Response Plan were poorly executed, which contributed to the inadequate federal response to Hurricane Katrina.

With the creation of the Department of Homeland Security (DHS) and the development of the National Response Plan (NRP), an additional layer of management and response authority was placed between the President and FEMA, and additional response coordinating structures were established.[1] The Secretary of Homeland Security became the President's principal disaster advisor responsible for enabling the President to effectively utilize his authority under the Stafford Act to direct all federal agencies, particularly the Department of Defense (DOD), to respond in a coordinated and expeditious fashion. As part of these changes, critical response decision points were assigned to the Secretary of Homeland Security.[2] Secretary Chertoff executed these responsibilities late, ineffectively, or not at all. These secretarial authorities include:

- The designation of an incident of national significance (INS);
- The authority to convene the Interagency Incident Management Group (IIMG);
- The designation of the principal federal official (PFO); and
- The invocation of the national response plan's catastrophic incident annex (NRP-CIA).

There was plenty of advance warning by the National Weather Service, and the consequences of a category 4 hurricane striking New Orleans were well-documented. Fifty-six hours prior to landfall, Hurricane Katrina presented an extremely high probability threat that 75 percent of New Orleans would be flooded, tens of thousands of residents may be killed, hundreds of thousands trapped in flood waters up to 20 feet, hundreds of thousands of homes and other structures destroyed, a million people evacuated from their homes, and the greater New Orleans area would be rendered uninhabitable for several months or years.[3] An August 28 report by the department's National Infrastructure Simulation and Analysis Center concluded: "Any storm rated Category 4 or greater . . . will likely lead to severe flooding and/or levee breaching, leaving the New Orleans metro area submerged for weeks or months."[4]

Under these conditions it seems reasonable to expect the criteria for designating an INS would have been met, the appointment of a PFO would be necessary to coordinate an unprecedented federal response, the IIMG would be convened to provide strategic guidance and recommendations to the Secretary and the President, and the NRP-CIA would be invoked to shift the federal response posture from a reactive to proactive mode in order to save lives and accelerate assistance to overwhelmed state and local systems. According to a recent letter submitted by DHS (see Appendix 7) in response to the preliminary observations of the Comptroller General (see Appendix 6), DHS viewed the NRP-CIA as applicable only to no-notice or short-notice events. And the Select Committee acknowledges that the State of Louisiana expressed its satisfaction with the supplies and that former FEMA Director Michael Brown directed that commodities be "jammed up" the supply chain.

While the NRP-CIA may be particularly applicable to a no-notice event, the Annex itself reflects only that a catastophic incident may occur with little or no warning.

And the pre-positioning of supplies to the satisfaction of state and local authorities, while an appropriate measure for a disaster without catastophic consequences, was clearly not sufficient for the catastrophic consquences of Hurricane Katrina.

Instead, absent a catastrophic disaster designation from Chertoff, federal response officials in the field eventually made the difficult decisions to bypass established procedures and provide assistance without waiting for appropriate requests from the states or for clear direction from Washington. These decisions to switch from a "pull" to a "push" system were made individually, over several days, and in an uncoordinated fashion as circumstances required. The federal government stumbled into a proactive response during the first several days after Hurricane Katrina made landfall, as opposed to the Secretary making a clear and decisive choice to respond proactively at the beginning of the disaster. The White House Homeland Security Council (HSC), situated at the apex of the policy coordination framework for DHS issues, itself failed to proactively de-conflict varying damage assessments. One example included an eyewitness account of a levee breach supplied by a FEMA official at 7:00 p.m. on August 29. The White House did not consider this assessment confirmed for 11 more hours, when, after 6:00 a.m. the next morning, it received a Homeland Security Operations Center (HSOC) Situation Report confirming the breach.

The catastrophic nature of Katrina confirmed once again that the standard "reactive" nature of federal assistance, while appropriate for most disasters, does not work during disasters of this scale. When local and state governments are functionally overwhelmed or incapacitated, the federal government must be prepared to respond proactively. It will need to anticipate state and local requirements, move commodities and assets into the area on its own initiative, and shore up or even help reconstitute critical state and local emergency management and response structures.

The need for assistance is extreme during the initial period of a catastrophic hurricane, yet the ability of state and local responders to meet that need is limited. That is why it is so important for the federal government, particularly DOD resources, to respond proactively and fill that gap as quickly as possible. Because it takes several days to mobilize federal resources, critical decisions must be made as early as possible so that massive assistance can surge into the area during the first two days, not several days or weeks later. The CIA-NRP was drafted to meet this specific and well known requirement, yet Chertoff never invoked it for Katrina.

In contrast, the Emergency Management Assistance Compact (EMAC), a critical part of the national emergency management framework, successfully provided unprecedented levels of response and recovery personnel and assets to the Gulf coast in record time following Hurricane Katrina. EMAC is designed by statute to be adaptable and scaleable to meet the changing needs of each event. EMAC was widely praised for its quick and effective process for putting vital resources into every aspect of the response.

Finding: It does not appear the president received adequate advice and counsel from a senior disaster professional

Although the Select Committee's access to White House documents, communications, and staff was not as comprehensive as we had hoped, the information we did receive suggests the President could have received better disaster advice and counsel.

The Stafford Act places the federal government's disaster response authorities with the President. Similar to military matters, the President is the commander in chief of federal disaster response. Yet, unlike the military, which provides the Chairman of the Joint Chiefs of Staff as the President's primary professional military advisor, the President does not have regular access to a senior disaster professional to advise him during disasters or on disaster response issues. The President lacks this resource even though catastrophic disasters may strike with little or no warning and require early Presidential involvement to reduce the loss of life, human suffering, and extensive property damage.[5]

Under the Homeland Security Act, the Secretary of Homeland Security reports to the President and is the department's top disaster official; yet emergency management is just one of the Secretary's many responsibilities.[6] According to Chertoff's testimony before the Select Committee, he is not a hurricane expert, nor does he have much experience with disasters.[7]

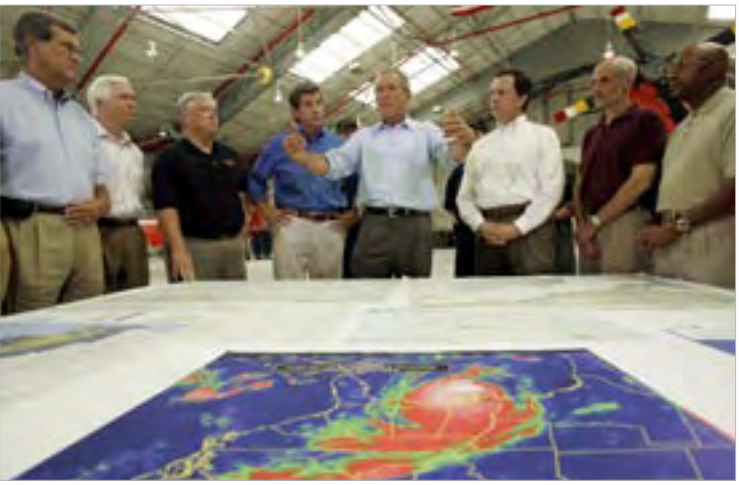
However, according to White House and FEMA documents, it appears the White House took several steps to improve the flow of information and strategic advice into the President. For example, HSC staff solicited regular situation reports from almost every federal agency for the White House situation room. The HSC commenced 24-hour operations the morning Katrina hit New Orleans.[8] In addition, White House officials attempted to pressure the HSOC to convene the IIMG on the Saturday before Katrina made landfall.[9]

The IIMG consists of high level officials from all the major federal agencies, and it is intended to assess the magnitude of crisis situations, project future requirements for federal assistance, develop plans for meeting those requirements, recommend to the Secretary and the President appropriate courses of action, and provide strategic advice.[10] The Secretary did not convene the IIMG until three days later, roughly 36 hours after landfall.[11]

Within the emergency management community, there are a handful of potential catastrophes that keep disaster professionals awake at night. Perhaps the most troubling of these has been a category 3 or larger storm striking New Orleans because of its high likelihood of occurrence, the extreme vulnerability of the city to long term flooding, and the difficulty of evacuating a large urban population over limited evacuation routes. As a result, this scenario has been studied, planned, and exercised perhaps more than any other potential catastrophic disaster in the country. A senior disaster professional would be well aware of the consequences of such a storm, recognize the challenges of responding to such a disaster, and appreciate the need for timely and proactive federal assistance.

Comments such as those the President made about not expecting the levees to breach do not appear to be consistent with the advice and counsel one would expect to have been provided by a senior disaster professional. Furthermore, it seems reasonable to expect delays in recognizing the need for and then requesting DOD mission assignments may have been avoided if the President had been advised of the need for early presidential involvement.

Comments such as those the President made about not expecting the levees to breach do not appear to be consistent with the advice and counsel one would expect to have been provided by a senior disaster professional.



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Finding: Given the well-known consequences of a major hurricane hitting New Orleans, the Secretary should have designated an incident of national significance no later than Saturday, two days prior to landfall, when the National Weather Service predicted New Orleans would be struck by a Category 4 or 5 hurricane and President Bush declared a Federal Emergency

The consequences of a major hurricane, defined as a category 4 or greater storm, striking New Orleans were well-known within Louisiana, the emergency management community, and DHS.[12] FEMA officials selected New Orleans as the first project for its catastrophic disaster preparedness program precisely because of its high probability of occurrence and horrific consequences.[13] The New Orleans levee system was designed to withstand, in

essence, a category 3 storm. Anything larger would exceed the levees' design capacity and likely cause catastrophic flooding of the city. FEMA's Hurricane Pam exercise predicted the storm would inundate 75 percent of the city up to 20 feet and cause 60,000 deaths.[14]

Two days before landfall the National Weather Service predicted Katrina would strike New Orleans as a category 4 or 5 hurricane. The governors of Louisiana and Mississippi declared state emergencies and the President issued an emergency declaration for Louisiana. At this point in time, it was extremely likely FEMA's worst case hurricane scenario was about to unfold. Chertoff should have declared an INS in recognition of the severity of the situation and to allow for the immediate convening of the IIMG, designation of the PFO, and invocation of the NRP-CIA.

Finding: The Secretary should have convened the IIMG on Saturday, two days prior to landfall, or earlier to analyze Katrina's potential consequences and anticipate what the federal response would need to accomplish

The purpose of the IIMG is to anticipate evolving requirements and provide strategic recommendations or courses of action for the Secretary and President to consider as part of a national response to a major incident. The IIMG replaces the Catastrophic Disaster Response Group from the old Federal Response Plan and was created to fill an important operational planning gap. During a major incident, the NRP expects the response organization to be focused on the current and subsequent 24-hour operational period and unable to assess the overall disaster situation, project future needs, and develop effective plans to protect life and property. The NRP utilizes the IIMG, a group of experienced high level professionals with agency decision making authority, to look at the big picture, anticipate what will be needed several days in advance, and develop plans to fulfill those requirements. Those plans can then be provided to the operational commanders and implemented in a timely manner.[15]

The "single biggest failure" of the federal response was that it failed to recognize the likely consequences of the approaching storm and mobilize federal assets for a post-storm evacuation of the flooded city. If it had, then federal assistance would have arrived several days earlier.

The authority to convene the IIMG is the Secretary's,[16] yet Chertoff did not execute that authority early enough for the IIMG to perform this function during the critical pre-landfall period and initial days of the disaster. According to an e-mail between top FEMA officials on Sunday, the day before landfall, White House officials were pressuring the head of the HSOC, Matthew Broderick, to convene the IIMG.[17] Because the Secretary did not activate the IIMG until roughly 36 hours after landfall, despite the White House pressure, we will never know what the IIMG would have done, given the hurricane forecast and well-known consequences of a category 4 storm, in anticipation that the New Orleans levees would likely breach and force the rescue and evacuation of tens of thousands of victims from the flooded city.

If Chertoff had convened the IIMG, then perhaps on the Saturday or Sunday before landfall, when FEMA officials were deploying emergency response teams and moving tons of commodities into the surrounding region, the IIMG would have begun to accelerate DOD's involvement, develop plans to evacuate the Superdome, and pre-stage buses and boats outside the region for immediate deployment after the storm passed. Instead, the FEMA operational teams did not begin planning these critical actions until three days later, Tuesday evening, and the buses and boats did not arrive in large quantities until Thursday.[18]

According to Colonel Jeff Smith, Deputy Director for Emergency Preparedness with the Louisiana Office of Homeland Security and Emergency Preparedness

(LOHSEP), the "single biggest failure" of the federal response was that it failed to recognize the likely consequences of the approaching storm and mobilize federal assets for a post-storm evacuation of the flooded city. If it had, then federal assistance would have arrived several days earlier.[19]

By not convening the IIMG prior to landfall, the Secretary robbed himself and the President of the opportunity to receive professional advice and strategic options for proactively addressing the unfolding catastrophic disaster. The threat stream presented by Katrina was clear days before landfall, the potential consequences were well-known, and important tools for dealing with the situation were available yet not utilized.

Finding: The Secretary should have designated the Principal Federal Official on Saturday, two days prior to landfall, from the roster of PFOs who had successfully completed the required PFO training, unlike FEMA Director Michael Brown. Considerable confusion was caused by the Secretary's PFO decisions

According to the NRP, "the PFO is personally designated by the Secretary of Homeland Security to facilitate federal support to the established Incident Command System (ICS) Unified Command structure and to coordinate overall federal incident management."[20] During large multi-state disasters such as Katrina, the PFO's role becomes particularly important for providing a coordinated federal response, as the FCOs appointed by the President for each state only control operations within their respective states. The Secretary should have begun this coordination earlier and appointed a PFO on Saturday.

The Secretary's eventual designation of Brown as PFO on Tuesday evening was highly unusual and elicited a concerned and confused reaction from Brown.[21] In order

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to prepare PFO-designates to fulfill the responsibilities and functions of the PFO, the department conducts a formal training program, and maintains a roster of individuals approved and qualified to serve as a PFO. The NRP requires that "[u]nless extenuating circumstances dictate otherwise, all PFO-designates should satisfactorily complete this training program prior to performing PFO-related responsibilities."[22]

According to DHS officials, Brown had not taken the required PFO training program and was not on the approved PFO roster.[23] Coast Guard Admiral Thad Allen had successfully completed the training program, as had all of the other individuals designated by the Secretary to serve as PFO for past INS designations and National Special Security Events.[24] It is unclear why Chertoff deviated from the requirements of the NRP and designated an untrained individual to serve as PFO for such a catastrophic disaster.

There was confusion over the role and authority of the PFO

The Secretary was confused about the role and authority of the PFO. According to Chertoff's testimony, he designated Brown PFO because Brown was his "battlefield commander."[25] Yet, the NRP specifically states, "The PFO does not direct or replace the incident command structure established at the incident, nor does the PFO have directive authority over the SFLEO [Senior Federal Law Enforcement Officer], FCO [Federal Coordinating Officer], or other federal and state officials."[26] Furthermore, the Stafford Act places all emergency response authorities with

Brown had not taken the required PFO training program and was not on the approved PFO roster.

the President and requires that the President designate a FCO for each disaster or emergency declaration.[27] As a result, the legal authority to "command the battlefield," as the Secretary put it, resides with the FCO, not the PFO.

The apparent confusion over the authority and role of the PFO does not seem to have been recognized until almost two weeks after Chertoff selected Allen to replace Brown as PFO. It was at that time that the unprecedented decision was made to appoint Allen the FCO for Louisiana, Mississippi, and Alabama *in addition* to PFO. This step was necessary because DHS eventually recognized Allen, as the PFO only, did not have the legal authority to commit the expenditure of federal funds or direct federal agencies under delegated authority from the President.[28] As described above, only the FCO has that authority. This confused and unprecedented series of actions by the department prompted the resignation and departure of Bill Carwile, one of FEMA's most well respected FCOs, who was serving as FCO in Mississippi.[29]

Finding: A proactive federal response, or push system, is not a new concept, but it is rarely utilized

What is a push system?

In response to most disasters, the federal government provides assistance in response to state requests. This reactive approach is often referred to as a "pull" system in that it relies on states knowing what they need and being able to request it from the federal government.[30] States may make these requests either before disasters strike because of the near certainty that federal assistance will be necessary after such an event, *e.g.*, with hurricanes, or afterwards, once they have conducted preliminary damage assessments and determined their response capabilities are overwhelmed.

Unlike the bulk of the disasters requiring FEMA's response, catastrophic disasters require the federal response to be more proactive. This proactive response is referred to as a "push" system, in which federal assistance is provided and moved into the affected area prior to a disaster or without waiting for specific requests from the state or local governments.[31]

Implementing a push system—a proactive federal response—does not require federalization of the disaster or the usurping of state authority. Although a push system is a proactive response by the federal government, it still requires notification and full coordination with the state. The coordination process, however, should not delay or impede the rapid mobilization and deployment of these critical federal resources.[32]

A proactive response, or push system, is nothing new. In 1992, the nation's management of catastrophic disasters was intensely criticized after Hurricane Andrew leveled much of South Florida and Hurricane Iniki destroyed much of the Hawaiian island of Kauai.[33] In particular, a 1993 GAO report points to the slow delivery of services vital to disaster victims as a major flaw in the response to Hurricane Andrew in South Florida.[34] The report then contrasts this with the more effective response to Hurricane Iniki in Hawaii, where FEMA implemented a push system and sent supplies to the island of Kauai before local officials requested them.[35] This occurred despite being implemented in an ad hoc manner—rather than as part of an orderly, planned response to catastrophic disasters.[36] Furthermore, the long-standing authority for a proactive federal response resides in the Stafford Act. The current plan for how to utilize that authority is the NRP-CIA.

The pre-positioning of assets and commodities is a distinct action from the push or pull of those assets

The federal government will often pre-position life-saving and life-sustaining disaster equipment and supplies prior to landfall of a hurricane as close to a potential disaster site as possible. This pre-positioning of supplies can substantially shorten response time and delivery of initial critical disaster supplies to the field.

Although part of a proactive response, this pre-positioning of disaster supplies and assets is not in and of itself a push of commodities. Once assets are pre-positioned to go into the field, they still need to be mobilized and deployed into the field either proactively by pushing the commodities to the state or reactively by waiting for a request from the state.

Operational procedures for a push are not well exercised, practiced, or utilized

The majority of declared disasters are not catastrophic. Because of this, the pull system is most commonly used during disasters and training exercises and, therefore, is more familiar to disaster response personnel. In fact, the NRP-CIA has never been appropriately exercised.[37] As a result, federal personnel have little experience or comfort with instituting a proactive response.

Additionally, if the Homeland Security Secretary does not invoke the NRP-CIA, federal personnel have no clear instruction to switch from a reactive approach to a proactive approach. Without this clear direction, federal personnel can be uncomfortable pushing resources into the state because of the inherent risks, such as complicating the disaster response by diverting needed resources from other areas or wasting millions of dollars in a duplication of effort.

Finding: The Secretary should have invoked the Catastrophic Incident Annex (NRP-CIA) to direct the federal response posture to fully switch from a reactive to proactive mode of operations

Perhaps the single most important question the Select Committee has struggled to answer is why the federal response did not adequately anticipate the consequences of Katrina striking New Orleans and, prior to landfall, begin to develop plans and move boats and buses into the area to rescue and evacuate tens of thousand of victims from a flooded city. At least part of the answer lies in the Secretary's failure to invoke the NRP-CIA, to clearly and forcefully instruct everyone involved with the federal response to be proactive, anticipate future requirements, develop plans to fulfill them, and execute those plans without waiting for formal requests from overwhelmed state and local response officials.

The NRP-CIA was specifically written for a disaster such as Katrina. According to the NRP:[38]

- A catastrophic incident results in large numbers of casualties and displaced persons.
- The incident may cause significant disruption to the area's critical infrastructure.
- A credible operating picture may not be achievable for 24 to 48 hours or longer. As a result, response activities must begin without the benefit of a complete needs assessment.
- Federal support must be provided in a timely manner to save lives, prevent human suffering, and mitigate severe damage. This may require mobilizing and deploying assets before they are requested via normal NRP protocols.
- Large-scale evacuations, organized or self-directed may occur.
- Large numbers of people may be left homeless and may require prolonged temporary housing.

It is clear the consequences of Hurricane Katrina exceeded all of these criteria and required a proactive response. According to the NRP, "Upon recognition that a catastrophic incident condition (e.g. involving mass casualties and/or mass evacuation) exists, the Secretary of DHS immediately designates the event an INS and begins, potentially in advance of a formal Presidential disaster declaration, implementation of the NRP-CIA."[39] On Monday evening, when DHS received reports the levees had breached in multiple locations, it should have been clear to the department the nation's worst case hurricane scenario had occurred and a proactive federal response was required.[40] Chertoff never invoked the NRP-CIA.

Smith, LOHSEP Deputy Director for Emergency Preparedness, believed, "the biggest single failure of the federal response was the Department of Homeland Security's failure to recognize that Katrina was a catastrophic event and implement the catastrophic incident annex to the National Response Plan…Had DHS recognized Katrina for the event that it was, a truly catastrophic event, had DHS implemented the catastrophic incident annex to the NRP, Louisiana should have had a significant number of federal troops and federal assets, days prior to their actual arrival. . . . Instead federal troops did not arrive in number until Saturday, after the evacuations of the Superdome, Convention Center and cloverleaf were complete."[41]

Finding: Absent the Secretary's invocation of the NRP-CIA, the federal response evolved into a push system over several days

Even though Chertoff never invoked the catastrophic annex, federal officials in the field began, in an ad hoc fashion, to switch from a pull response to a push system because of the operational demands of the situation. The switch was uncoordinated but widespread by the end of the first week. This has occurred in previous disasters. As previously mentioned, the response to Hurricane Iniki in Hawaii implemented an ad hoc push system as FEMA sent supplies to the island of Kauai before local officials requested them.[42] Similarly, the response to Katrina evolved into an ad hoc push system, even though the NRP-CIA was not invoked.

The following Mississippi and Louisiana examples illustrate the switch to a push response and several other important principles of effective emergency management. First, they demonstrate the importance of having qualified and experienced professionals in charge of operations. Second, these officials need to have the authority to commit resources as they see fit without waiting to seek approval from above. And, third, federal officials need to have good working relationships with their state counterparts. In the first example, Carwile had been the FCO in Florida during the 2004 hurricane season and developed a close relationship with the Florida Director of Emergency Management Craig Fugate. It is clear from e-mails and numerous staff interviews that Carwile did not hesitate to authorize and Fugate provided any and all assistance to Mississippi without formal requests from Mississippi authorities.[43]

On August 30, FEMA worked with Florida officials to push response assets into Mississippi. In an e-mail to Brown and Carwile, Fugate informed them Florida was pushing search and rescue teams into Mississippi. He noted the EMAC paperwork was not keeping up with the need, so they were working off of verbal requests. Specifically, he wrote, "To both of you, you need it, you got it from [F]lorida. [T]he paper work (sic) can follow."[44]

On Thursday, September 1, Carwile and Fugate continued to push resources into Mississippi without clear mission requests:

[5:42 a.m. e-mail from Fugate to Carwile]

> I'm out of water and ice from my stocks. I've directed Mike DeLorenzo [with the Florida Division of Emergency Management] to start purchasing and shipping product into the coastal Mississippi Counties. Not sure I have an EMAC mission, but our folks on the ground have concerns if they run out.
> Not sure how much and when, but will try to keep you updated on progress. If this works, will continue until told to stop.
>
> So far we have only been shipping water and ice. No food or baby products.
>
> Craig
>
> ———————————
>
> Craig Fugate, Director
> Florida Division of Emergency Management

[10:26 a.m. reply from Carwile to Fugate]

> Craig:
>
> You are doing the right thing. Thanks. Know Robert [Robert Latham, Director of the Mississippi Emergency Management Agency] would concur. Will police up paperwork later – you have my guarantee.
>
> Food is also critical. Need MRE [meals ready to eat] and/or heater meals if you have any. Water, ice, food in eastern counties should be your priority. Recommend Allen coordinate with MGen Cross (TAG, MS) for integration into their distribution system.
>
> Also, know FL is providing law enforcement. Need all you can send. Public safety major concern (looting, etc.). Have used Dixie Co. body bags (250) got more?
>
> Thanks, old friend, Bill

In Louisiana, FEMA response personnel tried on a number of occasions to push commodities and assets into the field. In cases where it was clear there was a need for life-saving and life-sustaining commodities but no clear state distribution system set up, FEMA acted proactively to provide assistance. For example, Louisiana FCO Bill Lokey noted there were situations where stranded individuals were not in immediate danger, but needed food and water. When FEMA gained access to several helicopters, FEMA began ferrying food and water to people stranded on high ground even though there was no formal request by the state to perform this function. In addition, FEMA contracted with over 100 ambulances to transport hospital evacuees. This mission was not requested by the state, but FEMA responded proactively because the situation demanded immediate action.[45]

Although there are numerous examples of a push system being implemented at times, there were also a number of times when state or local officials expressed frustration that requests for assistance were not processed because they did not follow the formal request process. For example, according to Louisiana and FEMA officials, state and local officials verbally requested specific assets or commodities during conference calls that were never fulfilled.[46] In these cases no immediate action was taken because FEMA officials assumed the state would follow up the verbal requests with official written requests. If the catastrophic annex had been invoked, then perhaps FEMA would have expected requests outside the normal process and acted on them.

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Finding: The Homeland Security Operations Center failed to provide valuable situational information to the White House and key operational officials during the disaster

During Hurricane Katrina, the roles and responsibilities of the HSOC were unclear. One of the primary roles performed by the HSOC is to maintain an accurate picture of events as an incident unfolds by gathering and integrating information from multiple sources, including the National Response Coordination Center (NRCC), the Coast Guard, and other DHS elements.[47] Specifically, the NRP has designated the HSOC as the national-level hub for information sharing management during domestic incidents. The HSOC provides primary situational awareness to the Secretary, the IIMG, and the White House.

Perhaps the single most important piece of information during Katrina was confirmation of the levee breaches in New Orleans. Beyond the importance of the information itself, the implications of the information determined whether or not Katrina would be just another bad storm in New Orleans or the nation's worst-case hurricane disaster. Because DHS failed to anticipate the likely consequences of the storm and procure the buses, boats, and aircraft that were ultimately necessary to evacuate the flooded city prior to Katrina's landfall, the next critical decision point of the federal response became

On Monday evening the HSOC failed to conclude levees breached in New Orleans despite a FEMA eyewitness report and the presence of numerous Coast Guard air assets over New Orleans, which had the ability to communicate to most anywhere in the country.

confirmation of the levee breaches. If the levees breached and flooded a large portion of the city, then the flooded city would have to be completely evacuated.[48] Any delay in confirming the breaches would result in a delay in the post-landfall evacuation of the city.

On Monday evening the HSOC failed to conclude that levees had breached in New Orleans despite a FEMA eyewitness report and the presence of numerous Coast Guard air assets over New Orleans, which had the ability to communicate to almost anywhere in the country. According to the commander of the Coast Guard's Air Station New Orleans, Captain Bruce Jones, there were nine Coast Guard helicopters, including the helicopter he piloted, operating over New Orleans by Monday evening, and Rear Admiral Duncan was flown over the city in a Coast Guard Falcon aircraft to assess the situation.[49]

In addition, a Coast Guard C-130 from Clearwater, Florida arrived over the city Monday evening after it heard the radio chatter from the rescue helicopter operations and diverted from its mission to reconnoiter the status of off shore oil rigs. The C-130 was able to communicate with all of the helicopters, and it could patch some communications through to the Coast Guard's division eight headquarters temporarily established in St. Louis. The division headquarters could then patch those communications through to a landline and reach almost any destination from there. The one important exception was calling into Baton Rouge, which was not possible.[50]

According to Marty Bahamonde, a FEMA External Affairs official, and the Coast Guard, he was flown over New Orleans early Monday evening for the specific purpose of providing situational awareness to Brown and DHS headquarters.[51] Captain Frank M. Paskewich said his unit took Bahamonde up in the helicopter because they were under the impression he had a direct line of communication into the White House. They thought Bahamonde could get the information regarding the status of the levees and flooding in the city to Washington faster than they could through the Coast Guard chain of command.[52] Bahamonde's observations were received in the HSOC a few hours after his over flight and became a Monday 10:30 p.m. HSOC spot report that was sent to the White House situation room shortly after midnight.[53] This spot report can be found in **Appendix 2**. However, it is not clear if the other Coast Guard observations, including Duncan's reconnaissance flight, reached the HSOC on Monday evening or at all.

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Because the HSOC failed to confirm the levee breaches on Monday, the first federal decision to procure buses was made by Deputy FCO Phil Parr, who was at the Superdome, on Tuesday when he saw the water reaching the Superdome and realized it would become an island and have to be evacuated. At that point he began to develop an evacuation plan and requested hundreds of buses.[54]

The HSOC's role is not only to provide situational awareness and policy advice to top officials within DHS, but also to provide situational information and address lower level coordination issues. Yet, interviews suggest that while information was flowing upwards to the HSOC and onto the Secretary, it was less clear what valuable information was flowing down to key officials on the ground during the disaster. Edward Buikema, FEMA's former Acting Director of Response, and Mike Lowder, Deputy Director of Response, both stated that while situational reports were continually flowing up the ladder from FEMA headquarters to the HSOC, no information was flowing back down from the HSOC to the NRCC.[55]

Finding: The White House failed to de-conflict varying damage assessments and discounted information that ultimately proved accurate

In response to document requests to White House Chief of Staff Andrew Card[56] and the Office of the Vice President,[57] the Select Committee received and reviewed 22,830 pages of Katrina-related documents.[58] Of this production, 16,482 pages were from staff of

the President's Homeland Security Council Prevention, Preparedness and Response (PPR) directorate, headed by Kirstjen Nielsen. The remaining 6,348 pages were produced by the Office of the Vice President.

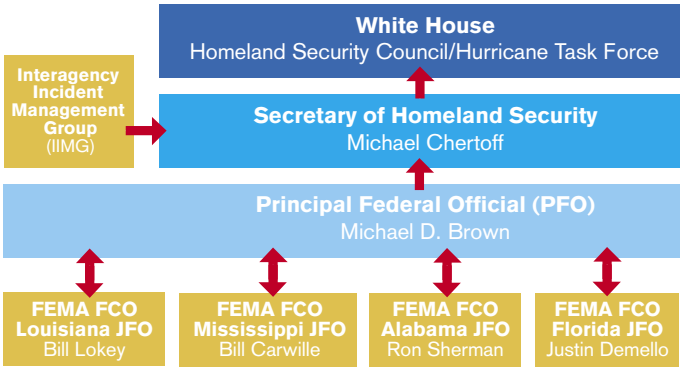
Homeland Security Council (HSC) staff received a continuous paper flow in the hours and days before Katrina made landfall and after. Of the 16,482 pages produced, almost all of the documents are repeated numerous times. The most commonly found documents include:

- HSOC Situation Reports
- HSOC Spot Reports
- Louisiana Office of Emergency Preparedness Situation Reports
- Mississippi Emergency Management Agency Situation Reports
- Alabama Emergency Management Agency Situation Reports
- E-mails from DHS Watch Officer to White House HSC Staff
- FEMA executive briefing slides
- FEMA Hurricane Liaison Team (HLT) Advisories
- FEMA National Situation Reports
- FEMA Regional Situation Reports
- DOE Energy Reports from Office of Electricity Delivery and Energy Reliability
- DOT Situation Reports
- Federal Highway Administration (FHWA) Status Reports
- Talking Points from both DHS and the White House
- National Disaster Medical System (NDMS) Reports
- Coast Guard briefing materials
- National Guard briefing materials
- Pipeline Situation Reports
- FAA Emergency Operations Division Reports
- HHS Operations Center Situation Reports
- HUD briefing materials
- White House Press Office materials, and
- Red Cross Disaster Operations Summary Reports

The HSC was situated at the apex of the policy coordination framework for responding to Hurricane Katrina.[59] A HSC chart has Chertoff, and the IIMG through the Secretary, seemingly reporting into the HSC. As the coordinator of policy, it would seem to follow that HSC was directly involved in the Katrina response:

Hurricane Katrina

Policy Coordination Framework for Response



WHITE HOUSE HOMELAND SECURITY COUNCIL

Not really, according to Deputy Homeland Security Advisor Ken Rapuano, who twice briefed Select Committee members and staff. "We don't do operations at the White House," Rapuano said on January 27. "We're a transit site for information. DHS is the operating agency for response, and we were working closely with them . . . . At the time we believed we were fully supporting the [federal, state, and local response] requirements. Now we know differently."[60]

As discussed previously in the Investigation Overview chapter, the Select Committee grew frustrated by the White House's slow response to requests for information and documents. On the one hand, it is true the Rapuano briefings the Select Committee ultimately received in lieu of more complete document production offered a wide array of acknowledged failures and lessons learned. On the other, the White House's decision to withhold documents and communications raising concerns about executive priviledge, leaves the Select Committee no choice but to find, based on the information we have received, that a *failure of initiative* plagued the White House as well.

Failure to resolve conflicts in information and the "fog of war," not a lack of information, caused confusion

The White House did not suffer from a lack of information. At 1:47 a.m. on August 29, before Katrina made landfall, DHS forwarded an infrastructure advisory to the White House Situation Room and HSC staff indicating the risks associated with a potential levee

breach.[61] The report advised a severe storm surge would likely lead to severe flooding, leaving New Orleans under water for weeks or months.[62] The report further estimated an economic impact of $7 to $10 billion.[63] Detailed diagrams of the New Orleans levee system arrived at the White House at 12:14 p.m. on Sunday, August 28.[64]

After Katrina made landfall and the levees failed, the White House continued to receive a substantial information flow. At 2:20 p.m. on August 29, a HSOC report stated some Louisiana parishes had eight to 10 feet of water and an unspecified number of Louisiana and Mississippi residents were stranded in flooded areas.[65] In a 6:00 p.m. HSOC report, the White House was advised extensive flooding in New Orleans could take months to reverse through the dewatering process.[66] At 12:02 a.m. on August 30, the White House received the Bahamonde spot report in which it was reported he observed a quarter-mile breach in the levee near the 17th Street Canal. Bahamonde also reported free-flowing water emptying into the city, Orleans Parish "under water," homes completely underwater, hundreds of people on roofs and balconies, and bodies floating in the flood waters.[67]

While Bahamonde's report was detailed in a 10:30 p.m. HSOC spot report, that report was not e-mailed to or received by the White House Situation Room until shortly after midnight on August 30.[68] Even then, according to Rapuano, White House officials did not believe they had confirmation of any levee breaches, since an earlier Army Corps of Engineers' report had not confirmed them and because "this was just Marty's observation, and it's difficult to distinguish between a [levee] overtopping and a breach."[69]

Bahamonde has testified, however, that he was certain the levee was breached.

> At approximately 11 a.m. [Monday, August 29], the worst possible news came into the EOC. I stood there and listened to the first report of the levee break at the 17th Street Canal. I do not know who made the report but they were very specific about the location of the break and the size. And then they added it was "very bad." I continued to provide regular updates to FEMA Headquarters throughout the day as the situation unfolded.
>
> At approximately 5 p.m., I rushed over to the Superdome because I had been notified that a Coast Guard helicopter was able to take me for a short flyover so that I could assess the situation in the city and plan for Under Secretary Brown's visit the next day. My initial flyover lasted about 10 minutes and even in that short time I was able to see that approximately 80 percent of the city was under water, and I confirmed the 17th Street Canal levee break. I was struck by how accurate the 11 a.m. call was about the levee.[70]

After his helicopter over flight at about 7:00 p.m., Bahamonde said he called Brown and explained what he saw.[71] "I picked up the phone and I called Under Secretary Brown directly and I began a 10-, 15-minute conversation that explained everything that I have already explained in my statement."[72] Brown listened to Bahamonde's report and did not ask any questions.[73] "All he said was, 'Thank you. I am now going to call the White House.'"[74]

White House officials did not consider the breaches confirmed until roughly 6:30 a.m. the next morning, upon receipt of an updated situation report from DHS, Rapuano said.[75] "Confirmation of a full breach would not have changed anything we would have done," Rapuano said. "We weren't going to repair the levees overnight, and search and rescue was already operating in full gear, regardless."[76]

Determining the status of the levees could have spurred earlier evacuation for that population, which might have been facilitated by White House involvement.

But confirmation of the breach of the levees could have had practical implications for White House involvement in the response. Flooding from breaches and flooding from overtopping have different consequences. Overtopping flooding will stop as the waters recede; flooding through a breach will continue, as it did, through the breach until the water in the city is at the same level as the water in the lake. The latter flooding could drive more of the population that stayed behind from their homes, necessitating greater needs for evacuating that

population. When President Bush was concerned that Governor Blanco had not ordered the evacuation of New Orleans, he called her on Sunday morning to urge such an evacuation.[77] Similarly White House involvement could have spurred earlier evacuation post-landfall for those trapped by the floods from the breached levees.

Further, White House officials clearly were able to identify and locate resources for the relief effort when they had sufficient information to know what was needed. Maggie Grant, Special Assistant to the President for Intergovernmental Affairs, played a key role in coordinating shelter for 15,000 in Arkansas with Arkansas Governor Mike Huckabee and in coordinating shelter for thousands of others in Georgia and Alabama.[78]

Regardless of what the White House did or did not, or could or could not, do with the information at its disposal, it appears clear officials charged with reviewing that information failed to de-conflict it. Among the primary tasks of the HSOC and HSC is to shuttle and synthesize information. Yet both appeared to discount information that ultimately proved accurate, and failed to provide decision-makers, up to and including the President, with timely information.

Brown testified that he spoke with White House officials as many as "thirty times."[79] He said he had no trouble getting through to senior decision makers: "I had no problem picking up the phone and getting hold of Chertoff or Andy Card or Joe Hagin, or the President; I don't have those problems." Brown told *The New York Times* he advised both Chertoff and a White House official, either Chief of Staff Andrew Card or Card's deputy, Joe Hagin, on Monday evening, August 29, "I am having a horrible time. I can't get a unified command established."[80] On Tuesday, August 30, he said he called to ask the White House to "take over" the Katrina response.[81] In his testimony, Brown said that this was offered to Blanco.

> One of the things that I was trying to do was to assist the Governor in any way that I could in the decision-making process, in trying to help her manage what was going on. And one of my suggestions was that, you know, that we could federalize this disaster and take over the National Guard and run the operation through that National Guard. And I — I do not know whether she considered it or not, but I know that she came back to me and rejected that.[82]

Rapuano acknowledged at both briefings that "the fog of war" affected both the quality and quantity of information that reached the White House.

Neither Rapuano nor anyone else at the White House would confirm these accounts. Rapuano would only say he "was not aware that Brown called the White House asking us to take over."[83]

Rapuano acknowledged at both briefings that "the fog of war" affected both the quality and quantity of information that reached the White House.[84] The Select Committee also believes, in the absence of any information to the contrary from the White House, that the President's Homeland Security team did not effectively substantiate, analyze, and act on the information at its disposal.

Listed in **Appendix 3** are examples of documents that flowed to the White House over the days right before and after Katrina made landfall, August 27 through September 3. The items logged do not reflect the entire information flow to the White House, or all documents provided to the Select Committee. Rather, they are meant to illustrate the type and range of information known to the White House suggesting Katrina and the subsequent flooding was not a standard emergency event. Yet the enormity of Katrina seemed not to have been fully understood by the White House until at least Tuesday, August 30.

Finding: Federal agencies, including DHS, had varying degrees of unfamiliarity with their roles and responsibilities under the NRP and National Incident Management System (NIMS)

It has become clear the response to Katrina was not unified and coordination among local, state, and federal authorities failed in several areas. The NRP and NIMS serve as a pre-established unified command structure for response to such a catastrophic incident. In order to seamlessly execute the NRP, each agency needs to develop effective operating procedures essential to satisfying that agency's roles and responsibilities under the NRP and NIMS.

Some agencies had well developed standard operating procedures while others had none at all. The U.S. Army Corps of Engineers and the Department of Transportation had previously developed significant operating procedures that covered agency responsibilities under the NRP.[85] Both agencies had used these operating procedures during training exercises to ensure an understanding of operating procedures prior to real time application.[86] These agencies executed their responsibilities under the NRP fairly well. Other agencies lack sufficient operating procedures for their responsibilities under the NRP. Many, when asked for operating procedures, referred to related sections of the NRP. Since the NRP is not an operational plan, this led to problems with execution of Emergency Support Function (ESF) responsibilities.[87]

While DOD, the Department of Health and Human Services (HHS), and the Coast Guard performed admirably in many respects, there were problems adequately coordinating their activities with other federal, state, and local agencies through the NRP structure.

AP PHOTO/ERIC GAY

For example, DOD by-passed the NRP mandated unified command, taking requests from the states directly, absent the necessary input and coordination by FEMA. This was apparent in the evacuation of the Superdome. Parr completed a plan to evacuate the Superdome Wednesday morning with the support of the Louisiana National Guard. Shortly before implementation of the plan, Parr was informed of the decision by General Honoré of Northern Command to proceed with a different evacuation plan. Unknown to Parr, Blanco had requested DOD's involvement in the evacuation the day before. The Governor's request was made outside the unified command and without the knowledge of FEMA officials, resulting in a duplication of efforts and a delay in the evacuation. Additionally, Parr stated that the actual evacuation under Honoré's plan resulted in an additional 24 hour delay to evacuees.[88]

In another case, HHS activated the National Disaster Medical System without prior notice or consultation with Alabama, thereby removing 200 beds from the inventory the state believed on hand, and to which state officials were still directing patients. Likewise, Coast Guard search and rescue operations were bringing survivors from Mississippi unannounced to already full hospitals until Alabama sent its own personnel forward to help triage cases and coordinate the direction of Coast Guard flights. This resulted in confusion over available hospital beds for victims through the Gulf coast and delay in the medical response.[89]

Additional failures to adhere to the NRP were apparent in the lack of communication between the NRCC and the HSOC, which disrupted the overall information flow and situational awareness.

Finding: Once activated, the Emergency Management Assistance Compact (EMAC) enabled an unprecedented level of mutual aid assistance to reach the disaster area in a timely and effective manner

EMAC provided invaluable interstate mutual aid in support of Hurricane Katrina by deploying more than 67,891 personnel (19,481 civilians and 48,477 National Guard) to Louisiana and Mississippi.[90] EMAC facilitated mutual assistance from 48 states, the District of Columbia, the Virgin Islands and Puerto Rico.

In support of Hurricane Katrina, more than 2,188 resource requests (missions) were filled.[91] Record numbers of National Guard troops, local responders, and health/medical personnel were deployed through the compact. EMAC also works in cooperation with the federal government by co-locating personnel, when requested, in the NRCC or Regional Response Coordination Center

Not only did senior DHS officials fail to acknowledge the scale of the impending disaster, they were ill prepared due to their lack of experience and knowledge of the required roles and responsibilities prescribed by the NRP.

(RRCC) in order to share information on EMAC activities in the affected states, monitor the availability of needed resources being offered by assisting states, and facilitate overall emergency response and recovery activities.

Through state statute, EMAC addresses the legal issues of liability, workers compensation, reimbursement, and professional licensure—prior to a disaster or emergency when resource needs and timing are critical.[92] State and territory members must pre-designate personnel with the authority to request and commit resources. Standard operating procedures exist for compact members and training and exercise of state personnel is required. While formalized protocols are in place, EMAC is designed to be adaptable and scaleable to meet the changing needs of each event.

Following each large scale activation of the compact, a review and evaluation of the response is conducted and standard operating procedures revised and updated to reflect lessons learned and best practices. For example, lessons learned from the 2004 Florida hurricanes led to an overhaul of some operational procedures related to mobilization and deployment of resources, an enhanced automation system to provide more accurate data and electronic tracking of resources, and a new standardized EMAC training curriculum and updated operations manual.[93] These enhancements were either in progress or completed prior to Hurricane Katrina.

In Mississippi, EMAC assistance was considered a success. The assistance in Mississippi included help from other states' security agencies (such as their state police) as well as various states' National Guards (troops and hard assets).[94] (See the MILITARY chapter for more detail.)

Louisiana state officials also viewed EMAC assistance as very successful. One state official said there were almost 900 EMAC agreements for assistance. Although the EMAC response from surrounding states varied, state officials applauded EMAC for successfully getting law enforcement manpower assistance. According to state police officers Ralph Mitchell and Joseph Booth, Arkansas, Tennessee, New Jersey, and California all sent law enforcement officers through EMAC.[95]

FEMA officials also noted the general success of EMAC. Because of the magnitude of the disaster, however, Louisiana was unable to handle all of the EMAC requests, requiring FEMA to become more involved in the process than normal. In particular, FCO Scott Wells noted some state offers of assistance through FEMA were rejected by Louisiana. He said these offers were rejected by SCO Smith because of concerns about the costs to the state.[96]

Finding: Earlier presidential involvement might have resulted in a more effective response

Similar to other large scale disasters, the catastrophic nature of Katrina required early presidential involvement to direct federal agencies in a massive coordinated response. In practice, it takes presidential action to quickly deploy the logistical capability of the military to meet the tremendous food, shelter, and medical needs of large affected populations. According to the Government Accountability Office's (GAO) review of hurricanes Hugo (1989, SC and NC), Andrew (1992, FL and LA), and Iniki (1992, HI):

> Often, when a catastrophic disaster leaves a gap between what volunteers can provide and the needs of disaster victims, DOD is the only organization capable of providing, transporting, and distributing sufficient quantities of the items needed to fill that gap. . . . While we clearly see a major role for DOD in providing mass care, we do not advocate turning over the entire disaster response, relief, and recovery operations to the military.[97]

Similar to other large scale disasters, the catastrophic nature of Katrina required early presidential involvement to direct federal agencies in a massive coordinated response.

Instead, the GAO recommended increased presidential involvement in the disaster and an improved process for FEMA to request DOD assistance as the solution for enabling DOD to provide relief during the critical first few days of a catastrophic disaster.[98] The Stafford Act authorizes the President, not the director of FEMA or the Homeland Security Secretary, to direct federal agencies to save lives and protect property and support state and local response efforts.[99] While the Stafford Act requires the President to delegate *the coordination* of response efforts to a federal coordinating officer (FCO), the law does not give the FCO *command* authority over other federal agencies. As a result, the FCO is not in a position to direct the operations of large departments such as DOD. Only the President appears able to promptly engage active duty military forces and achieve a unity of effort among all the federal agencies responding to a catastrophic disaster.

During Hurricane Katrina this problem was apparent in FEMA's and DHS' inability to promptly task major mission assignments to DOD. For example, FEMA did not approach DOD about taking over the logistics mission until Thursday, September 1, according to staff interviews with senior FEMA officials.[100] In response, Colonel Chavez with the Assistant Secretary for Homeland Defense Paul McHale instructed FEMA that the request had to go to Secretary of Defense Donald Rumsfeld.[101] Although details and planning still needed to take place, the Secretary of Defense supported approval of the request on Friday, and Principal Deputy Assistant Secretary of Defense Pete Verga approved execution orders on Saturday, September 3.[102] Out of this request, according to McHale, DOD found additional mission assignments that it could undertake and proposed them to FEMA. Seven other mission assignments were negotiated and approved over the next few days with senior DHS officials, including Deputy Secretary Michael Jackson and the Director of Operations Coordination Brigadier General Matthew Broderick (USMC-Ret).[103] But by the time all of these missions were assigned, it was one week since Katrina had made landfall.[104]

Conclusion

Hurricane Katrina exposed numerous deficiencies in the existing national framework for emergency management, including specific mistakes that delayed an appropriate federal response. Confusion accompanied the implementation of the NRP, resulting in key elements of the plan executed late, ineffectively, or not at all. Not only did senior DHS officials fail to acknowledge the scale of the impending disaster, they were ill prepared due to their lack of experience and knowledge of the required roles and responsibilities prescribed by the NRP. The Secretary of DHS failed to declare an INS, convene the IIMG, and properly designate the PFO in a timely manner. The White House failed to de-conflict varying damage assessments and discounted FEMA-supplied eyewitness information that ultimately proved accurate. Furthermore, the government was limited to a reactive response due to failure to activate the NRP-CIA. Despite failures of the system, portions of the national framework were successful, including EMAC, which proved invaluable in providing necessary levels of mutual aid assistance. ■

Although the Select Committee's access to White House documents, communications, and staff was not as comprehensive as we had hoped, the information we did receive suggests the President could have received better disaster advice and counsel.

[1] Homeland Security Act of 2002, Pub. L. No. 107-296, Title V, 116 Stat. 2135 (2002) [hereinafter Homeland Security Act].
[2] Dep't of Homeland Security, *National Response Plan,* (Dec. 2004) [hereinafter *NRP*].
[3] State of Louisiana, *Southeast Louisiana Hurricane Planning Project*, (Sept. 5, 2005) [hereinafter *Southeast LA Planning Project*].
[4] E-mail correspondence from Stephen York, Department of Homeland Security, to Andrew Akers, Homeland Security Operations Center (HSOC), Senior Watch Officer, et al. (Aug. 28, 2005) (11:59 AM) [hereinafter Aug. 28, 2005 York E-mail]; http://www.cnn.com/2006/POLITICS/01/24/katrina.levees.ap/ (last visited Jan. 28, 2006).
[5] *1993 GAO Report*.
[6] Homeland Security Act.
[7] *Hearing on Hurricane Katrina: The Role of the Department of Homeland Security Before Select Comm.*, 109th Cong. (Oct. 19, 2005) (written statement of Michael Chertoff, Secretary of Homeland Security) [hereinafter *Oct. 19, 2005 Select Comm. Hearing*].
[8] *See* E-mail correspondence from Kirstjen Nielson, White House Homeland Security Council, to Tom Ryder, Department of Energy (Aug. 29, 2005) (10:58 a.m.).
[9] E-mail correspondence from Michael Lowder, Deputy Director of Response, FEMA, to Patrick Rhode, FEMA, et al. (Aug. 28, 2005) (7:48 p.m.) [hereinafter Aug. 28, 2005 Lowder E-mail].
[10] *NRP* at 22.
[11] *Briefing for Select Comm. Staff by the White House in Washington, DC* (Dec. 13, 2005).
[12] Aug. 28, 2005 York E-mail; E-mail correspondence from Andrew Akers, DHS, to Paul Perkins, HSOC, et al. (Aug. 29, 2005) (1:47 p.m.) [hereinafter Aug. 29, 2005 Akers E-mail].
[13] Interview by Select Comm. Staff with Madhu Beriwal, Pres., Innovative Emergency Management in Washington, DC (Jan. 6, 2005).
[14] *Southeast LA Planning Project*.
[15] *NRP* at 22-23.
[16] *Id.* at 22.
[17] Aug. 28, 2005 Lowder E-mail.
[18] *Hearing on Hurricane Katrina: Perspectives of FEMA's Operations Professionals Before the Senate Comm. on Homeland Security and Governmental Affairs,*109th Cong. (Dec. 8, 2005) at 70-73 (testimony of Philip Parr, Deputy Federal Coordinating Officer, FEMA Joint Field Office, Austin, TX) [hereinafter *Dec. 8, 2005 Senate Comm. Hearing*].
[19] *Hearing on Hurricane Katrina: Preparedness and Response by the State of LA Before Select Comm.*, 109th Cong. (Dec. 14, 2005) at 18 (statement of Colonel Jeff Smith) [hereinafter *Dec. 14, 2005 Select Comm. Hearing*].
[20] *NRP* at 33.
[21] *See* E-mail correspondence from Ken Hill, Executive Secretary, DHS to Michael Jackson, Deputy Secretary, DHS, et al., (Aug. 30, 2005) (8:22 p.m.); E-mail correspondence from Michael Brown, Undersecretary for Emergency Preparedness and Response to Sharon Worthy, Special Assistant, DHS (Aug. 30, 2005) (11:00 p.m.).
[22] *NRP* at 34.
[23] *Jan. 6, 2006 Buikema Interview*.
[24] *Id*.
[25] Oct. 19, 2005 Select Comm. Hearing, (written statement of Michael Chertoff).
[26] *NRP* at 33.
[27] Stafford Act, §§ 5143, 5170(a)-(b), 5192.
[28] *NRP* at 33-34.
[29] *Jan. 6, 2006 Buikema Interview*.
[30] Interviews by Select Comm. Staff with New Orleans officials in New Orleans, LA (Nov. 3-10, 2005).
[31] *Id*.
[32] *NRP* at 342.
[33] *1993 GAO Report* at 3.
[34] *Id*.
[35] *Id*. at 7.
[36] *May 25, 1993 Senate Armed Forces Comm. Hearing* (Statement of J. Dexter Peach).
[37] Interview by Select Comm. Staff with Bill Lokey, Federal Contracting Officer for LA, FEMA , in Washington, DC (Jan. 23, 2006) [hereinafter *Jan. 23, 2006 Lokey Interview*].
[38] *NRP* at Catastrophic Incident Annex.
[39] *Id*. at CAT-4.
[40] *DHS HSOC Spot Report of Marty Bahamonte, Regional Director, External Affairs, Region One, FEMA (Aug. 29, 2005)* [hereinafter *Aug. 29, 2005 HSOC Spot Report*]; Interview by Select Comm. with Bruce Jones, Captain, Coast Guard New Orleans Air Commander in Washington, DC (Jan. 10, 2006).
[41] *Dec. 14, 2005 Select Comm. Hearing* at 18 (testimony of Colonel Jeff Smith).
[42] *1993 GAO Report* at 7.
[43] E-mail correspondence from William Carwile, DHS, to Craig Fugate, Director, Florida Division of Emergency Management (Aug. 30, 2005).
[44] *Id*.
[45] *Jan. 23, 2006 Lokey Interview*.
[46] Interviews by Select Comm. Staff with FEMA and Louisiana officials in New Orleans, LA (Nov. 3-10, 2005).
[47] *NRP*.
[48] *Southeast LA Planning Project*.
[49] *Briefing for Select Comm. Staff by U.S. Coast Guard in Washington, DC (Jan. 10, 2006)* [hereinafter *Jan. 10, 2006 Coast Guard Briefing*].

[50] *Id*.
[51] *Hearing on Hurricane Katrina in New Orleans: a Flooded City, a Chaotic Response Before the Senate Committee on Homeland Security and Governmental Affairs,* 109th Cong. (Oct. 20, 2005) at 9-13 (testimony of Marty Bahamonde, Regional Director, External Affairs, Region One, FEMA) [hereinafter *Oct. 20, 2005 Senate Comm. Hearing*]; *Jan. 10, 2006 Coast Guard Briefing*.
[52] *Jan. 10, 2006 Coast Guard Briefing*.
[53] E-mail correspondence from Michael Inzer, HSOC, to Bethany Nichols, et al. (Aug. 30, 2005) (12:02 PM) [hereinafter Aug. 30, 2005 Inzer E-mail]; *Aug. 29, 2005 HSOC Spot Report*.
[54] Interviews by Select Comm. Staff with FEMA and Louisiana officials in New Orleans, LA (Nov. 3-10, 2005); *Dec. 8, 2005 Senate Comm. Hearing* at 70-73 (testimony of Philip Parr).
[55] *Jan. 6, 2006 Buikema Interview.*
[56] Letters from Select Comm. to Andrew H. Card, Jr., White House Chief of Staff, Sept. 30, Oct. 13, and Dec. 1, 2005.
[57] Letters from Select Comm. to I. Lewis Libby, Jr., then Chief of Staff to the Vice President, Oct. 13, 2005, and to David S. Addington, Counsel to the Vice President, Oct. 4 and Dec. 7, 2005.
[58] The Executive Office of the President produced 16,482 pages of documents and the Office of the Vice President produced 6,348 pages of documents.
[59] *Hurricane Katrina – Policy Coordination Framework for Response*, Office of the Vice President document supplied to the Select Comm.
[60] Briefing for Select Comm. Staff by the White House in Washington, D.C. (Jan. 27, 2006) [hereinafter *Jan. 26, 2006 White House Briefing*].
[61] Aug. 28, 2005 York E-mail.
[62] Aug. 29, 2005 Akers E-mail; DHS National Infrastructure Simulation & Analysis Center, *Fast Analysis Report (Update to Reflect Category 5 Status) to DHS IP on Hurricane Katrina, Gulf Coast* (Aug. 28, 2005).
[63] *Id*. at 1.
[64] E-mail correspondence from Stephen York, DHS, to Andrew Akers, HSOC SWO, et al. (Aug. 28, 2005) (12:14 PM); Homeland Security Operations Center, *Diagrams of New Orleans Levee Systems and Scenarios.*
[65] E-mail correspondence from Insung Lee, HSOC, to Frank DiFalco, et al. (Aug. 29, 2005) (2:20 PM). HSOC report received at the White House Aug. 29, 2005 at 2:20 PM.
[66] E-mail correspondence from Tom Holz, to Bethany Nichols, et al. (Aug. 29, 2005 (6:13 PM); HSOC, *Hurricane Katrina SITREP #7*. HSOC report received at the White House, Aug. 29, 2005 at 6:13 PM.
[67] Aug. 30, 2005 Inzer E-mail; *Aug. 29, 2005 HSOC Spot Report.*
[68] *Id*.
[69] *Jan. 27, 2006 White House Briefing*.
[70] *Oct. 20, 2005 Senate Comm. Hearing* (testimony of Marty Bahamonte, Regional Director, External Affairs, Region One, FEMA).
[71] *Id*. at 27.
[72] *Id*.
[73] *Id* at 28.
[74] *Id*.
[75] *Jan. 27, 2006 White House Briefing.*
[76] *Id*.
[77] *Id*.
[78] Daily Video Teleconference amongst officials dated Sept. 2, 2005 [hereinafter Sept. 2, 2005 Daily Video Teleconference].
[79] *Hearing on Hurricane Katrina: The Role of the Federal Emergency Management Agency Before Select Comm.*, 109th Cong. (Sept. 27, 2005) at 213 (testimony of Michael Brown, then Director of FEMA) [hereinafter *Sept. 27, 2005 Select Comm. Hearing*].
[80] David D. Kirkpatrick and Scott Shane, "Ex-FEMA Chief Tells of Frustration and Chaos," *The New York Times*, Sept. 15, 2005, A1.
[81] *Id*.
[82] *Sept. 27, 2005 Select Comm. Hearing* at 104.
[83] Sept. 2, 2005 Daily Video Teleconference.
[84] *Jan. 26, 2006 White House Briefing.*
[85] U.S. Army Corps of Engineers, *ESF #3 Field Guide* (June 2001).
[86] Briefing for Select Comm. Staff by Department of Transportation in Washington, DC on Oct. 31, 2005; Interview by Select Comm. Staff with U.S. Army Corps of Engineers in Washington, DC on Oct. 28, 2005.
[87] *NRP* at 5.
[88] *Dec. 8, 2005 Senate Comm. Hearing* at 70-72 (testimony of Philip Parr).
[89] Interviews by Select Comm. Staff with Alabama Officials in Clanton and Montgomery, AL on October 11-12, 2005.
[90] Beverly Bell, NEMA, "EMAC Strides in 2005 Set a Precedent for Future," (Jan. 30, 2006) http;//www.mema.org/newsletterwork/temamain.html.
[91] Interviews by Select Comm. Staff with Louisiana Officials in New Orleans, LA (Nov. 3-10, 2005).
[92] *See* Emacweb.org.
[93] Interviews by Select Comm. Staff with Louisiana Officials in New Orleans, LA (Nov. 3-10, 2005).
[94] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Mississippi Before Select Comm.*, 109th Cong. (Dec.7, 2005) at 2 (statement of Haley Barbour, Governor, State of Mississippi).
[95] Interviews by Select Comm. Staff with FEMA Officials in New Orleans, LA (Nov. 3-10, 2005).
[96] *Id*.
[97] *Hearing on Disaster Management: Recent Disasters Demonstrate the Need to Improve the Nation's Response Strategy Before the Subcomm. On Nuclear Deterrence, Arms Control and Defense Intelligence of the Senate Comm. on Armed Forces*, 103rd Cong. (May 25, 1993) at 11-12 (statement of J. Dexter Peach, Assistant Comptroller General) [hereinafter *May 25, 1993 Senate Armed Forces Comm. Hearing*].

[98] U.S. Gov't Accountability Off., Pub. No. GAO/RCED-93-186, *Disaster Management: Improving the Nation's Response to Catastrophic Disasters*, 2 (Jul. 1993) [hereinafter *1993 GAO Report*].

[99] Robert T. Stafford Disaster Relief and Emergency Assistance Act, 42 U.S.C. §§ 5170(a)-(b), 5192 (2005) [hereinafter Stafford Act].

[100] *See* Interview by Select Comm. Staff with Edward Buikema, former Acting Director of Response, FEMA [hereinafter Jan. 6, 2006 Buikema Interview], in Washington, DC (Jan. 6, 2006).

[101] E-mail correspondence from Col. Richard Chavez, Senior Military Advisor for Civil Support, to Thomas Kuster, CIV, OSD-Policy (Sept. 2, 2005) (9:38 AM).

[102] DOD and FEMA, *MOD 8 to EXORD for DOD Support to FEMA for Hurricane Katrina*, on file with the Select Comm., No. MMTF 00028-05.

[103] Correspondence from Paul McHale, Assistant Secretary of Defense for Homeland Defense, to Chairman Davis (Jan. 25, 2006).

[104] *Jan. 6, 2006 Buikema Interview.*

FEMA

"FEMA pushed forward with everything it had in order to help the states respond after landfall …Every single team, every single program of FEMA, was pushed to its limit to respond to Hurricane Katrina."

Michael D. Brown
Former FEMA Director, Select Committee Hearing,
September 27, 2005

DHS and the states were not prepared for this catastrophic event

Summary

It is clear the federal government in general and the Department of Homeland Security (DHS) in particular were not prepared to respond to the catastrophic effects of Hurricane Katrina. There is also evidence, however, that in some respects, FEMA's response was greater than it has ever been, suggesting the truly catastrophic nature of Hurricane Katrina overwhelmed a federal response capability that under less catastrophic circumstances would have succeeded.

Nevertheless, DHS' actual and perceived weaknesses in response to Katrina revived discussion of the value of incorporation of FEMA into DHS. Many experts and Members of Congress debated the policy and operational ramifications of bringing FEMA into DHS during consideration of the Homeland Security Act of 2002 (HSA).

The HSA transferred FEMA functions, personnel, resources, and authorities to the DHS Emergency Preparedness and Response (EP&R) Directorate. The emergency management community has complained since 2003 that FEMA was being systematically dismantled, stripped of authority and resources, and suffering from low morale, in part because of the Department's focus on terrorism. Others have said that FEMA's placement in DHS enabled the Secretary of Homeland Security to augment FEMA's resources with other DHS personnel and assets, all within an integrated command structure.

The cycle of emergency management begins with preparedness and mitigation, flows into response, and ends with recovery. The four cornerstones to comprehensive emergency management — preparedness, response, recovery, and mitigation — are interdependent and all vital to successful emergency management.

Preparedness encompasses those pre-disaster activities that develop and maintain an ability to respond rapidly and effectively to emergencies and disasters. All levels of government need to be prepared to respond to disasters. International Association of Emergency Managers President Dewayne West described preparedness as "what emergency managers do every day in order to be able to respond."[1] Emergency management officials at different levels of the government expressed concerns that distancing preparedness efforts from response, recovery, and mitigation operations could result in an ineffective and uncoordinated response.[2]

Following Hurricane Katrina, emergency management professionals in the Gulf coast region have questioned whether DHS and state preparedness for catastrophic events has declined over the past years due to organizational changes within DHS and a shift in programmatic priorities. In particular, the decline in preparedness has been seen as a result of the separation of the preparedness function from FEMA, the drain of long-term professional staff along with their institutional knowledge and expertise, and the diminished readiness of FEMA's national emergency response teams.

In the Gulf coast region, emergency managers expressed the view that FEMA's disaster response capabilities had declined since its inclusion in DHS, in part due to subsequent organizational changes within DHS and FEMA. The emergency management community has suggested that FEMA's readiness for a large disaster has declined despite extensive preparedness initiatives within the federal government, pointing to the separation of preparedness functions from response, recovery, and mitigation.

FEMA

Additionally, the tremendous damage and scale of Hurricane Katrina placed extraordinary demands on the federal response system and exceeded the capabilities and readiness of DHS and FEMA in a number of important areas, particularly in the area of staffing. The response to Hurricane Katrina required large numbers of qualified personnel at a time when FEMA's professional ranks had declined. FEMA response officials in both Mississippi and Louisiana testified that the department's inability to field sufficient numbers of qualified personnel had a major impact on federal response operations. In addition, FEMA had lost, since 2002, a number of its top disaster specialists, senior leaders, and experienced personnel, described as "FEMA brain drain." Many emergency management professionals had predicted this 'drain' would have a negative impact on the federal government's ability to manage disasters of all types.

In addition, emergency management professionals said the degraded readiness of FEMA's national emergency response teams reduced the effectiveness of the federal response to Hurricane Katrina. The diminished readiness of the national emergency response teams has been attributed to a lack of funding for training exercises and equipment. Emergency management professionals note the need for trained people, who have experience working together with their federal colleagues and state counterparts prior to a disaster, as a part of national emergency response teams. Emergency responders should not meet each other for the first time right before or after a major catastrophe. A decline in the readiness of these teams along with appropriate staffing added to an ineffective response.

Finding: While a majority of state and local preparedness grants are required to have a terrorism purpose, this does not preclude a dual use application

The "all hazard" versus "just terrorism" debate plays out in the interpretation of permissible uses for homeland security grant funding and efforts to make equipment purchases and exercise scenarios fit terrorism-related criteria while still being of some general use in day-to-day emergency response. For example, funding to exercise response capabilities for WMD-related scenarios might be used to test evacuation planning and other "all hazard" response functions, with the WMD element little more than pretext.

This concern is evident at the local level. Alabama conducts or participates in approximately 50 training exercises each year ranging from "table top," classroom-like discussions to full scale exercises involving all members of the emergency management community, including federal, state, and local officials. According to Alabama officials, federal DHS funding restrictions dictate that almost all of these exercises involve a terrorism-based threat or scenario, despite the fact that all emergencies largely involve the same set of procedures — evacuations, loss of power, communications difficulties, need for shelter, food, and water, and inter-governmental coordination.[3]

FEMA

State officials also voiced a concern that in the post-9/11 environment undue emphasis is placed on terrorism-based hazards.[4] Alabama's hazard risk profile includes terrorism, but state emergency management officials believe natural disasters pose a much more likely, perhaps inevitable, risk.[5] Although lately, hurricanes have hit the state with some regularity, Alabama is susceptible to a wide variety of other natural disasters, including earthquakes, tornadoes, floods, and droughts. With nuclear facilities located within the state, Alabama Emergency Management Agency (AEMA) officials are also on alert for nuclear-related emergencies. Special plans and precautions have also been funded to prepare for risks posed by an Army chemical weapons storage and incineration facility.[6]

According to Colonel Terry Ebbert, the Director of Homeland Security & Public Safety for the City of New Orleans, DHS' all hazards focus is unsubstantiated.

> [T]he Office of Domestic Preparedness restricted any use of grant funding for preparing, equipping, training, and exercising to enhance the preparedness of first responders operating in

> a potential WMD environment. Most allowable expenditures under the UASI program remain closely linked to the WMD threat to the exclusion of many other forms of enhanced readiness.[7]

When Ebbert submitted a request to purchase a number of inexpensive, flat-bottomed, aluminum boats to equip his fire and police departments, with the intent of having them available to rescue people trapped by flooding, the request was denied. Ebbert concluded that the rules on what is permitted and reimbursable are unaltered while the newly stated focus on an "all hazards" approach to preparedness remains "elusive."[8] Ebbert recommended that "existing limitations imposed on the availability of Federal preparedness funding should be broadened."[9]

DHS officials are particularly sensitive to the charge that the agency has stopped state and local governments from purchasing equipment not exclusively suited to terrorism preparedness. Former Office of Domestic Preparedness (ODP) Director Suzanne Mencer stressed the dual use capability of many grants: "The grants don't prohibit a city from buying equipment for use in a natural disaster if it can also be used in a terrorist attack."[10] Mencer said some locals see the WMD wording and think it prohibits items, such as radios, that could also be used in a natural disaster: "They can still meet their needs in almost all instances if they look at the broader picture and not [just] the wording in the grant."[11] When asked about state and local complaints in Alabama and elsewhere, former director of ODP's Preparedness Programs Division, Tim Beres, noted that in fiscal 2004, grants paid for more than $1 billion worth of dual-use equipment, including $925 million for interoperable communications equipment and $140 million in chemical protection suits.[12]

DHS continues to develop and refine its guidelines to states and localities, in accordance with Presidential Directives, which require grants to be used in support of catastrophic events regardless of their cause.[13] Although a July 2005 Government Accountability Office (GAO) report found many state preparedness officials and local first responders believed DHS planners focused excessively on anti-terrorism criteria in their grant, training, and exercise programs, the auditors concluded that 30 of the 36 essential capabilities first responders need to fulfill the critical tasks generated by the department's 15 catastrophic emergency planning scenarios would apply to both terrorist and non-terrorist incidents.[14] The GAO auditors concluded that DHS planning supported an all hazards approach.[15] Indeed, according to GAO auditors, in response to state and local complaints that DHS required too much emphasis on terrorism-related activities, DHS increasingly promoted flexibility to allow greater dual usage within the grant program requirements for fiscal year 2005.

DHS' growing dual use flexibility is reflected in its most recent grant guidelines. Specifically, the FY2006 guidance points out the numerous dual-use target capabilities (identified in the National Preparedness Goal) to be attained through DHS grant funding.[16] The guidance further states:

> [f]unding remains primarily focused on enhancing capabilities to prevent, protect against, respond to, or recover from CBRNE [Chemical, Biological, Radiological, Nuclear and Conventional Explosives], agriculture, and cyber terrorism incidents. However, in light of several major new national planning priorities, which address such issues as pandemic influenza and the aftermath of Hurricane Katrina, the allowable scope of SHSP [State Homeland Security Program] activities include catastrophic events, provided that these activities also build capabilities that relate to terrorism.[17]

Finding: Despite extensive preparedness initiatives, DHS was not prepared to respond to the catastrophic effects of Hurricane Katrina

As a result of various changes within DHS and FEMA, the emergency management community suggested FEMA's preparedness and readiness for a large disaster would decline despite extensive preparedness initiatives within the federal government. For example, during an April 2005 House Subcommittee hearing on DHS preparedness efforts, Dave Liebersbach, then President of the National Emergency Management Association (NEMA), expressed

his fear that DHS' de-emphasis of hazards other than terrorism would result in FEMA's inability to respond to a major disaster:[18]

> My concern is we are not going to be able to maintain [capabilities]. I honestly believe . . . that if the hurricane scenario of September 2004 that occurred in the Southeastern U.S., [happens] five years from now, we will fail the way we are going, because the success of that response, of that hurricane season, was based on the programs that had come before . . . . As we are moving forward, that legacy is going to drop if we don't pay attention to dealing with that.[19]

Similar issues were raised during the establishment of the department by various first responder professional associations and think tanks, Members of Congress from both political parties, the Government Accountability Office, and the Congressional Research Service.[20]

WHITE HOUSE

One of the primary reasons for creating FEMA in 1979 was to closely link preparedness, response, and mitigation within one organization.[21] During consideration of the Homeland Security Act in 2002, the President proposed that all terrorism preparedness functions be consolidated into FEMA's Office of National Preparedness and be managed within the Emergency Preparedness and Response Directorate (EP&R) of the proposed department.

The intention was to provide a one-stop shop for state and local governments and achieve a unified approach to disaster response. Instead Congress opted to split preparedness functions between the Office of Domestic Preparedness (ODP), which was to be transferred to DHS from the Justice Department, and EP&R (or FEMA).[22] The goal was to place terrorism preparedness in an organization, ODP, with a strong law enforcement background and relationship with that community.

In late 2003, the debate over the need for a one-stop shop for first responder grants and to unite preparedness with the other functions of comprehensive emergency management continued. When DHS Secretary Tom Ridge proposed to transfer most state and local grant programs to ODP, the emergency management community again cautioned the capabilities of state and local governments and FEMA to respond to all disasters would suffer.[23] Ridge and his aides "believed FEMA should be a response and recovery agency, not a preparedness agency. In an age of terrorism, they argued, preparedness needed a law enforcement component, to prevent and protect as well as get ready to respond."[24]

The proposal prompted then FEMA Director Michael Brown to urge Ridge not to further distance preparedness from response as it "can result in an ineffective and uncoordinated response . . . [would] shatter agency morale and would completely disconnect the Department's response functions from the responders and governments they are supposed to support."[25] Brown was overruled and the programs were transferred to ODP, which was then incorporated into the newly created Office of State and Local Government Coordination and Preparedness (SLGCP).

The controversy over how to manage disaster preparedness increased with incoming Secretary Michael Chertoff's Second Stage Review. Chertoff argued the federal government's preparedness efforts needed to be enhanced, particularly for catastrophic disasters, and that could be best achieved by consolidating the department's preparedness functions into a new Preparedness Directorate. In a letter opposing the move, NEMA criticized the department's "total lack of focus on natural-hazards preparedness" and argued that separating preparedness from response and recovery would break emergency management's cycle of continuous improvement and result in disjointed and ineffective response operations.[26]

While Brown agreed with the need to increase catastrophic planning (FEMA had originally proposed the catastrophic preparedness program that funded the Hurricane Pam process), he strongly disagreed with Chertoff's recommended solution of removing FEMA's remaining preparedness functions and transferring them to ODP, which would then be elevated to a Preparedness Directorate. Instead, Brown drafted a 13-page memo to Chertoff urging the consolidation of all preparedness functions into the Emergency Preparedness & Response Directorate, as originally proposed by President Bush, in order to "ensure that capabilities and procedures trained will be identical to the capabilities and procedures

FEMA

"These recent organizational changes have divided what was intended to be one, all-hazards preparedness mission into two artificially separate preparedness categories of terrorism and natural disasters."

actually applied during a real event."[27] As Brown described it, "These recent organizational changes [the transfer of several FEMA preparedness programs to ODP in Secretary Tom Ridge's reorganization plan of September 2003] have divided what was intended to be one, all-hazards preparedness mission into two artificially separate preparedness categories of terrorism and natural disasters."[28]

Some experts do, however, endorse the consolidation of preparedness efforts. Last December, the Center for Strategic and International Studies and the Heritage Foundation released a joint study called "DHS 2.0," in which the authors suggested adding a new undersecretary for preparedness with direct access to the secretary.[29] Such a move, they said, would speed preparedness decisions past layers of bureaucracy. And in a September 1, 2005 *Washington Post* article, at the height of the Katrina response effort, Paul C. Light, an authority on government operations at New York University, also endorsed Chertoff's proposed reforms.[30]

In a December 7, 2005 report entitled "The Truth About FEMA: Analysis and Proposals," Heritage Foundation homeland security expert James Carafano and the Hudson Institute's Richard Weitz argued that Chertoff's proposed reorganization would address many of the shortfalls created by placing FEMA within DHS.[31] At the same time, they said it would preserve the advantages of having most major federal disaster-related preparedness and response activities, for both man-made and natural disasters, concentrated in one department.[32] The authors pointed out that in the event of large-scale disasters, FEMA could be reinforced by other assets from within DHS."[33]

In testimony before the Select Committee, Chertoff explained his rationale for integrating the Department's existing preparedness efforts in to a single directorate for Preparedness:

> Preparedness is not just about response and recovery — rather, it must draw on the full spectrum — from prevention through protection to response. Our preparedness directorate will rely on the expertise of FEMA, but it will also integrate the experience of the Coast Guard, our Infrastructure Protection division, our intelligence units, and our other operational assets . . . FEMA will become a direct report to the Secretary, allowing it to focus on response and recovery while partnering with the new preparedness directorate to increase our overall capabilities . . . FEMA must also continue to function as an all-hazards agency, leveraging entities within the preparedness directorate, including Infrastructure Protection, the Office of Domestic Preparedness, and State and Local Government Coordination.[34]

Although many in the emergency management community opposed Chertoff's preparedness consolidation, many first responder groups support it. For example, in a press release issued immediately following the release of Chertoff's Second Stage Review, the International Association of Fire Chiefs applauded the proposal, particularly the creation of a Preparedness Directorate.[35]

Finding: DHS and FEMA lacked adequate trained and experienced staff for the Katrina response

Brown's memorandum also identified budget cuts and organizational changes he believed were harming FEMA's ability to perform its statutory responsibility of leading the federal government's response to all disasters, including terrorist attacks. For example, Brown claimed

FEMA's operational budget baseline (for non-Stafford Act disaster funding) had been permanently reduced by 14.8 percent since joining DHS in 2003. In addition to the permanent baseline reduction, he claimed FEMA lost $80 million and $90 million in fiscal years 2003 and 2004 respectively from its operating budget.[36] Brown argued these budget reductions were preventing FEMA officials from maintaining adequate levels of trained and ready staff.

Brown also said FEMA no longer managed numerous functions that were essential to meeting its statutory responsibilities, and therefore did not have the tools to successfully accomplish its mission. For example, the National Response Plan is a fundamental element of coordinating the federal government's response to disasters. Given FEMA's response mission, the Homeland Security Act of 2002 specifically assigned FEMA responsibility for "consolidating existing Federal Government emergency response plans into a single, coordinated national response plan."[37] However, instead of assigning this function to the organization responsible for executing the plan during a disaster (i.e. FEMA), the department initially assigned it to the Transportation Security Administration, which then relied on an outside contractor.

When some in the first responder community reacted negatively to the contractor's draft plan, the department transferred the NRP's development to another area of the department, the Integration Staff within the Secretary's office. The resulting plan made a number of departures from the existing Federal Response Plan, including the introduction of the Incident of National Significance (INS), the Principal Federal Official (PFO), the Interagency Incident Management Group (IIMG), the Homeland Security Operations Center (HSOC), and the Catastrophic Incident Annex (NRP-CIA).[38] The emergency management community expressed concerns about each of these newly created structures, which ultimately proved problematic or experienced difficulties achieving their intended purposes during the response to Hurricane Katrina.

Brown also identified what he believed were the most important goals for achieving FEMA's mission of leading the federal government's response to disasters. Several of the issues he identified for improvement proved to be critical problem areas in the Katrina response. The requirements he identified in March 2005 included the following:[39]

1. Improve logistics capability and asset visibility.
2. Implement a comprehensive and integrated multi-year catastrophic planning strategy.[40]
3. Establish a National Incident Management System Integration Center to improve command and control capabilities at the federal, state, and local levels.
4. Recruit, train, credential, deploy and retain a disaster workforce with the appropriate skill mix and management structure to support the operational requirements of all disaster related functions.
5. Ensure appropriate numbers, skills, and grades of employees to support current and long-term mission needs.

Senior DHS and Office of Management and Budget officials vigorously dispute the claim that FEMA's budget has been cut at all. They argue that any transfers from the FEMA budget reflect the transfer of functions carried out by DHS for FEMA, start up costs of the Department, and the use of unobligated funds. According to Andrew Maner, Chief Financial Officer for DHS, the core of the budget adjustments cannot be classified as permanent reductions to FEMA's base budget, as Brown claims.[41] For example, Maner said the transfer of $30.6 million was a transfer of unobligated balances from the 2002 Olympic Games to help fund the start-up of the new Department. The transfer of such unobligated balances was authorized by Congress in H.J. Res. 124, which became law on November 23, 2002 (P.L. 107-294), to pay for "the salaries and expenses associated with the initiation of the Department."[42] Also, Maner noted the $28 million transfer to ODP reflects efforts to complete the transfer of funds accompanying former FEMA functions that have been assumed by other DHS entities.[43]

Regardless of the impact, if any, of these budget adjustments on FEMA capabilities, the tremendous damage and scale of Hurricane Katrina placed extraordinary demands on the federal response system and exceeded the capabilities and readiness of DHS and FEMA in a number of important areas, including staffing. Hurricane Katrina consisted of three separate major disaster declarations, three separate statewide field operations, two directly-affected FEMA regional operations, and the full activation of national level resources such as the National Response Coordination Center (NRCC), the HSOC, and the IIMG. In addition, most FEMA regional offices were actively supporting

Katrina operations or assisting their regions receive Gulf Coast evacuees. These operations required large numbers of qualified personnel from what had become a relatively small agency of approximately 2,500 positions.

AP PHOTO/JOHN BAZEMORE

Ultimately, FEMA officials turned to federal agencies like the U.S. Forest Service and city firefighters from across the country to staff FEMA positions in the state.

FEMA response officials in both Mississippi and Louisiana testified that the department's inability to field sufficient numbers of qualified personnel had a major impact on federal response operations.[44] The Federal Coordinating Officer (FCO) in Mississippi, Bill Carwile, described how managing the personnel shortfall was perhaps his most difficult challenge. While he was able to deploy division supervisors to the coastal counties, he needed similar qualified employees for the devastated cities of Gulfport, Biloxi, and Pascagoula. Ultimately, FEMA officials turned to federal agencies like the U.S. Forest Service and city firefighters from across the country to staff FEMA positions in the state.

Despite those measures, Carwile stated, "We never had sufficient personnel to meet requirements."[45] According to Scott Wells, Deputy FCO for Louisiana, a 90-person FEMA regional office "is woefully inadequate" to perform its two primary disaster functions, operating a regional response coordination center and deploying people to staff emergency response teams in the field.[46] "You cannot do both. Pick one," he said.[47] Wells added, "We had enough staff for our advance team to do maybe half of what we needed to do for a day shift….We did not have the people. We did not have the expertise. We did not have the operational training folks that we needed to do our mission."[48]

In addition to having an inadequate number of qualified personnel, FEMA had lost a number of its top disaster specialists, senior leaders, and most experienced personnel. Both critics and supporters of FEMA's merger with DHS have acknowledged "FEMA brain drain" in recent years and its negative impact on the federal government's ability to manage disasters of all types.[49] Since 2003, for example, the three directors of FEMA's preparedness, response, and recovery divisions had left the agency, and departures and retirements thinned FEMA's ranks of experienced professionals. At the time Hurricane Katrina struck, FEMA had about 500 vacancies and eight out of its ten regional directors were working in an acting capacity.[50]

At least two factors account for FEMA's loss of seasoned veterans. First, like other government agencies, many of FEMA's long-term professionals are reaching retirement age.[51] And second, job satisfaction was second to last in 2005, according to the Partnership for Public Service, a nonprofit group that promotes careers in federal government.[52] Regardless of the reasons for the exodus, Brown and senior DHS officials were unable to maintain their ranks of disaster professionals, through employee retention, development, or recruitment, and this failure hindered the response to Hurricane Katrina.[53]

The disastrous effect of this manpower shortage was compounded in Hurricane Katrina by the difficulty of getting federal workers where they needed to be because of security concerns. In Louisiana, media reports and rumors of violence and general lawlessness delayed the deployment and placement of federal response workers. The Governor's Chief of Staff Andy Kopplin said there were approximately 1,000 FEMA employees deployed and on their way to New Orleans Wednesday, August 31, 2005, many of whom turned back due to security concerns.[54]

Finding: The readiness of FEMA's National Emergency response teams was inadequate and reduced the effectiveness of the federal response

One of the most critical links in the federal response system is the team of FEMA personnel that deploys to a disaster site to establish a unified command with state officials and directs federal operations. These national emergency response teams are the conduits through which federal disaster assistance is requested by and delivered to a state. They are intended to be on call and deploy at a moment's notice, since many disasters provide no advance warning. In prior years, according to Carwile, "We were then able to build a team to about 125 individuals, hand picked, from around the country, and we were able to routinely exercise that team because we had the funding in place to do so on the plan, against several scenarios."[55] The team had a robust operational plan, was sent to the Winter Olympics in Salt Lake City, and received dedicated satellite communications equipment. It appeared to be a well-equipped, well-trained team at a high state of readiness.[56]

Carwile testified that by 2004, the readiness of FEMA's emergency response teams had plummeted dramatically.[57] Funding for the teams dried up after 2002. They lost their dedicated communications equipment. Teams were split up into ever smaller units. Team training and exercises ceased.

In a June 30, 2004 memorandum, FEMA's top disaster response operators, the cadre of Federal Coordinating Officers, warned then FEMA Director Brown that the national emergency response teams were unprepared because no funding was available for training exercises or equipment.[58] In a few short years, FEMA's emergency response teams had been reduced to names on a roster. It appears no actions were taken to address the problems identified in the memorandum.

Asked whether or not implementing the recommendations would have made a difference in Katrina, Carwile responded, "I felt very fortunate because many of my colleagues with me in Mississippi had been with me on a national team in years past. It was kind of coincidental . . . but I can't help but believe that trained and ready teams, people who have worked together, would not have made some difference in a positive way."[59] Wells described the situation in Louisiana in this way: "We need to really train together as a team. We need to work as a team. What you have with this National Response Plan in the field is we have no unity of command."[60]

The requirement for trained people, who have experience working together with their federal colleagues and their state counterparts, is a constant theme of federal, state, and local emergency professionals. Numerous officials and operators, from state and FEMA directors to local emergency managers told the same story: if members of the state and federal emergency response teams are meeting one another for the first time at the operations center, then you should not expect a well-coordinated response.[61]

Conclusion

For years emergency management professionals have been warning that FEMA's preparedness has eroded. Many believe this erosion is a result of the separation of the preparedness function from FEMA, the drain of long-term professional staff along with their institutional knowledge and expertise, and the inadequate readiness of FEMA's national emergency response teams. The combination of these staffing, training, and organizational structures made FEMA's inadequate performance in the face of a disaster the size of Katrina all but inevitable. ■

[1] International Ass'n of Emergency Managers, *Press Release: IAEM Announces Recommendations for Improved Emergency Response,* (Oct. 25, 2005) (on file with Select Comm.).

[2] *Hearing on The National Preparedness System: What are we preparing for? Before the House Comm. on Transportation and Infrastructure, Subcommittee on Economic Development, Public Buildings, and Emergency Management*, 109th Cong. (Apr. 14, 2005) at 61-62 (statement of Dave Liebersbach, Pres., Nat'l Emergency Mgmt. Assoc.) [hereinafter *Apr. 14 Preparing Hearing*]; Memorandum from Michael Brown, Dir., FEMA to Michael Chertoff, Sec'y, Dept. of Homeland Sec. (March 2005) [hereinafter March 2005 Brown Memo]; Interview by Select Comm. Staff with Ed Buikema, Dir., Response Div., FEMA, in Wash., D.C. (Jan. 6, 2006).

[3] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Alabama Before Select Comm.*, 109th Cong. (Nov. 9, 2005) at 75 (statement of Bruce Baughman, Dir., Ala. State Emergency Mgmt. Agency) [hereinafter *Nov. 9, 2005, Select Comm. Hearing*].

[4] Interview by Select Comm. Staff with senior AL emergency management officials, in Clanton, AL (Oct. 11, 2005).

[5] *Id.*

[6] *Nov. 9, 2005 Select Comm. Hearing* at 75 (statement of Bruce Baughman, Dir., Ala. State Emergency Mgmt. Agency).

[7] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Louisiana Before Select Comm.*, 109th Cong. (Dec. 14, 2005) at 174 (written statement of Col. (Ret.) Terry Ebbert, Dir., Homeland Sec. for New Orleans) [hereinafter statement of Terry Ebbert] [hereinafter *Dec. 14, 2005 Select Comm. Hearing*].

[8] *Dec. 14, 2005 Select Comm. Hearing* at 174 (statement of Terry Ebbert).

[9] *Id.* at 174-75 (statement of Terry Ebbert).

[10] Shane Harris, *Federal Emphasis on Terrorist Threat Frustrates Local Disaster Response Officials,* NAT'L JOURNAL, Oct. 20, 2005, at 4, *available at* http://www.govexec.com/dailyfed/1005/102005nj1.htm (last visited Jan. 26, 2006).

[11] *Id.*

[12] *Id.*

[13] Directive on Management of Domestic Incidents, 39 WEEKLY COMP. PRES. DOC. 10 280 (Feb. 28, 2003) (Known as Homeland Security Presidential Directive/HSPD-5); Directive on Management of National Preparedness, 39 WEEKLY COMP. PRES. DOC. 1822 (Dec. 17, 2003) (Known as Homeland Security Presidential Directive/HSPD-8).

[14] Government Accountabillity Office [hereinafter GAO], Pub. No. GAO-05-652, *Homeland Security: DHS' Efforts to Enhance First Responders' All Hazards Capabilities Continue to Evolve* (July 2005) 26-30.

[15] *Id.* at 39-41.

[16] Dep't of Homeland Sec., *FY 2006 Homeland Security Grant Program: Program Guidance and Application Kit,* (Dec. 2005). Those capabilities include planning, community preparedness and participation, communications, critical infrastructure protection, on-site incident management, citizen protection: evacuation and in-place protection, emergency operations center management, critical resource logistics and distribution, urban search and rescue, volunteer management, emergency public information and warning, responder safety and health, triage and pre-hospital treatment, public safety and security response, medical surge; medical supplies management and distribution, environmental health, mass prophylaxis, mass care, firefighting operations and support, hazardous material response, structural damage assessment and mitigation, economic and community recovery, restoration of lifelines. *Id.*

[17] *Id.*

[18] *Apr. 14 Preparing Hearing* at 90 (statement of Dave Liebersbach, Pres., Nat'l Emergency Mgmt. Ass'n).

[19] *Id.*

[20] GAO, GAO-03-119, *High-Risk Series: An Update* (Jan. 2003); Congressional Research Service [hereinafter CRS], Rep. No. 31670, *Transfer of FEMA to the Department of Homeland Security: Issues for Congressional Oversight* [hereinafter CRS Rep. No. 31670] at 5 (Dec. 17, 2002).

[21] Exec. Order No. 12,127, 3 C.F.R. 1979 (1979); Exec. Order No 12,148, 44 Fed. Reg. 43239 (1979).

[22] CRS Rep. No. 31670 at 5 (2002).

[23] March 2005 Brown Memo; Letter from Michael Brown, Dir., FEMA to Tom Ridge, Sec'y, Dep't of Homeland Sec. (Sept. 15, 2003); National Emergency Mgmt Ass'n, *Priority Congressional Issues: 2004 Mid Year Conference,* (Feb. 10-13, 2004).

[24] Spencer S. Hsu and Julie Tate, *Brown's Turf Wars Sapped FEMA's Strength*, WASH. POST., Dec. 22, 2005.

[25] Letter from Michael Brown, Dir., FEMA to Tom Ridge, Sec'y, Dep't of Homeland Sec. (Sept. 15, 2003).

[26] Letter from David Liebersbach, Pres., Nat'l Emergency Mgmt. Ass'n to Honorable Don Young and Honorable James Oberstar (July 27, 2005).

[27] March 2005 Brown Memo.

[28] March 2005 Brown Memo.

[29] James J. Carafano and David Heyman, THE HERITAGE FOUND, *DHS 2.0: Rethinking the Dep't of Homeland Sec.*, Dec. 13, 2004, at 14.

[30] Paul C. Light, *Katrina's Lesson in Readiness*, WASH. POST, Sept. 1, 2005 at A29.

[31] James Carafano, Ph.D., and Richard Weitz, Ph.D., THE HERITAGE FOUND, *The Truth About FEMA: Analysis and Proposals*, Dec. 7, 2005.

[32] *Id.*

[33] *Id.*

[34] *Hearing on Hurricane Katrina: The Role of the Department of Homeland Security Before Select Comm.*, 109th Cong. (Oct. 19, 2005) at 4-5 (written statement of Michael Chertoff, Sec'y, Dep't of Homeland Sec.).

[35] Press Release, Int'l Assoc. of Fire Chiefs, *Secretary Chertoff Announces Reorganization, Plans for DHS* (Aug. 1, 2005) (on file with Select Comm.).

[36] March 2005 Brown Memo.

[37] Homeland Sec. Act of 2002, Pub. L. No 107-296, 116 Stat. 2135 (2002).

[38] U.S. Dep't of Homeland Sec., *Nat'l Response Plan* (Dec. 2004).

[39] March 2005 Brown Memo.

[40] Briefing for Select Comm. Staff with Madhu Beriwal, Pres., Innovative Emergency Mgmt., in Wash., D.C. (Jan. 6, 2006) (discussing how funding for FEMA staff to participate in subsequent Hurricane Pam implementation workshops had been cut).

[41] Briefing for Select Comm. Staff with Andrew Maner, Chief Fin. Officer, Dep't of Homeland Sec., in Wash., D.C. (Jan. 18, 2006) [hereinafter Briefing with Andrew Maner].

[42] Briefing with Andrew Maner; FEMA, *Reductions to FEMA Base*, FY 2003-2005 (Jan. 18, 2006) (on file with Select Comm.).

[43] According to OMB data, a total of 448 employees (full-time equivalents, or FTEs) were transferred from FEMA to various DHS offices in 2003:
- 42 FTEs were transferred from FEMA's salaries and expenses budget account to DHS's Departmental Operations account;
- 206 FTEs were transferred from FEMA's Working Capital Fund to DHS's Working Capital Fund; and
- 200 FTEs were transferred from FEMA's Office of Inspector General to DHS's Office of Inspector General. (GAO, GAO-04-329R, *Transfer of Budgetary Resources to the Dep't of Homeland Sec. (DHS)*, at 22 (Apr. 30, 2004) (on file with Select. Comm)).

And since the establishment of the Department, the following programs have been transferred from FEMA to other Departmental entities (OMB, Funding Chart (Oct. 4, 2005) (on file with Select Comm.):
- Emergency Management Performance Grants
- National Strategic Stockpile
- Citizen Corps
- Other grants for emergency management
- Inspector General
- FIRE Act Grants
- First Responder Grants
- Metropolitan Medical Response System grants

Moreover, according to information provided to the Select Comm. by DHS, the funding transfers that Brown referenced in his testimony Before the Select Comm. break down as follows (Briefing with Andrew Maner; FEMA, *Reductions to FEMA Base, FY 2003-2005* (Jan. 18, 2006) (on file with Select Comm.)):

FY 2003 –
- Unobligated balances from FY 2002 – $30.6 million (*Id.*) (DHS start-up costs)
- FY 2003 appropriations – $12 million (DHS start-up costs) (Of the $12 million in FY 2003 appropriations, $10 million had been allocated for Salaries and Expenses for preparedness functions and $2 million had been allocated for the programs of another management account – Emergency Management Planning and Assistance.)
- Transfer of Office for National Preparedness functions to Office of Domestic Preparedness/Bureau of Transportation Security - $10.6 million
- Transfer to the Transportation Security Administration to fund a shortfall from the Liberty Shield Supplemental – $5.5 million
- Transfer to the DHS Office of Inspector General for audits and investigations of the Disaster Relief Fund – $21.4 million

FY 2004 –
- FEMA share of DHS e-government initiatives (mostly to maintain DisasterHelp.gov website) – $2.6 million
- FEMA share of other DHS central services – $2.8 million
- Transfer to Inspector General for audits and investigations of the Disaster Relief Fund – $22 million
- National preparedness functions transferred to ODP – $28 million
- General reduction to base funding for Departmental management – $34 million

FY 2005 –
- Reduction for management cost savings realized from efficiencies attributable to the creation of DHS – $11.7 million
- $18,501 million for Working Capital Fund

[44] *Hearing on Hurricane Katrina Response and Initial Recovery Operations: Mississippi Before Select Comm.*, 109th Cong. (Dec. 7, 2005) at 7 (written statement of William Carwile, former FEMA Fed. Coordinating Officer, State of Miss.) [hereinafter *Dec. 7, 2005 Select Comm. Hearing*]; *Hearing on Hurricane Katrina: Perspectives of FEMA's Operational Professionals before the Senate Committee on Homeland Security and Governmental Affairs*, 109th Cong. (Dec. 8, 2005) at 57-58 (statement of Scott Wells, Deputy, FEMA Fed. Coordinating Officer, State of LA) [hereinafter *Perspectives of FEMA Hearing*].

[45] *Dec. 7, 2005 Select Comm. Hearing* at 7 (written statement of William Carwile, former FEMA Fed. Coordinating Officer, State of Miss.).

[46] *Perspectives of FEMA Hearing* at 57 (statement of Scott Wells, Deputy, FEMA Fed. Coordinating Officer, State of LA) [hereinafter statement of Scott Wells].

[47] *Id.*

[48] *Id.* at 57-58.

[49] Spencer Hsu, *Leaders Lacking Disaster Experience*, WASH. POST, Sept. 9, 2005 at A1.

[50] Interview by Select Comm. Staff with William Lokey, FEMA Fed. Coordinating Officer in Wash., D.C. (Jan. 26, 2006); FEMA Regions I, II, III, IV, V, VI, VIII, and IX with Acting Directors; *See, e.g.*, Region VIII Acting Director, *available at* http://www.fema.gov/about/bios/maurstad.shtm (last visited Jan. 30, 2006).

[51] Justin Rood, *FEMA's Decline: An Agency's Slow Slide From Grace*, GOVERNMENT EXECUTIVE (Oct.1, 2005).

[52] www.ourpublicservice.org/usr_doc/2003-rankings.pdf (last visited Jan. 28, 2006).

[53] *Id.*

[54] Interview by Select Comm. Staff with Andy Kopplin, Chief of Staff, Office of the Governor of LA, in New Orleans, LA (Nov. 6, 2005).

[55] *Perspectives of FEMA Hearing* at 60 (statement of William Carwile, former FEMA Fed. Coordinating Officer, State of Miss.) [hereinafter statement of William Carwile].

[56] *Id.* at 60.

[57] *Id.* at 65-68.

[58] *Id.* at 59 (statement of Senator Joseph Lieberman).

[59] *Id.*. at 67 (statement of William Carwile).

[60] *Id.* at 58 (statement of Scott Wells).

[61] *See id.* at 67 (statement of William Carwile).

FEMA

"The sheer force of Hurricane Katrina disabled many of the communications systems that state and local authorities and first responders rely upon to communicate with each other and with FEMA. This was not an issue of interoperability, but of basic operability, resulting from wind, flooding, loss of power, and other damage to infrastructure."

Michael Chertoff
Secretary, U.S. Department of Homeland Security
Select Committee Hearing, October 19, 2005

Massive communications damage and a failure to adequately plan for alternatives impaired response efforts, command and control, and situational awareness

Summary

Massive inoperability—failed, destroyed, or incompatible communications systems—was the biggest communications problem in the response to Katrina. It was predicted and planned for by some, while others experienced problems with their operations or were caught relatively unprepared. The loss of power and the failure of multiple levels of government to take the initiative to adequately prepare for its effect on communications hindered the response effort by compromising situational awareness and command and control operations, particularly in New Orleans and along the Mississippi Gulf coast. The Federal Emergency Management Agency (FEMA) could have pre-positioned mobile communications in New Orleans but did not because it believed that it should first be *asked* to do so by local authorities. In turn, poor situational awareness, and its resulting effect on command and control, contributed to the negative effects of inaccurate or unsubstantiated media reports because public officials lacked the facts to address what the media reported. To deal with the loss of power, some state and local governments had redundant communications and other means to communicate, such as satellite phones, which were invaluable. But they also experienced certain problems due to technical difficulties, high winds, and exceptionally high demand that at times overtaxed their capacity.

Where communications were operable or soon were restored, long debated and unresolved issues with interoperability among federal, state, and local communications systems complicated the efforts of first responders and government officials to work together in managing the response to Katrina. In recent years, local and state governments in each of the affected states have received several million dollars in federal funding to address communication interoperability issues. Despite claims of an "austere fiscal environment,"[1] at each level of government, internal debate, parochial interests, and a general lack of prioritization and coordination between affected jurisdictions regarding the formation and implementation of interoperable communications policies and plans severely hindered the rescue, response, and recovery efforts at all levels of government.

Finding: Massive inoperability had the biggest effect on communications, limiting command and control, situational awareness, and federal, state, and local officials' ability to address unsubstantiated and inaccurate media reports

Massive inoperability was the biggest communications problem in the response to Katrina. By all accounts, destruction to regional communications companies' facilities and the power systems on which they depend was extraordinary. For example:

GAO

A downed communications tower, Plaquemines Parish, LA.

- More than three million customer telephone lines were knocked down in Louisiana, Mississippi, and Alabama.[2] As of September 28, 2005, over 260,000 customer lines remained out of service, including

238,000 in Louisiana and 22,000 in Mississippi.

- The entire communications infrastructure on the Mississippi Gulf coast was destroyed.
- Significant damage was inflicted both on the wire line switching centers that route calls and on the lines used to connect buildings and customers to the network.
- Thirty-eight 911 call centers went down. Thirty days after landfall, two call centers in Louisiana remained out of service.
- Two telephone company switches in New Orleans responsible for routing 911 calls for the surrounding parishes were knocked out by flooding, resulting in one of the most significant losses of capacity in and around New Orleans.
- Local wireless networks also sustained considerable damage, with up to 2,000 cell sites out of service.[3] A month after landfall, approximately 820 cell sites remained out of service, the majority within New Orleans and other areas of Louisiana.[4]
- Over 20 million telephone calls did not go through the day after the hurricane.
- 37 of 41 broadcast radio stations in New Orleans and surrounding areas were knocked off the air (2 AM and 2 FM stations continued to broadcast).

After surviving Hurricane Katrina's initial blow, the radio communications system for the New Orleans police and fire departments dissolved as its radio towers lost their backup power generators in the ensuing flood.[5] The New Orleans Police Department's communications system failed and was inoperative for three days following the hurricane. At one point, hundreds of New Orleans first responders were trying to communicate on only two radio channels on a backup system, forcing them to wait for an opening in the communications traffic to transmit or receive critical information. The New Orleans Police Department headquarters, and six of the eight police districts' buildings were out of commission due to flooding, limiting (or precluding) their ability to establish command and control by performing basic law enforcement functions because their communications were destroyed.

The Louisiana State Police reported the devastation caused by the storm "severely hampered the ability of emergency responders operating on the state system to communicate with other emergency services personnel." The State Police currently operate a statewide analog

Six of the eight police districts' buildings were out of commission due to flooding, limiting (or precluding) their ability to establish command and control by performing basic law enforcement functions because their communications were destroyed.

wireless communications system originally installed for voice communications and last upgraded in 1996. It is used by about 70 agencies with a total of over 10,000 subscribers. Its infrastructure consists of 46 tower sites and 28 dispatch consoles. In a report issued December 7, 2005, the State Police reported, in addition to the effect it had on the state's system, storm damage to communications systems the local governments maintained was "severe and debilitating," further restricting communications between emergency responders. The equipment at its 46 towers depends on electricity and, when that was lost, keeping them running was nearly impossible once it became necessary to refuel the generators operating them because debris and flood waters hampered their refueling efforts.[6]

Mississippi experienced problems similar to the other affected Gulf states. Most of its state and first responder communications capabilities were inoperable during and in the immediate aftermath of the storm, forcing the various responders to rely on satellite phones and radios (which experienced their own problems due to wind damage and interference). According to Mississippi Emergency Management Agency (MEMA) Director Robert Latham, the entire communications infrastructure of the state's Gulf coast was destroyed by Hurricane Katrina, systems elsewhere across the state were inoperable, and those systems that were working were overloaded, resulting in delays processing local governments' requests for assistance. As a result, often the only communications capability present in Mississippi — for both MEMA as well as the affected counties — was through satellite phones and radios, which operate by connecting to satellites rather than routing calls through land-line or

cellular towers.[7] FEMA, for its part, deployed a Mobile Emergency Response Support detachment (MERS)[8] to the state Emergency Operations Center (EOC) in Jackson, Mississippi, to provide satellite communications systems for its operations in the Gulf coast counties. However, despite the presence of MERS and hand-held satellite phones in all of the affected counties' EOCs, the Federal Coordinating Officer for Mississippi, Bill Carwile, testified that communications capabilities were far short of what was needed to be effective.[9]

The majority of site problems were due to lack of power. Some sites had T-1 (high speed data) telephone land-line problems, but the design of the system generally allows access to more than one site in the area, so the radio/telephone calls were routed from the secondary tower site. This created some delays in accessing the system, but was not a critical factor. Cellular telephone service was generally available throughout Alabama's affected areas, but several tower sites were overloaded or not fully operational after Katrina made landfall. This was not a major problem because the Alabama Emergency Management Agency (AEMA) does not consider cellular telephone service a primary source of communications during emergency response. Instead, AEMA has a cache of pre-programmed Southern LINC radios that are activated during disasters, programmed with specific groups for users (such as Mutual Aid, Logistics, Emergency Management Assistance Compact (EMAC), Staging, etc.) and have telephone capability. There were approximately 115 LINC portable units activated and delivered for use in the field for this disaster.

The importance of power, fuel, and communications to disaster response and situational awareness

The near total failure of regional communications degraded situational awareness and exacerbated problems with agency coordination, command and control, logistics, and search and rescue operations. Reliable communications are critical to the preparation for and response to a catastrophic event because of the effect they have on establishing command and control and maintaining situational awareness.[10] Without functioning communications systems, first responders and government officials cannot establish meaningful command and control, nor can they develop the situational awareness necessary to know how and where to direct their response and recovery efforts. Similarly, without the ability to call for help, citizens cannot seek emergency assistance, alert responders or others to their whereabouts and needs, or receive updates or instructions from officials.

Katrina interoperability problems were masked to some degree by the larger and more serious breakdown of operability resulting from the destruction of facilities or power outages. Restoring phone service requires more than waiting for the flood waters to recede and restoring power. While many cables may be salvageable, the electronics that pass the signals across those lines will need to be replaced. As noted by Jim Gerace of Verizon Wireless: "It's essentially analogous to putting a PC in your bathtub. It's not going to work once it dries."[11]

In Louisiana, the winds and flooding degraded the quality of available communications, reducing most communications to the limited number of available satellite phones. Additionally, the communications infrastructure that remained intact was soon overwhelmed by the heavy communications traffic during the response.[12] FEMA officials reported "there were no status reports coming into the EOC Monday."[13] Deputy Federal Coordinating Officer Scott Wells stated that if the Coast Guard was doing flyovers of New Orleans, those reports did not get to the EOC on Monday.[14] Additionally, failed communications affected responders' ability to share information up and down the chain of command. According to Louisiana officials, "Two or three days after the storm, state police were running into division commanders in the New Orleans Police Department who reported that they had not talked to anyone above their rank since the storm."[15]

The Alabama communications infrastructure fared better than in Mississippi and Louisiana. The AEMA has various communications capabilities, with redundant backups, to ensure it maintains a high level of connectivity throughout the state. The EOC had equipment and trained personnel to communicate over all types of communications networks, including satellite, 800 MHz digital phone service, amateur radio, and others. AEMA staff viewed communications systems and capabilities during Katrina as strengths, although the goal of true interoperability within and among county emergency response and law enforcement agencies remains elusive to this day.[16] The state has little ability to

mandate what types of communications technology each county procures. AEMA makes recommendations, but with so many different counties all with communications equipment in various stages of their life cycle, the EOC must be able to process all types of communications. The AEMA integrates these systems with various bridging technologies. Several attempts have been made in the past to build a state-wide/state-owned system, but lack of funding has prevented construction of this system. Nevertheless, state and county emergency management officials concluded their communications capacity functioned reasonably well during their response to Hurricane Katrina.[17]

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Power is the most dominant factor for any telecommunications system[18] and hurricanes virtually always knock out the power, even if only for a short period of time. Very often these power outages can last for several days or more following powerful storms. For Hurricane Katrina, the Department of Homeland Security (DHS) was aware the power outages caused by the storm could go on for weeks after the storm, possibly longer. On August 28, the DHS National Infrastructure Simulation and Analysis Center issued and provided to the White House (among others) a "Fast Analysis Report" predicting the storm's likely impact on the Gulf coast area based on conditions as of August 27 when Katrina was still a Category 5 storm. In the report, DHS made a number of predictions about the storm's impact on power supplies, including:

- Electric power loss is likely to affect over 2.6 million customers;
- Restoring power could take more than 2 weeks for most of the affected areas **excluding New Orleans and the coastal areas** and may be hampered by flooding or other obstacles;
- The New Orleans region could have power outages lasting 16 weeks if excessive flooding occurs, disabling existing pumping stations up to 10 weeks and entailing power repairs that may take up to 6 weeks to complete.[19]

As predicted, the affected states all suffered severe damage to their power and communications infrastructures. During Hurricane Katrina, the City of New Orleans lost two primary tower sites and had to evacuate the police and fire communications centers because of flooding. Associated with the loss of the communications centers was the loss of all 911 capabilities and the federally funded New Orleans Maritime Interoperable Committee's (NOMIC) interoperable bridging capability. Colonel Terry Ebbert, the Homeland Security Director for New Orleans, testified "Over 2,000 police, fire, and Emergency Medical Services (EMS) personnel were forced to communicate in a single channel mode, between radios, utilizing only three mutual aid frequencies."[20]

The government's ability to communicate depends upon the viability of the commercial network's infrastructure. Ninety percent of communications assets are privately owned and operated.[21] Verizon Wireless serves the Gulf coast with two major switching stations in Baton Rouge and Covington, Louisiana. These serve as the links between cell phone antennae scattered throughout the region and the rest of the global network. While the stations themselves remained operational during and after landfall, the Covington facility lost connectivity with the cell towers due to two breaks in the connecting fiber-optic ring run by BellSouth.[22] Normally, a fiber-optic link provides redundancy: if one link is cut, information can still travel along the other route. Katrina, however, knocked out both sources because of physical damage to the fiber-optic cable. In one case, the fiber-optic cable that transported calls and internet traffic to and from New Orleans and ran along the Lake Pontchartrain Causeway was severed. Additionally, at least 20 cell towers went down due to either power loss or flooding. Verizon Wireless installed backup generators at many of the towers, but not at all, reportedly, due to local zoning restrictions.[23] Refueling remote generators also proved

difficult if not impossible. Verizon Wireless reported a number of its generators were stolen, one of Nextel's fuel trucks was stopped at gunpoint and its fuel taken for other purposes while en route to refuel cell tower generators, and the Mississippi State Police redirected a fuel truck carrying fuel designated for a cell tower generator to fuel generators at Gulfport Memorial Hospital.[24]

Other power and telecommunications companies

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reported similar problems due to exhausted fuel supplies, disruption of natural gas supply lines, or refueling difficulties due to flooding or security concerns. BellSouth reported that on September 1, 112 of its central offices were running on emergency generators, an additional 17 were completely down, and an additional 32 had no connectivity to the backbone network.[25] These central offices served as 911 tandems, and when they went down, they created outages of 911 service in as many as 13 Louisiana parishes.[26] In Gulfport, Mississippi, company officers at Alabama Power and Southern Nuclear's Watson Electric Generating Plant watched as a 30-foot storm surge rose 20 feet within the plant and flooded the 50-kilowatt backup generator that normally would have started when the power failed. The nerve center for the region's power company had no backup power to supply to the community.[27]

The loss of power — a common and altogether expected result of a hurricane — need not mean an affected area has no communications capability until the utility companies are able to restore normal electricity service. A well-planned and robust emergency communications system should be sustainable at reasonable levels of operation even after electrical power is lost.[28] Resources to sustain operations include backup generators and fuel, redundant systems, self-healing networks, access to multiple technologies, common radio frequencies for wireless communications, sufficient spectrum bandwidth to support communications needs, and the proper equipment and infrastructure to make it all work.[29] Regular land-line telephone connections can function after local power is lost if central switches maintain power and lines are not damaged; telephone switches can usually operate until their backup generators run out of fuel or are knocked out by flooding. Similarly, cell towers carrying commercial phone service and public safety radio communications can continue to function with back-up power, usually batteries.

Destruction to communications capability hindered command and control and severely limited situational awareness

"It sounds like it can happen again. How many local governments have a communications plan when everything fails?"

REPRESENTATIVE TAMMY BALDWIN (D-WI),
query during hearing, U.S. House of Representatives,
Sept. 7, 2005

In myriad ways, the vast destruction to the communications infrastructures, particularly those in Mississippi and Louisiana, negatively affected first responders and local and state governments' attempts to establish command and control. It also limited — and sometimes precluded — them from achieving and maintaining situational awareness. In New Orleans and along the Gulf coast, the National Guard and first responders were forced to rely on paper relays or face-to-face communications to convey critical information between emergency operation centers and the field.[30] This drastically slowed the pace at which

AP PHOTO/RIC FRANCIS

With communications knocked out, police relied on two-way radios.

those in the EOCs became aware of situations throughout their respective areas of responsibility. It delayed the delivery of direct assistance where it was most needed, and it hindered the ability to forward requests to state or federal agencies that might have been able to help. In the Louisiana state EOC, the communications problems were so severe that state officers could not reliably communicate with local officials, others in the state government, or federal officials, exacerbating the already severe problems with situational awareness.

On Tuesday, August 30, FEMA Deputy Federal Coordinating Officer Phillip E. Parr traveled by helicopter to the New Orleans Superdome.[31] His mission there was threefold: (1) form a unified command with the state as represented by the Louisiana National Guard, and the City of New Orleans; (2) maintain visibility of commodities ordered; and (3) build out a base from which FEMA teams could be formed to locate and assist in the hardest hit parishes. But according to Parr his ability to accomplish those goals were hindered by the lack of appropriate communications as mentioned in his statement: "To accomplish these goals we were to meet a Mobile Emergency Operations and Communications Vehicle and use that as a base of operations and communication. Due to extensive flooding in the city our communications vehicle was unable to enter the Dome and this severely hampered our operations."[32]

First responders' ability throughout the Gulf coast to communicate across a broad range (or distance) and gain control of an incident was compromised when power was lost and many had only their mobile (cellular) phones available. Because these phones run on batteries, they lose power the longer first responders have to use them in lieu of other means and, as a result, have shorter and shorter ranges over which they can operate as their batteries run down.

In Mississippi, Major General Harold A. Cross, the state's Adjutant General, told Select Committee staff the National Guard forward operating units on the coast were unable to establish and maintain meaningful communications with MEMA or Governor Barbour for the first 48 hours following landfall.[33] As a result, their initial activities were based on executing pre-landfall assignments and reacting to events on the ground as they found them. They acted with initiative. Exacerbating the situation, and unknown to Cross, the company providing the satellite service to his phones (Mobile Venture Satellites) had not informed the Guard it had changed the contact numbers on two of the Guard's satellite phones. As a result, no one attempting to reach these phones — one with the Guard's Director of Military Assistance, Lieutenant Colonel Lee Smithson (the officer responsible for coordination of the Guard's materials and assets during the response and recovery effort), and another at the Stennis Space Center commodities distribution center — could get through. The Guard did not learn of the change until two days into the response when the state National Guard's Assistant Adjutant General, Gen. Playnt, finally spoke with Smithson to ask why he was not answering his satellite phone. Smithson contacted the satellite phone company, and was only then informed of the number change.[34] Because of this failure to notify the Guard of two number changes, those who needed to reach two of the most important people or places involved in the response did not have the correct numbers to do so. This contributed to the problems and delays experienced during commodity coordination and distribution efforts experienced in Mississippi.[35] These types of problems are further discussed in the COMMAND AND CONTROL chapter.

FEMA pre-positioned communications assets, but not in New Orleans, where the need became exceptionally critical

FEMA partially anticipated the communications infrastructure, particularly the parts dependent on electric power, would be needed in the Gulf coast and pre-positioned with each of the three states' EOCs a MERS detachment.[36] MERS detachments are designed to

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provide rapid multi-media communications, information processing, logistics, and operational support to federal, state, and local agencies during catastrophic emergencies and disasters. They do so, in part, by providing mobile telecommunications, operational support, life support, and power generation for on-site disaster management; this includes satellite, telephone, and video hook-ups.[37]

Former FEMA Director Michael Brown testified, in hindsight, FEMA should have pre-positioned a MERS detachment in New Orleans. Brown stated:

> In terms of communications, one of the things that I didn't mention in the litany of things that we prepositioned is something called our MERS unit, our Mobile Emergency Response System [sic]. Those are vehicles that are command and control units that have satellite hook-ups, telephone hook-ups, video hook-ups; enable us to do communications. I prepositioned those in all three states so that we would have communications wherever we needed it. I eventually sent one of those command units — in fact, it's one of the largest ones we have, called Red October — I eventually sent one of those into New Orleans for Mayor Nagin to use.
>
> In retrospect, I wish I'd done that four days earlier. Had I done it four days earlier, though, guess what? It probably wouldn't have gotten there. So I'm now second-guessing myself, and perhaps I should have prepositioned it there before Katrina made landfall. But again, that's not the role of the federal government; that's Mike Brown Monday morning quarterbacking, having seen everything that took place and trying to figure out, okay, now seeing everything that did not work in Louisiana, if I had known that beforehand, what could I have done?[38]

As a result, one of the federal assets that might have allowed FEMA and the local and state governments to work around the damage to the communications systems and sooner gain situational awareness about conditions in New Orleans was not present. Arguably, this instance of a failure of initiative — leaving a MERS detachment outside of the city — exacerbated the degree to which the massive damage to the local communications infrastructure delayed the ability of FEMA to learn of or confirm events on the ground in New Orleans and act accordingly.

"Communications and coordination was lacking, preplanning was lacking. We were not prepared for this."

WILLIAM M. LOKEY, FEMA Federal Coordinating Officer in Louisiana, testimony before U.S. Senate, Jan. 30, 2006

Poor situational awareness and its resulting effect on command and control contributed to the negative effects of inaccurate media reports because public officials lacked access to the facts to address media reports. Throughout the early days of the response, media reports from New Orleans featured rampant looting, gunfire, crime, and lawlessness, including murders and alleged sexual assaults at the Superdome and Convention Center. Few of these reports were substantiated, and those that were—such as the gunfire—were later understood to be actually coming from individuals trapped and trying to attract the attention of rescuers in helicopters.

Officials on the ground in New Orleans interviewed by Select Committee staff stated the media greatly exaggerated reports of crime and lawlessness and that the reports from the Convention Center and Superdome were generally unsubstantiated. Of the six deaths in the Superdome, none were crime-related (five were due to medical reasons and one was a suicide).[39] In some cases, the media's coverage of its own performance - well after the fact - showed many of these reports from the early days after Katrina were false. In December, *ReasonOnline* reported that:

> On September 1, 72 hours after Hurricane Katrina ripped through New Orleans, the Associated Press news wire flashed a nightmare of a story: "Katrina Evacuation Halted Amid Gunfire…Shots Are Fired at Military Helicopter."
>
> The article flew across the globe via at least 150 news outlets, from India to Turkey to Spain. Within 24 hours commentators on every major American television news network had helped turn the helicopter sniper image into the disaster's enduring symbol of dysfunctional urbanites too depraved to be saved.
>
> Like many early horror stories about ultra-violent New Orleans natives, whether in their home city or in far-flung temporary shelters, the A.P. article turned out to be false. Evacuation

from the city of New Orleans was never "halted," according to officials from the Coast Guard, FEMA, and the Louisiana National Guard. The only helicopter airlifts stopped were those by a single private company, Acadian Ambulance, from a single location: the Superdome. And Acadian officials, who had one of the only functional communications systems in all of New Orleans during those first days, were taking every opportunity to lobby for a massive military response.

More important, there has been no official confirmation that a single military helicopter over New Orleans—let alone a National Guard Chinook in the pre-dawn hours of September 1—was fired upon.

The Air Force, to which the Air National Guard reports, also has no record of helicopter sniping. "We investigated one incident and it turned out to have been shooting on the ground, not at the helicopter," Air Force Maj. Mike Young told The New York Times on September 29.

Aside from the local National Guard, the other government agency with scores of helicopters over New Orleans was the U.S. Coast Guard, which rescued more than 33,000 people. "Coast Guard helicopters," says spokeswoman Jolie Shifflet, "were not fired on during Hurricane Katrina rescue operations."

[But] the basic premise of the article that introduced the New Orleans helicopter sniper to a global audience was dead wrong, just like so many other widely disseminated Katrina nightmares. No 7-year-old rape victim with a slit throat was ever found, even though the atrocity was reported in scores of newspapers. The Convention Center freezer was not stacked with 30 or 40 dead bodies, nor was the Superdome a live-in morgue.[40]

Media reporting made the crowds in the Superdome anxious and scared away truck drivers carrying critical commodities.

"[The] National Guard have landed in the city of New Orleans. These troops are fresh back from Iraq, well trained, experienced, battle-tested and under my orders to restore order in the streets. They have M-16s and they are locked and loaded. These troops know how to shoot and kill and they are more than willing to do so if necessary and I expect they will."

GOVERNOR KATHLEEN B. BLANCO

According to officials on the ground in New Orleans interviewed by Select Committee staff, and subsequent media reports, erroneous or exaggerated reporting of conditions in New Orleans created anxiety and fear among those sheltering at the Superdome and Convention Center, delayed some critical elements of the response effort, and discouraged some residents in dry neighborhoods from evacuating the city. Media reports described how BellSouth evacuated its personnel from their Emergency Operations Center near the Superdome under armed escort due to security concerns. Reportedly, company officials worried about the center being targeted by unruly individuals.

AP PHOTO/ERIC GAY

Gary Ludgood, vice president for integrated network planning and implementation for BellSouth, stated, "[W]e chose to evacuate our employees before anything happened."[41] Officials interviewed by Select Committee staff said some of the media reporting made the crowds in the Superdome anxious and scared away truck drivers carrying critical commodities; these same officials indicated some residents of the city in areas not flooded were reluctant to evacuate because of these reports, choosing instead to stay behind to protect their belongings. *ReasonOnline* reported on the effect of radio broadcasts containing erroneous reports:[42]

> The information vacuum in the Superdome was especially dangerous. Cell phones didn't work, the arena's public address system wouldn't run on generator power, and the law enforcement on hand was reduced to talking to the 20,000 evacuees

using bullhorns and a lot of legwork. "A lot of them had AM radios, and they would listen to news reports that talked about the dead bodies at the Superdome, and the murders in the bathrooms of the Superdome, and the babies being raped at the Superdome," Bush [Maj. Ed Bush, public affairs officer for the Louisiana Air National Guard] says, "and it would create terrible panic. I would have to try and convince them that no, it wasn't happening."

The reports of rampant lawlessness, especially the persistent urban legend of shooting at helicopters, definitely delayed some emergency and law enforcement responses. Reports abounded, from places like Andover, Massachusetts, of localities refusing to send their firefighters because of "people shooting at helicopters." The National Guard refused to approach the Convention Center until September 2, 100 hours after the hurricane, because "we waited until we had enough force in place to do an overwhelming force," Lieutenant General H. Steven Blum, Chief of the National Guard Bureau, told reporters on September 3.

"One of my good friends, Col. Jacques Thibodeaux, led that security effort," [Maj.] Bush says. "They said, 'Jacques, you gotta get down here and sweep this thing.' He said he was braced for anything. And he encountered nothing—other than a whole lot of people clapping and cheering and so glad that they were here."

"I certainly saw fights, but I saw worse fights at a Cubs game. The people never turned into these animals. They are been cheated out of being thought of as these tough people who looked out for each other. We had more babies born [in the Superdome] than we had deaths."

MAJOR ED BUSH, LA National Guard

Mississippi government officials echoed these concerns: "Even drivers coming in to Mississippi were dissuaded by the media reports in New Orleans. A lot of them ended up demanding military escorts. They'd call and say 'we've been hijacked or we ran out of gas on Highway 49 or 59. When help arrived they'd admit that wasn't the case, that they just wanted an escort. Obviously this situation impeded 'just in time' logistics,'"[43] Ebbert said.

"We were going to protect the lives of our residents. It's impossible to know what happened unless you were here. At the time, you don't know what to believe, but you don't want to be in a place to find out if what you heard is true."

RONNIE HARRIS, Mayor, Gretna, LA

Without sufficient working communications capability to get better situational awareness, the local, state, and federal officials directing the response in New Orleans had too little factual information to address — and, if need be, rebut — what the media were reporting. This allowed terrible situations — the evacuees' fear and anxiety in the Superdome and Convention Center — to continue longer than they should have and, as noted, delayed response efforts by, for example, causing the National Guard to wait to assemble enough force to deal with security problems at the Convention Center that turned out to be overstated. For further discussions of exaggerated media reports, see the LAW ENFORCEMENT chapter.

AP PHOTO/ERIC GAY

Finding: Some local and state responders prepared for communications losses but still experienced problems, while others were caught unprepared

Though the loss of power and damages to the Gulf coast area's communications infrastructure were massive, some of the local and state responders had taken the steps necessary to ensure that they had some communications capability in the immediate aftermath of Hurricane Katrina. The AEMA had various communications capabilities, all with redundant backups, to ensure that

it maintained a high level of connectivity throughout the state. AEMA officials considered their communications redundancy to be one area that worked well in their response to Katrina.[44] Southern LINC, the company whose network Alabama uses as its primary radio system, had a representative on site at the state EOC during this period that provided outage updates (as noted earlier, the AEMA has a cache of pre-programmed LINC radios that it activates during disasters and which also provide telephone capability).

In Mississippi, Gulf coast county governments had taken steps (including using DHS preparedness grant funds) to ensure some communications capability would likely survive a disaster. For example, despite the catastrophic damage suffered by the Gulf coast, Harrison County's Enhanced Digital Access Communication Systems (EDACS)[45] remained operational at nearly 100 percent capacity during and after Katrina's landfall. One interoperability success story from Mississippi was that although the Harrison County EDACS was not capable of linking to FEMA or to the MEMA EOC in Jackson, Mississippi, it was capable of linking with similar systems utilized by the Florida State Police and the Florida Fish & Wildlife Agency who arrived in Mississippi shortly after Katrina's landfall. These Florida state agencies were able to quickly reprogram their EDACS radios to communicate over the county's network. Within two weeks of landfall, the Harrison County EDACS system was able to expand to allow first responder communications within the adjoining Jackson and Hancock counties.[46]

MEMA Director Latham testified that Mississippi had satellite radios permanently mounted in the three coastal counties (Harrison, Hancock, and Jackson) and that 30 other counties also had these radios.[47] All MEMA personnel had access to a mobile satellite radio for communications throughout the state. This proved fortunate because often the only communications capability in Mississippi after the storm—for both MEMA and the affected counties—was through satellite phones and radios, which operate by connecting to satellites rather than routing calls through land-based lines or cellular towers.[48] The Harrison County EOC was only able to use its cellular communications system for approximately 12 hours until the battery on the cell tower died. They were unable to use the satellite system at the Harrison County EOC because it was damaged during the storm. Additionally, and currently, MEMA has a mobile operations unit, which it can deploy to disaster areas and allows communication across all bands.[49] Despite problems the satellite systems experienced (discussed below), Latham noted they did allow the state to learn vital information it needed about conditions in the counties and their assistance needs.[50]

Unlike the three coastal counties, Pearl River County fared better at maintaining communications capability during and after the storm. Pearl River County had two satellite phones in its emergency operations center. According to its Emergency Management Director, Bobby Strahan, these worked throughout the response but did prove problematic early on because it took a long time for any calls to go through.[51] In addition, Strahan reported the county has four high band repeater systems strategically placed throughout the county which allow all of its first responders (including police, fire, and EMS) as well as its schools to communicate. All of these systems' locations had generator backup systems which functioned properly during Katrina. In addition, Pearl River County was able to sustain communications within the county and, to a limited extent, with portions of adjacent Hancock County because it had used DHS grant funds to buy a mobile communications center (trailer) that allowed it to communicate with agencies throughout the county as well as with MEMA's mobile operations unit.[52]

In Louisiana, most of the parishes did not have satellite phones because they chose to discontinue the service after the state stopped paying the monthly fees for the phones.

Others were caught relatively unprepared to deal with the communications problems that resulted from the hurricane's damage or found their existing capabilities were insufficient. In Louisiana, most of the parishes did not have satellite phones (as their counterparts in Mississippi did) because they chose to discontinue the service after the state stopped paying the monthly fees for the phones. In 1999, the state began using federal funding to provide each parish emergency management office with

a satellite telephone and paid the $65.00 monthly fee, but it discontinued doing so for the parishes in August 2004. As a result, all but three parishes—Orleans, Plaquemines, and Jefferson—discontinued their satellite phone service.[53] Larry Ingargiola, Director, Office of Homeland Security and Emergency Management, St. Bernard Parish, told Select Committee staff the parish returned the satellite phones when the state stopped paying the monthly service fee. After Katrina hit, the state sent the phones back to St. Bernard because there was no other means of communication available to the parish.[54]

The failure of 911 call centers in New Orleans also illustrates how others were unprepared to deal with communications problems. Identifying where calls to a 911 call center will be routed if it is rendered inoperable is a basic preparation for Public Safety Answering Points (PSAPs) such as 911 call centers.[55] Although the technology to switch calls to 911 to an alternative location exists,[56] many 911 call centers in Louisiana did not have protocols in place to identify where their calls should go and had not arranged for any rerouting. As a result, numerous calls to 911 in the immediate aftermath — especially as the floodwaters in New Orleans were rising — simply dropped.[57]

In Mississippi, MEMA Director Latham testified the state found it did not have enough satellite radios when only its satellite systems were operable.[58] As a result, during its response to Katrina, MEMA purchased additional portable satellite phones for its State Emergency Response Team (in the future, Mississippi indicated these additional phones can be issued to local authorities as a redundant system in disasters).[59] Some Mississippi responders also found their satellite communications capabilities were not sufficiently capable of withstanding high winds. Specifically, though they generally remained operable and the state relied on them during its response to Katrina, Mississippi's satellite communications capabilities suffered because the hurricane force winds—at times sustained over 130 miles per hour—shifted the antennas in each of the coastal counties, causing satellite communications there to fail because the antennas were no longer properly targeted. As a result, for several days, these counties lost their ability to communicate with the state EOC in Jackson or FEMA about their needs for assistance or the status of any commodities requests they had made before the storm.[60] Because of the lessons it learned from the damage to its satellite systems in Katrina, Mississippi is investigating for future use in its counties' EOCs the omni-directional antennas it has in place on all of its state EMA and Department of Wildlife, Fisheries, and Parks vehicles. According to Latham, these antennas would not be affected by strong winds and would allow constant communications.[61]

Responders in Louisiana similarly experienced certain problems that can plague satellite-based communications. Specifically, satellite phones are technically capable of transmitting calls virtually anywhere on earth, but they may have trouble doing so when the user is inside a building or when the weather is cloudy. According to the Louisiana State Police report, "heavy cloud coverage and system inundation" limited the effectiveness of the portable satellite phones delivered to several troop headquarters in the affected areas.[62] Even when weather conditions permit smooth transmissions of signals for satellite communications, this is meaningless if the caller does not know how to use the satellite phone, or the phone does not work at all. As Mayor Nagin noted during Congressional testimony, "I have a huge box of satellite phones that did not work."[63]

For the systems that were functioning after the storm as well as those that were eventually restored, problems with interoperability further exacerbated rescue efforts. As Colonel Ebbert testified, "[T]here was no voice radio contact with surrounding parishes or state and federal agencies. Lives were put at risk and it created a direct operational impact on their ability to maintain control of the rapidly deteriorating situation within the city, carry out rescue efforts and control the evacuation of those people who had failed to heed the call for evacuation."[64]

Despite hundreds of millions in federal funding for technology and communications, the absence of true communication interoperability within and between affected jurisdictions severely hindered rescue and response efforts at all levels of government

Many in the industry, media, and government have long focused on the problem of "interoperability." FEMA officials claimed they did not know for days about the thousands of people at the New Orleans Convention Center, first responders in helicopters could not talk

to crews patrolling in boats, and National Guard Commanders in Louisiana and Mississippi had to use runners to relay orders.

"We've got runners running from commander to commander. In other words, we're going to the sound of gunfire, as we used to say in the Revolutionary War."

MAJOR GENERAL HAROLD A. CROSS, Adjutant General, Mississippi National Guard

FEMA

Interoperability for public safety communication is defined as the ability to share information via voice, data, on-demand, in real-time, when needed and as authorized. The public safety community expects this level of interoperability will be available using equipment from multiple manufacturers, be transparent to the user, require little or no special knowledge of the system, and not be dependent on common frequency assignments.[65] A Conference of Mayors 2004 survey of 192 cities showed 44 percent reported an accident within the preceding year in which the lack of interoperable communications made response difficult; 49 percent of cities are not interoperable with state police; 60 percent are not interoperable with their state emergency operation centers; and 83 percent are not interoperable with the federal law enforcement agencies.[66]

Communications — particularly wireless communications — enable all other functions in any disaster relief operation along with the sensors to inform officials and first responders what is happening and share the information and the ability to command and control those functions and information. These are all mission-critical functions. Hurricane Katrina was no exception. Without effective communications, every operation will suffer debilitating inefficiencies, some leading to ineffectiveness.[67] Too many public safety personnel cannot communicate by radio because their equipment is still incompatible or the frequencies they're assigned are different. They operate on 10 different frequency bands and run communication systems that are often proprietary and too often 30 or more years old. Over 90 percent of the nation's public safety wireless infrastructure is financed, owned, operated, and maintained by the more than 60,000 individual local jurisdictions, police, fire and emergency medical services that serve the public.[68]

Louisiana government officials have long been cognizant of the interoperability problem among the state and parish first responders.[69] Despite longstanding and sizable federal interoperability grants to multiple Louisiana jurisdictions, coordinated planning had barely progressed when Katrina hit.[70] Although some New Orleans and Louisiana state officials attribute the lack of true interoperability for first responders in the region to financial limitations,[71] this explanation flies in the face of the massive amounts of federal grants to Louisiana.[72] State and local governments were responsible for designing and coordinating their efforts, and they failed to make meaningful progress despite knowledge of the problem for years and the expenditure of millions in federal funds.

Since 2001, the federal government has given $8.6 billion to states for equipment, first responder training, and disaster exercises. In 2005, DHS gave the states $2.1 billion, of which $925 million was allocated for communications upgrades.[73] In Louisiana alone, since fiscal year 1999, the federal government allocated over $135 million for preparedness, of which more than $108 million was awarded to local governments, and nearly $27 million to the state. Of these funds, nearly $107 million was dedicated to equipment purchases and the remaining $28 million was allocated for planning, training, exercises and administrative costs. Since 1999, approximately $16 million has been spent on interoperability.[74] In addition to these funds, Alabama, Mississippi, and Louisiana are also the recipients of federal grants for law enforcement agencies via the Justice Department's Community Oriented Policing Services (COPS) Office.[75]

- Alabama received $24,770,274 from FY2003 to FY2005 under the COPS Interoperability Communications, Law Enforcement Technology, Universal Hiring Program (UHP), COPS in Schools (CIS), and Homeland Security Overtime (HSOP) grant programs;

There was no voice radio contact with surrounding parishes or state and federal agencies. Lives were put at risk.

Col.Terry Ebbert, New Orleans Director of Homeland Security and Public Safety

- Louisiana received $23,495,114 from FY2003 to FY2005 under the COPS Interoperability Communications, Law Enforcement Technology, UHP, CIS, Regional Community Policing Institute (RCPI) and Homeland Security Overtime (HSOP) grant programs; and,

- Mississippi received $7,003,688 from FY2003 to FY2005 under the COPS Law Enforcement Technology, UHP, CIS, and HSOP grant programs.[76]

More specifically, the COPS Interoperable Communications Grant Program provides funding to local communities to help them develop effective interoperable communications systems for public safety and emergency service providers. The grant program funds projects that explore the use of equipment and technology to increase interoperability and data sharing amongst law enforcement, fire departments, and emergency medical services. From 2003-2005, the COPS program awarded over $242 million to 63 agencies across the nation to address the need to ensure interoperable communications. In 2003, for example, the City of New Orleans received a COPS grant for interoperable communications technology in the amount of $5,510,412; in 2004, the City of Shreveport and the Birmingham, Alabama Police Department received COPS grants for interoperable communications technology in the amounts of $2,998,901 and $5,625,000, respectively; and in 2005, the City of Baton Rouge Police Department and the Police Department in Mobile, Alabama received COPS grants for interoperable communications technology in the amounts of $5,999,184, and $3,000,000, respectively.[77]

The $5,510,412 COPS interoperability grant awarded to the City of New Orleans in September 2003 initially was approved for one project. A year and a half later, however, the city requested approval to modify its original plan, and in May 2005, the COPS program office approved a new plan to build upon the Jefferson Parish 800 MHz radio system, and link four parishes (Orleans, Jefferson, St. Bernard and Plaquemines) together. As of September 2005, the City had spent only $275,428 of the $5,510,412 originally awarded in 2003.[78]

"Technology is at the center of this, but most of the components required to achieve interoperability in the near-term already exist. However, it requires agreements, planning, and governance arrangements across jurisdictions."

DAVID BOYD, Deputy Director, Office Systems Engineering & Development, DHS Testimony before U.S. Senate Sept. 29, 2005

Despite these awards (and other federal grants described in detail in Appendix 4 of this report), officials in Louisiana claim "austere financial circumstances" prevented the completion of the interoperability modifications of its communications system. New Orleans designed and purchased its M/A-Com 800 MHz radio communications system in 1992. The Louisiana State Police updated a different Motorola 800 MHz radio communications system in 1996, and while the two systems are capable of communicating, this requires special integration modifications to each system, and only is attempted, typically, for large events such as the 2002 Super Bowl held in New Orleans.[79] Under normal circumstances, the City's system is linked to the state's system via a traditional T1 landline. As Greg Meffert, the New Orleans Chief Information Officer told Select Committee staff, the two systems' interoperable capabilities are based on faulty assumptions. If the T1 lines are damaged, this destroys the connection between the systems.[80] This is exactly what happened during Katrina. The city's system went down after the system's generators were flooded or damaged by flying debris. As noted by Ebbert in his testimony before the Select Committee, "there was no voice radio contact with surrounding parishes or state and federal agencies. Lives were put at risk and it created a direct operational impact on their ability to maintain control of the rapidly deteriorating situation within the city, carry out rescue efforts and control the evacuation of those people who had failed to heed the call for evacuation."[81]

Finding: The National Communications System met many of the challenges posed by Hurricane Katrina, enabling critical communication during the response, but gaps in the system did result in delayed response and inadequate delivery of relief supplies

The federal government's use of the National Communications System (NCS) prior to, during, and after Katrina's landfall to coordinate assets and personnel proved effective, but like the efforts of the Gulf states, it too was overwhelmed by the magnitude of the damage left in Katrina's wake.

Following the Cuban Missile Crisis, President Kennedy established the National Communications System by a Presidential Memorandum on August 21, 1963.[82] On April 3, 1984, President Ronald Reagan signed Executive Order 12472, which broadened the NCS' national security and emergency preparedness capabilities and superseded President Kennedy's original 1963 memorandum. The NCS expanded from its original six members to an interagency group of 23 federal departments and agencies, and began coordinating and planning NS/EP telecommunications for the federal government under all circumstances, including crisis or emergency, attack, recovery, and reconstruction. As mandated by the Executive Order, the NCS also includes an industry component called the National Coordinating Center for Telecommunications (NCC), a joint industry-government body within the NCS. The operational mission of the NCC is coordination of restoring and reinstituting national security and emergency preparedness communications in an emergency situation. During Hurricane Katrina, the NCC operated a 24-hour watch center and conducted daily analysis and situational monitoring of ongoing events, and coordination of government and industry response capabilities.[83]

In addition to the Executive Order, the NCS has a specific communications role in the National Response Plan (NRP). Specifically, the NCS is the lead agency responsible for the communications component of Emergency Support Function 2 (ESF 2), which "ensures the provision of Federal communications to Federal, State, local, tribal and private-sector response efforts during an Incident of National Significance." In support of ESF 2, the NCC is tasked to function as a central point of coordination and information sharing among communications infrastructure operators.

To facilitate coordination of industry and government operations during an emergency, the NCS maintains and operates several priority service programs, which help ensure critical calls are completed in the event of congestion damage to the national commercial communications infrastructure. They include the Government Emergency Telecommunications Service (GETS), which provides authorized users a higher rate of call completion during periods of outages or congestion resulting from disasters. During and after Hurricane Katrina, the NCS issued 1,000 new GETS access code numbers to first responders and emergency recovery officials in the affected states. Between August 28 and September 9, the GETS system was utilized to make over 35,000 calls.[84] The NCS also operates a wireless counterpart to GETS, the Wireless Priority Service (WPS) program. It provides priority treatment for calls made during periods of wireless network congestion by emergency response personnel with national security and emergency preparedness responsibilities. During Katrina, the NCS enabled and distributed over 4,000 WPS cellular phones.[85]

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In Gulfport, MS., video conferencing was used to coordinate disaster aid.

The NCS operates the Telecommunications Service Priority (TSP) program, which establishes a regulatory, administrative and operational framework for restoring and provisioning priority communications services. Through this program, service vendors are authorized to give priority to restoration and provision of service to those with TSP assignments. Following Hurricane Katrina, the NCS completed more than 1,500 TSP assignments helping to restore emergency response capabilities in the Gulf states.[86]

The NCS also maintains the Shared Resources High Frequency Radio Program (SHARES), which provides a single, interagency, voluntary message handling system using over 250 High Frequency (HF) radio frequencies when other communications are unavailable. A network of government, military, and Military Affiliate Radio Service (MARS) radio stations (an organized network of Amateur Radio stations affiliated with the different branches of the armed services to provide volunteer communications), and more than 90 federal, state, and private industry organizations participate in the SHARES program. Within days following Katrina's landfall, the NCS coordinated participation by 431 SHARES stations across the nation and assisted first responders conducting search and rescue missions by relaying information to appropriate government agencies; relayed logistical and operational information between FEMA's EOCs in Georgia, Mississippi, and Louisiana; relayed health and welfare messages between volunteer agencies in Georgia and the national headquarters of the American Red Cross in Washington, DC; established radio contact with deployed U.S. Navy ships detailed to New Orleans; and provided frequency coordination between federal agencies, Louisiana and Mississippi's EOCs, and the Civil Air Patrol.[87]

Additionally, the NCS coordinated the frequencies used by the nearly 1,000 Amateur Radio Emergency Services (ARES) volunteers across the nation who served in the Katrina stricken area providing communications for government agencies, the Red Cross and the Salvation Army. Emergency communications were conducted not only by voice, but also by high-speed data transmissions using state-of-the art digital communications software known as WinLink. In Mississippi, FEMA dispatched Amateur Radio operators to hospitals, evacuation centers, and county EOCs to send emergency messaging 24 hours per day. According to Bay St. Louis Mayor Edward A. "Eddie" Favre, amateur radio operators were especially helpful in maintaining situational awareness and relaying Red Cross messages to and from the Hancock County EOC.[88] At airports in Texas and Louisiana, radio amateurs tracked evacuees and notified families of their whereabouts. The Red Cross deployed amateur radio volunteers at its 250 shelter and feeding stations, principally in Mississippi, Alabama, and Florida.[89] The Salvation Army operates its own Amateur Radio communications system using Amateur radio volunteers, known as SATERN. During the Hurricane Katrina response and recovery effort, SATERN joined forces with the SHARES program and received over 48,000 requests for emergency communications assistance utilizing federal frequencies made available via the SHARES program.[90]

FEMA dispatched Amateur Radio operators to hospitals, evacuation centers, and county Emergency Operations Centers to send emergency messaging 24 hours per day.

Following landfall, the NCS activated the SHARES network on August 29, and worked with The U.S. Northern Command (NORTHCOM) to identify and deploy communications assets, and by September 2, all NCS ESF 2 systems were in place to receive communications requests from the affected region. The NCS dispatched satellite communications vans to various locations, including New Orleans City Hall, the Louisiana State Police headquarters in Baton Rouge, the New Orleans Airport, and the Louisiana National Guard in Jefferson Parish; dispatched AT&T and MCI cellular communication vans to the state EOCs in Mississippi and Louisiana; and identified and delivered satellite handsets to first responders in all three affected states. Additionally, the NCS designed and installed a new E-911 system in Plaquemines Parish, and provided an interim digital Land Mobile Radio system to the eight parishes surrounding New Orleans.[91]

Like all levels of government, the NCS was not able to address all aspects of the damage to the communications

infrastructure of the Gulf states. Although the NCS performed several important functions prior to and during the response efforts, the "historical magnitude of Hurricane Katrina stressed the processes and procedures of the NCS and required ESF 2 to perform functions . . . which it [had] never done before."[92]

Conclusion

The extent of destruction and damage to the communications infrastructure and services caused by Katrina exceeded that of any other natural disaster experienced by the Gulf coast states. Simply put, Katrina's devastation overwhelmed government resources at all levels. The loss of power and the failure of various levels of government to adequately prepare for the ensuing and inevitable loss of communications hindered the response effort by compromising situational awareness and command and control operations.

Despite the devastation left by Katrina, this needn't have been the case. Catastrophic disasters may have some unpredictable consequences, but losing power and the dependent communications systems after a hurricane should not be one of them. The parish officials in Louisiana who declined to spend $65 per month for satellite phones showed a failure of initiative when they gave up those assets. Why such a "penny wise-pound foolish" decision was allowed to stand defies explanation. The same satellite phones that were given up by some of the parishes eventually were returned to them after Katrina's landfall because they had no other means of communicating with those bringing help to people in need. Similarly, those in the 911 call centers who could not reroute calls for help showed a failure of initiative by not taking the steps necessary to ensure calls to them were not in vain, simply because predictable things — power losses and flooding — happened after a hurricane.

Catastrophic disasters may have some unpredictable consequences, but losing power and the dependent communications systems after a hurricane should not be one of them.

Issues with interoperability have existed for years. Government officials and emergency service agencies are well aware of the need to establish and maintain robust emergency communications systems. Modern day National Guard units should not have to rely upon runners to relay messages. Governors should be able to communicate with their generals. Police commanders should be able to communicate with their officers in the street. Despite knowledge of interoperability problems and the seriousness of the consequences of failure to address them, and because of often parochial desires for duplicative, expensive, and diverse stand alone communications systems, officials responsible for providing for public safety spent millions on other priorities.

Disasters start and end at the local level. If first responders want interoperability with their counterparts in the future, their leaders need to communicate. Federal authorities need to establish standards. State and local officials need to take the initiative to make responsible use of federal, state and local funding to develop communications systems that can grow with their communities. These officials need to fulfill the public trust given to them. They need to lead. ■

[1] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Louisiana Before Select Comm.*, 109th Cong. (Dec. 14, 2005) at 3 (written statement of Col. Terry Ebbert, USMC (ret), Director of Homeland Security & Public Safety, City of New Orleans) [hereinafter *Dec. 14, 2005 Select Comm. Hearing*].

[2] *Hearing on Ensuring Operability During Catastrophic Events Before the Comm. on Homeland Security Subcomm. on Emergency Preparedness, Science, and Technology,* 109th Cong. (Oct. 26, 2005) at 1 (written statement of Dr. Peter M. Fonash, Deputy Manager, National Communications System, DHS) [hereinafter *Oct. 26, 2005 Comm. on Homeland Security Hearing*].

[3] *Id.* at 6.

[4] *Hearing on Public Safety Communications from 9/11 to Katrina: Critical Public Policy Lessons Before the Comm. on Energy and Commerce, Subcomm. on Telecommunications and the Internet,* 109th Cong. (Sept. 29, 2005) at 3 (written statement of Kevin J. Martin, Chairman, Federal Communications Commission) [hereinafter *Sept. 29, 2005 Energy & Commerce Comm. Hearing*].

[5] Matthew Fordahl, *Communication Breakdown: From 9/11 to Katrina*, ASSOC. PRESS, Sept. 13, 2005.

[6] LA State Police, *Louisiana Totally Interoperable Environment* at 2-3 (Dec. 7, 2005).

[7] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Mississippi Before Select Comm.*, 109th Cong. (Dec. 7, 2005) at 3-4 (statement of Robert R. Latham, Jr., Executive Director, Mississippi Emergency Management Agency) [hereinafter *Dec. 7, 2005 Select Comm. Hearing*].

[8] *See* http://www.fema.gov/rrr/mers01.shtm (last visited Jan. 26, 2006).

[9] *Dec. 7, 2005 Select Comm. Hearing* at 7 (statement of William L. Carwile, III, former Federal Coordinating Officer, Hurricane Katrina Response and Initial Recovery Operations: Mississippi).

[10] Command and control are two key aspects of emergency management involving unity of command and effort among local, state, and federal authorities as well as an accepted chain of command. (*See* DHS *National Response Plan*, (Dec. 2004) at 1 [hereinafter *NRP*].) Situational awareness simply refers to the extent to which the various responders—local, state, or federal officials, for example—have accurate, reasonably reliable information about conditions in the affected area and can use that information to guide their response efforts.

[11] Stephen Lawson, *Cell carriers tackle Katrina damage*, IDG NEWS, (San Fran.), Sept. 1, 2005.

[12] Interviews by Select Comm. Staff with FEMA, Louisiana state and local officials in New Orleans, LA (Nov. 3-10, 2005).

[13] Interviews by Select Comm. Staff with FEMA officials, New Orleans, LA (Nov. 9-10, 2005).

[14] Interviews by Select Comm. Staff with Scott Wells, FEMA, in New Orleans, LA (Nov. 9, 2005).

[15] Interview by Select Comm. Staff with Gordon Mitchell and Ralph "Joey" Booth, Louisiana State Police in Baton Rouge, LA (Nov. 9, 2005).

[16] Interviews by Select Comm. Staff with Jerry McRay, Branch Chief, Information Technology Systems, Alabama Emergency Management Agency EOC officials in Clanton, AL (Oct. 11, 2005).

[17] Interviews by Select Comm. Staff with Alabama Emergency management Agency EOC officials in Clanton, AL (Oct. 11, 2005).

[18] *Hearing on Communications in a Disaster Before the Senate Comm. on Commerce, Science & Transportation,* 109th Cong. (Sept. 22, 2005) (statement of Hossein Eslambolchi, President, AT&T Global Networking Technology Services and AT&T Labs) [hereinafter *Sept. 22, 2005 Senate Commerce Comm. Hearing*].

[19] DHS National Infrastructure Simulation and Analysis Center, *Fast Analysis Report (Update to Reflect Category 5 Status) to DHS IP on Hurricane Katrina, Gulf coast* at 1-2 (Aug. 28, 2005) (emphasis supplied).

[20] *Dec. 14, 2005 Select Comm. Hearing* at 3 (written statement of Col. Terry Ebbert).

[21] *Hearing on Hurricane Katrina Before the Comm. on Energy & Commerce*, 109th Cong. (Sept. 7, 2005) (statement of Kenneth P. Moran, Acting Director, Office of Homeland Security Enforcement Bureau, Federal Communications Commission).

[22] Joab Jackson, *Telecom infrastructure was no match for Katrina*, WASH. TECH., Nov. 7, 2005 [hereinafter *Telecom Infrastructure Article*].

[23] *Id.*

[24] Interview (telephone) by Select Comm. Staff with Anthony Melone, Vice President of Network Operations Support, Verizon Wireless (Jan. 27, 2006); *See also*, E-mail correspondence from Hans Leutenegger to Anthony Melone and Select Comm. Staff (Jan. 30, 2006) (9:45 a.m.).

[25] BellSouth *Press Release* (Sept. 2, 2005). Prior to Katrina, BellSouth Corporation served 1.9 million lines in Louisiana. Approximately 1.03 million lines (54.2%) were initially affected. In Mississippi, approximately 438,000 (39.8%) were affected, and in Alabama 93,000 (5.5%) of the state's 1.7 million lines were effected. By Sept. 2, approximately 144,000 remained out of services in New Orleans due to long term displacement. BellSouth News Release, Sept. 2, 2005.

[26] *Hearing on Communications Interoperability Before the Senate Comm. on Commerce, Science & Transportation*, 109th Cong. (Sept. 29, 2005) at 5-6 (written statement of Chief Willis Carter, First Vice President of the Assoc. of Public Safety Communications Officials-Int' and Chief of Communications, Shreveport Fire Department, Shreveport, LA) [hereinafter *Sept. 29, 2005 Senate Commerce Comm. Hearing*].

[27] Julia Harwell Segars, *Katrina's Wrath*, OPTIMIZE, Oct. 2005.

[28] Congressional Research Service Report RL32594, *Public Safety Communications Policy*, by Linda K. Moore (Updated Jan. 5, 2006).

[29] *Id.*

[30] Interview by Select Comm. Staff with Major General Harold A. Cross, Adjutant General, Mississippi National Guard in Jackson, MS (Oct. 13, 2005).

[31] *Hearing on Hurricane Katrina: Perspectives of FEMA's Operations Professionals Before the Senate Comm. on Homeland Security and Governmental Affairs*, 109th Cong. (Dec. 8, 2005) at 3 (statement of Phillip E. Parr, Deputy Federal Coordinating Officer, FEMA Joint Field Office, Austin, TX) [hereinafter *Dec. 8, 2005 Senate Homeland Security and Governmental Affairs Comm. Hearing*].

[32] *Id.*

[33] Interview by Select Comm. Staff with Maj. Gen. Harold A. Cross, Adjutant Gen., Mississippi National Guard at Jackson, MS (Oct. 13, 2005).

[34] Interview by Select Comm. Staff with Lt. Col. Lee Smithson, Mississippi National Guard, in Gulfport, MS (Jan. 19, 2006).

[35] *Id.*

[36] *See* http://www.fema.gov/rrr/mers01.shtm (last visited Jan. 26, 2006).

[37] *Id.*

[38] *Hearing on Hurricane Katrina: The Role of the Federal Emergency Management Agency Before Select Comm.*, 109th Cong. (Sept. 27, 2005) at 32-33 (statement of Michael D. Brown, former Dir., FEMA) [hereinafter *Sept. 27, 2005 Select Comm. Hearing*].
[39] Interview by Select Comm. Staff with Colonel Mark Mouton and Lieutenant General Jacques Thibideaux, Louisiana National Guard, in New Orleans, LA (Nov. 3, 2005).
[40] Matt Welch, T*hey Shoot Helicopters, Don't They? How journalists spread rumors during Katrina*, REASON ONLINE, Dec. 2005, *available at* http://www.reason.com/0512/co.mw.they.shtml, (last visited Jan. 25, 2006) [hereinafter *Media Rumors Article*].
[41] *Telecom Infrastructure Article*.
[42] *Media Rumors Article*.
[43] Briefing for Select Comm. Members and Staff by Mayor Favre, Bay St. Louis, MS, in Hancock County, MS (Jan. 20, 2006).
[44] Interview by Select Comm. Staff with Bruce Baughman, Dir., State of Alabama Emergency Management Agency, in Clanton, AL (Oct. 11, 2005).
[45] This simulcast trunked radio system consisting of three 20 channel sites and two 10 channel sites was installed in 2003 to serve law enforcement, fire, emergency medical, emergency management, and public utility services in Harrison County, which includes the cities Gulfport and Biloxi, MS.
[46] E-mail correspondence from Benjamin J. Spraggins, Dir., Harrison County Emergency Management Agency, to Select Comm. Staff (Feb. 1, 2006) (2:53 p.m.).
[47] *Dec. 7, 2005 Select Comm. Hearing* at 56 (statement of Robert R. Latham, Jr.).
[48] *Id*. at 3-4.
[49] *Id*. at 7 (statement of Bobby Strahan, MCEM, Director, Pearl River County Emergency Management Agency).
[50] *Id*. at 97 (statement of Robert R. Latham, Jr.).
[51] Interview (telephone) by Select Comm. Staff with Bobby Strahan, MCEM, Director, Pearl River County Emergency Management Agency (Nov. 29, 2005).
[52] *Id.*; *Dec. 7, 2005 Select Comm. Hearing* at 2, 7-8 (statement of Bobby Strahan).
[53] Interview by Select Comm. Staff with Matt Farlow, Information Technology Divisions Chief, LA Office of Homeland Security and Emergency Preparedness (Nov. 4, 2005).
[54] Briefing for Select Comm. Staff by Larry Ingargiola, Director, Office of Homeland Security and Emergency Management, St. Bernard Parish, in St. Bernard Parish, LA (Nov. 3, 2005).
[55] *Sept. 22, 2005 Senate Commerce Comm. Hearing* (written statement of Kevin J. Martin).
[56] *Id.*
[57] *Id.*
[58] *Dec. 7, 2005 Select Comm. Hearing* at 35 (written statement of Robert R. Latham, Jr.).
[59] *Id.*
[60] *Id.* at 1 (written statement of Benjamin J. Spraggins; *Id.* at 4 (written statement of Robert R. Latham, Jr).
[61] *Id.* at 4 (written statement of Robert R. Latham, Jr).
[62] LA State Police Report, *Louisiana Totally Interoperable Environment* at 3 (Dec. 7, 2005).
[63] *Hearing on Hurricane Katrina: Hurricane Katrina Evacuations Before the Senate Comm. on Homeland Security and Gov't Affairs,* 109th Cong. (Feb. 1, 2006) (testimony of C. Ray Nagin, Mayor of New Orleans, LA).
[64] *Dec. 14, 2005 Select Comm. Hearing* (written statement of Col. Terry Ebbert).
[65] *Sept. 29, 2005 Senate Commerce Comm. Hearing* at 1 (written statement of Dereck Orr, Program Manager of Public Safety Communications, Nat'l Institute of Standards and Technology).
[66] *Sept. 22, 2005 Senate Commerce Comm. Hearing* at 5 (statement of Sen. Rockefeller).
[67] *Oct. 26, 2005 Comm. on Homeland Security Hearing* (written testimony of Dr. Linton Wells II, Acting Ass't Sec'y of Defense, Networks and Information Integration, and DOD Chief Information Officer).
[68] *Sept. 29, 2005 Senate Commerce Comm. Hearing* at 2 (written statement of David Boyd, Deputy Director, Office Systems Engineering & Development, DHS).
[69] Correspondence from Colonel Henry L. Whitehorn, Superintendent, LA State Police, to Select Comm. (Dec. 29, 2005) [hereinafter Col. Whitehorn correspondence].
[70] *Dec. 14, 2005 Select Comm. Hearing* at 3 (written statement of Col. Terry Ebbert).
[71] Louisiana State officials claim for "Louisiana to achieve true interoperability, the initial acquisition cost infrastructure and equipment is $552,680, 423" thus rendering "the achievement of true interoperability at the state level virtually impossible." *See also* Col. Whitehorn correspondence.
[72] *Dec. 14, 2005 Select Comm. Hearing* at 3-4 (written statement of Col. Terry Ebbert); Col. Whitehorn correspondence.
[73] Matthew Fordahl, *U.S. Lacks Unified Emergency Radio System,* ASSOC. PRESS, Sept. 13, 2005 [hereinafter *Radio System Article*].
[74] Col. Whitehorn correspondence.
[75] The COPS Office was created by Title I of the Violent Crime Control and Law Enforcement Act of 1994 (P.L. 103-322). The mission of the COPS Office is to advance community policing in all jurisdictions across the United States. The COPS Office awards grants to state, local and tribal law enforcement agencies throughout the United States so they can hire and train law enforcement officers to participate in community policing, purchase and deploy new crime-fighting technologies, and develop and test new and innovative policing strategies.
[76] Congressional Research Service Memo, FEMA Hazard Mitigation, *COPS and ODP Grants Awarded in Alabama, Louisiana and Mississippi in Fiscal Years 2003-2005* (Dec. 21, 2005).
[77] *Id.*
[78] Interview (telephone) by Select Comm. Staff with Gilbert Moore, COPS Program External Affairs Office (Sept. 27, 2005).
[79] *Radio System Article*.
[80] Interview by Select Comm. Staff with Gregg Meffert, Chief Information Officer, City of New Orleans, in Wash., DC (Oct. 18, 2005).

[81] *Dec. 14, 2005 Select Comm. Hearing* at 3 (written statement of Col. Terry Ebbert).

[82] The NCS began in 1962 after the Cuban missile crisis when communications problems among the United States, the Union of Soviet Socialist Republics, the North Atlantic Treaty Organization, and foreign heads of state threatened to complicate the crisis further. After the crisis, President John F. Kennedy ordered an investigation of national security communications, and the National Security Council (NSC) formed an interdepartmental committee to examine the communications networks and institute changes. This interdepartmental committee recommended the formation of a single unified communications system to serve the President, Department of Defense, diplomatic and intelligence activities, and civilian leaders in order to provide better communications support to critical government functions during emergencies. The NCS mandate included linking, improving, and extending the communications facilities and components of various federal agencies, focusing on interconnectivity and survivability. *See* NCS website: http://www.ncs.gov/faq.html (last visited Jan. 31, 2006).

[83] *Oct. 26, 2005 Homeland Security Comm. Hearing* at 3 (written statement of Dr. Peter M. Fonash).

[84] Interview by Select Comm. Staff with Dr. Peter M. Fonash, in Wash., DC (Jan. 27, 2006).

[85] *Oct. 26, 2005 Homeland Security Comm. Hearing* at 3 (written statement of Dr. Peter M. Fonash).

[86] *Id.*

[87] *Id.* at 4.

[88] Briefing for Select Comm. Staff by Edward A. Favre, Mayor, Bay St. Louis, MS, in Bay St. Louis, MS (Oct. 13, 2005).

[89] *Hearing on Back to the Drawing Board: A First Look at Lessons Learned from Katrina Before the Government Reform Comm.*, 109th Cong. (Sept. 15, 2005), at 257-58 (written statement of Jim Haynie, President, National Association for Amateur Radio).

[90] *Sept. 29, 2005 Energy & Commerce Comm. Hearing* (written statement of Harold Kramer, Chief Operating Officer, American Radio Relay League).

[91] *Oct. 26, 2005 Comm. on Homeland Security Hearing* at 9 (written statement of Dr. Peter M. Fonash).

[92] *Id.* at 7.

AP PHOTO/STEVEN SENNE

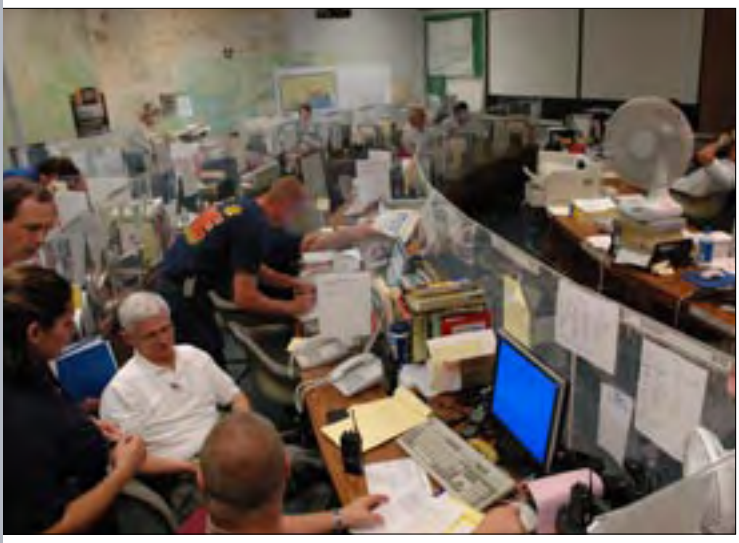
"Natural disasters will always be chaotic situations. But with proper planning and preparation, it is possible to respond quickly to restore order and begin recovery efforts."

Bob Riley
Governor, State of Alabama
Select Committee hearing, November 9, 2005

Command and Control was impaired at all levels, delaying relief

Summary

Command and control are key aspects of emergency management, and the federal government has taken several steps, most notably developing an Incident Command System (ICS), to promote unity of command among local, state, and federal authorities. However, during and immediately after Hurricane Katrina made landfall, there were lapses in command and control within each level of government, and between the three levels of government.



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Local governments' command and control was often paralyzed by the complete destruction of their entire emergency management infrastructure. While state command and control facilities (such as the Emergency Operations Centers (EOCs)) were generally intact after the storm, the magnitude of the storm and a variety of operational factors impaired their unity of command. The federal government also struggled to maintain unity of command across different agencies and within individual agencies. These problems exacerbated the challenges of coordinating across all levels of government and prevented overall unity of command.

One of the factors that impaired command and control was the lack of communications and situational awareness. While the reasons for these deficiencies were detailed previously (see the COMMUNICATIONS chapter), their impact was to paralyze normal command and control mechanisms. Local governments in many locations in Louisiana and Mississippi lost all communications capabilities for some period. This prevented them from communicating their situation and needs to the state level.

The state EOC in Louisiana experienced its own communications problems. State officials in the EOC could not reliably communicate with local officials, other state officials, or federal officials. Similarly, the federal government lost some communications, and initial efforts to bring in supplemental capabilities to improve command and control were unsuccessful. Other key factors that impaired command and control can be traced to a lack of sufficient qualified personnel, inadequate training, and limited funding.

The lack of effective command and control, and its impact on unity of command, degraded the relief efforts. Delays and otherwise poor assistance efforts caused by a lack of command and control are documented in this and other chapters. They include:

AP PHOTO/ERIC GAY

- delayed and duplicative efforts to plan for and carry out post landfall evacuations at the Superdome;
- uncoordinated search and rescue efforts that resulted in residents being left for days without food and water;
- separate military commands for the National Guard and Department of Defense (DOD) active duty troops;
- confusion over deliveries of commodities because some officials diverted trucks and supplies without coordination with others;

- lack of clarity as to who was assisting hospitals to evacuate; and
- the collapse of the New Orleans Police Department and its ability to maintain law and order.

Finding: Command and Control was impaired at all levels of government

Command and control are key aspects of emergency management

Command and control are key aspects of emergency management, and the federal government has taken several steps to promote unity of command among local, state, and federal authorities. For example, the National Incident Management System (NIMS) was developed in 2004 to enable all responders, regardless of jurisdictions or discipline, to effectively and efficiently work together. The NIMS "provides a nationwide template enabling federal, state, local, and tribal governments and private-sector and nongovernmental organizations to work together effectively and efficiently to prevent, prepare for, respond to, and recover from domestic incidents regardless of cause, size, or complexity."[1]

In addition, NIMS incorporated the ICS, which has been in existence since the early 1970s. ICS is the standardizing scalable concept designed to provide for an integrated and organized structure while eliminating jurisdictional boundaries.[2] The National Response Plan (NRP) calls for the implementation of NIMS and the ICS upon activation of the NRP to ensure maximum flexibility of operation during the situation at hand.[3]

Optimal levels of coordination occur when there is unity of command, unity of effort, and an accepted chain of command. Unity of effort encompasses the concept that all parties to a mission should be focused upon the same agreed-to objectives and should work together to achieve them. Unity of command is the concept that an individual has only one superior to whom he or she is directly responsible, creating a clear line of supervision and command and control.

Chain of command furthers the concept of unity of command, creating a line of authority from the lowest ranking individual to those in command, establishing a highly effective and efficient system. It requires that orders are given only to those directly below an individual in the chain of command and orders are received from only those directly superior in the chain of command. Those at the appropriate level in the chain of command can then, as authorized, coordinate their activities with peers in their partner organizations.

Many local governments lost command centers or otherwise could not establish unity of command

Achieving unity of command — with local, state, and federal authorities all acting together seamlessly to plan and conduct emergency operations — is often a challenge during a major disaster. It was particularly so when Hurricane Katrina made landfall. Local

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governments' command and control was often paralyzed by the complete destruction of their entire emergency management infrastructure.

In Alabama, local counties had the least problems with command and control. Because Katrina turned to the west and hit Mississippi and Louisiana the hardest, Alabama counties were able to maintain their emergency management infrastructure. Both Baldwin and Mobile counties still had operating EOCs and generally were able to stay in contact with the state EOC.[4]

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In Mississippi, there was a massive storm surge that destroyed government facilities, making it very difficult for the local communities to establish command and control. According to FEMA's Federal Coordinating Officer (FCO) for Mississippi, Bill Carwile, much of the emergency management and public safety infrastructure was destroyed in the coastal counties.[5] Mayor of Waveland Tommy Longo said the city staged at various points around the city some of the resources it expected to need to respond to the storm's damage, and it also staged some of these resources about 10 miles north of the city as a backup in the event of a catastrophic event.[6] Despite the city's preparations, the hurricane destroyed these resources. The storm decimated all of Waveland's public buildings, severely limiting its ability to provide command and control and to mount a response to the storm.[7]

Similarly, Hancock County lost its EOC—the location from which it expected to provide command and control for the county's response to the storm—because of severe flooding early on in the hurricane.[8] Pearl River County also lost its EOC in the early hours of the storm due to wind and water damage that knocked out its emergency backup generator and caused other damage, making the center inoperable.[9]

In Louisiana, there was a similar level of destruction to the basic emergency management infrastructure at the parish level. Many of the parish EOCs and public safety facilities were wiped out or flooded.[10] While Jefferson Parish was hard hit, it was in better shape to respond because it had protected its EOC. Jefferson Parish Emergency Manager Dr. Walter Maestri explained the EOC was in a hardened facility — an old incinerator with cement walls — with the command center, living quarters, and emergency generator all on upper floors.[11] While the EOC suffered immediate problems with communications being down, and it eventually had a shortage of fuel for its generator, it was able to keep operating at some level.[12]

Lack of command and control was particularly a problem in New Orleans. The authorities in the city lost their command and control facilities after the levee breaches and subsequent flooding. The city abandoned its EOC when City Hall was flooded and the emergency generator was flooded, cutting out power.[13] As discussed in more detail in the LAW ENFORCEMENT chapter, the New Orleans Police Department headquarters and district stations were flooded, crippling command and control for that department.[14] Similarly, the Louisiana National Guard, with headquarters at Jackson Barracks in New Orleans, lost its command and control due to flooding and had to abandon its operations center and re-establish it in an elevated parking structure at the Superdome.[15] According to Lieutenant General H. Steven Blum, Chief of the National Guard Bureau, "…Jackson Barracks flooded at the most inopportune time, and he [Major General Landreneau—the Louisiana Adjutant General] had to relocate in the middle of trying to gain situational awareness and coordinate the response."[16] Thus, in New Orleans, for at least some period of time, emergency managers, the police, and the military lost command and control over their own personnel and lost unity of command with the other local, state, and federal agencies that needed to be involved in the relief efforts.

Even where there was still some infrastructure in place and communications were less of a problem, local command and control suffered from lack of clarity. The most notable example of this was at the Superdome in New Orleans. Although there were both National Guard and New Orleans Police Department officials on site to physically establish a unified command and personally talk to each other face to face, there was no consensus on who was in charge. Louisiana National Guard officers who ran security operations at the Superdome, Colonel Mark Mouton and LtC. Jacques Thibodeaux said the New Orleans Police Department had the lead for command and control.[17] They stated that the National Guard was there in support of the police.[18]

These statements directly conflict with New Orleans Police Department comments that the National Guard had the lead for command and control at the Superdome. Deputy Chief Lonnie Swain, the senior New Orleans Police Department officer at the Superdome, said the National Guard always had the lead for command and control at the Superdome and the police were there in support of the military.[19] In support of this position, New Orleans officials said the Superdome was a state facility, so a state agency (the National Guard) would naturally be in charge.[20]

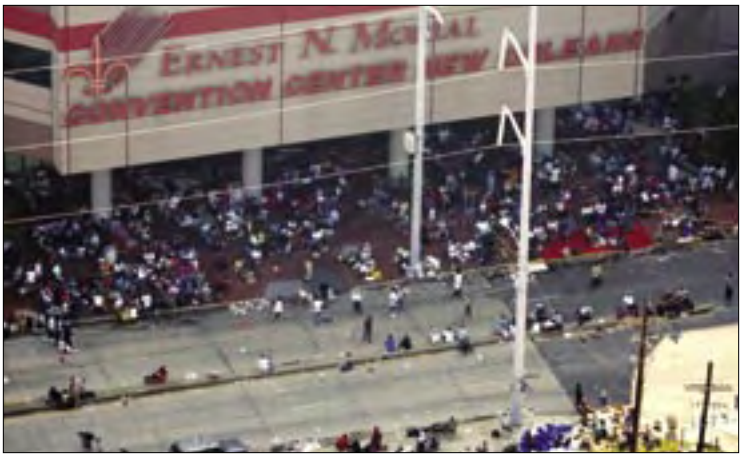
One FEMA official, Deputy FCO Scott Wells, also said there was no clear unity of command at the Superdome.

He said he arrived there on Wednesday, August 31, and when he tried to contact the leadership at the location to coordinate FEMA activities, he found "nobody in charge, and no unified command."[21] For example, he said there was no organization or structure to collect requests, prioritize them, and pass them on to the next appropriate echelon. He described the conditions as "chaotic" and said there appeared to be no one planning the next steps.[22]

The Cloverleaf was another location in New Orleans where the command and control structure was unclear. Louisiana State Police officials Ralph Mitchell and Joseph Booth stated that one government agency (they did not know which one) set up a medical triage and treatment center at the Cloverleaf on Wednesday, August 31.[23] Crowds grew there as people came to the dry land on their own accord or were dropped off by the helicopters or boats that rescued them from the water.

On Thursday, September 1, medical patients were evacuated, but the rest of the crowd grew to about 6,000-7,000 people. By Thursday afternoon and evening, the crowd started getting restless. At one time, there were 60 state police officers there, in addition to National Guard troops. The two officials — who had been on site — said they did not know who was in charge of command and control or which agency had set up the medical triage center there in the first place.[24] Later on Thursday night and Friday morning, some relief came from FEMA and the National Guard, and the Cloverleaf was completely cleared by Saturday, September 3.[25]

The Convention Center, discussed in more detail in the EVACUATION chapter, suffered from no official presence at all. There was not even an attempt to establish command and control there until the rescue mission arrived on Friday, September 2 (four days after landfall).[26]



AP PHOTO/DAVID J. PHILLIP

While there may have been some type of command structures set up at both the Superdome and the Cloverleaf, they do not appear to have been effective. The fact that the senior officials who were stationed at or visiting these locations disagreed on who was in charge, could not find out who was in charge, or did not know who was in charge, shows there was a significant lapse in command and control and demonstrates there was little unity of command at these locations in New Orleans.

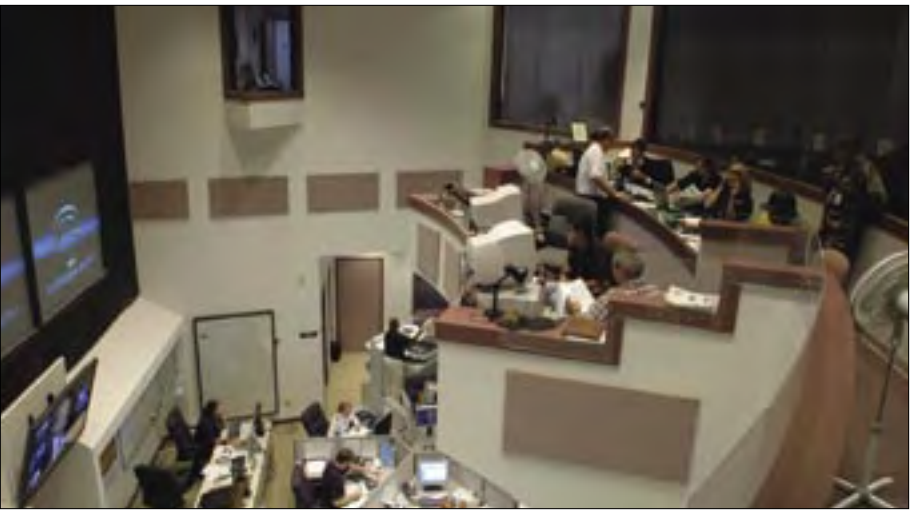
State government unity of command was impaired by the magnitude of Katrina and other operational factors

While state command and control facilities (such as their EOCs) were generally intact after landfall, the magnitude of the storm and a variety of operational factors impaired their unity of command.

Again, Alabama encountered the fewest command and control problems because it was least affected by Katrina. According to Alabama Emergency Management Agency (EMA) Director Bruce Baughman, the state EOC was up and running, with effective command and control throughout the hurricane and its aftermath. Unlike Louisiana (discussed below) where the parishes and EOC lost use of their emergency management software, Alabama used its software effectively. The software, known as "EM 2000," was used by county EOCs to send requests for assistance and by the state EOC to task appropriate state or federal agencies and to track the status.[27] Select Committee staff were able to review the EM 2000 database and confirm the system was effectively used to track and close out many of the local requests.

Many examples demonstrate the effectiveness of Alabama's EOC and the EM 2000 system. On August 29 at 9:30 p.m. the Mobile Police Department requested vehicles for search and rescue operations. This task was marked complete in the EM 2000 database in a little over one hour at 10:41 p.m.[28] Earlier on August 29, Baughman ordered 40 truck loads of ice and 40 truck loads of water from Lipsey Water. This task was marked complete by 2:00 p.m. the next day.[29] At 6:41 p.m. on August 29, Baldwin County EMA requested, through EM 2000, five generators for use at water wells. This task was marked complete at 9:16 am the next morning.[30]

When some FEMA requests were made, however, they were not immediately addressed. On August 29, Mobile



FEMA

County EMA Director Walter Dickerson requested two FEMA operations personnel and two FEMA logistics personnel to augment his staff. This need was not addressed until September 21.[31] Similarly, on August 30, when Monroe County requested shelter supplies from FEMA, it had to wait for six days for the task to be closed. 150 cots were needed in addition to a self-contained shower and bath trailer.[32]

The Select Committee encountered severe disagreements about whether the State of Louisiana maintained effective unity of command. Some FEMA officials were very critical of Louisiana's command and control. Michael Brown, Director of FEMA during Katrina, called the state of Louisiana "dysfunctional" and said it did not have unity of command.[33] Brown cited this as one of the main reasons for delays in relief efforts in Louisiana and New Orleans.[34]

In addition, Wells said there was no unity of command in the EOC. Wells was particularly critical of the state for not practicing unity of command with the federal government's planning and coordination efforts.[35] Wells said state officials were "preoccupied with the evacuation" and would not participate in critical pre-landfall "hasty" planning in other areas such as (1) search and rescue, (2) rapid assessment teams, (3) medical evacuation, (4) sheltering and temporary housing, (5) commodity distribution, and (6) debris removal.[36]

According to Wells, these "hasty plans" would have helped guide the course of activities for the first couple of days after landfall, when situational awareness was weak and before more deliberate planning could take place.[37] FEMA went ahead and developed the hasty plans, but without the benefit of state EOC personnel participating. He said such state personnel should have participated because they had expertise in state and local conditions and capabilities.[38]

The only exception to this was the commodity distribution hasty plan. Wells said that was the only plan the state worked with FEMA to develop before landfall.[39] As another example, Wells cited the incident (covered in more detail in the MILITARY chapter) where the Louisiana Adjutant General requested DOD active duty forces directly without going through or even notifying FEMA.[40] Instead of practicing unity of command, Wells said the state bypassed FEMA for federal assistance, then later complained FEMA did not know what was going on, and that FEMA could not coordinate the federal effort.[41]

Other FEMA officials were not as harsh in their criticisms of Louisiana. Bill Lokey, the FEMA FCO in the state EOC, said there was at least a minimum level of command and control and unity of command, to the extent the various parties were working together to set common priorities for common objectives.[42] Lokey attributed any lack of unity of command and control to a variety of operational factors (detailed below) and the catastrophic nature of the event.[43]

Similarly, another FEMA official who was in the EOC and in New Orleans, Deputy FCO Phil Parr, said some level of chaos occurs in any disaster, so it was not particularly unusual that the EOC seemed chaotic under the circumstances.[44] As discussed in the next section, Lokey and Parr both stated that not only was the state government overwhelmed by the magnitude of the disaster, but the federal government was overwhelmed as well.[45]

Louisiana state officials, including State Coordinating Officer (SCO) Jeff Smith, countered FEMA criticisms by saying the EOC was fully functional.[46] Smith said it was always clear who was in charge at the EOC: the SCO.

Michael Brown, Director of FEMA during Katrina, called the state of Louisiana "dysfunctional" and said it did not have unity of command.

He also maintained the EOC and the state did maintain unity of command.[47] In response to then-FEMA Director Brown's comment that he arrived at the EOC and could not figure out who was in charge, Smith said that such comments were "just plain bull."[48] Smith stated — and Lokey concurred — that the SCO and FCO worked closely together throughout the crisis.[49] Smith also provided the Select Committee with a photo taken during the crisis of Lokey and Smith together in the EOC.[50] According to Smith, "if FEMA Director Michael Brown had wanted to find out who was in charge of the EOC, all he had to do was find his FEMA FCO, because I was standing right next to him."[51]

The Select Committee attempted to make an independent determination of the effectiveness of command and control in the EOC by listening to conference calls between the EOC and parishes.[52] Based on a review of pre-landfall conference calls, the EOC appeared to be organized and unified to the limited extent this could be determined through these calls.[53] For example, the SCO was clearly in charge of coordinating state and parish activities and managing all discussions and decisions in an orderly and logical fashion.[54] Participation in the calls was very broad, to include multiple state agencies, more than a dozen key parishes, federal agencies, other states, and the American Red Cross. In addition, every organization got its opportunity to talk, and there was time for each organization to ask questions. It appeared pre-landfall decisions and issues were fully vetted among the participants. However, these conference calls do not cover the period just after landfall — the most critical and challenging time for establishing and maintaining command and control.[55]

Despite the disagreements over the degree of effective command and control in the state EOC, federal and state officials both cited several operational factors that made unity of command difficult to maintain. Among the most significant factors were a lack of communications and situational awareness and a lack of sufficient qualified personnel, inadequate training, and limited funding. These are described later in this chapter as separate findings. The other operational factors impairing command and control in the state EOC, described by a number of federal and state officials, included the following:

- **Katrina's late turn toward Louisiana:** State officials indicated that Katrina had taken a "dramatic shift" toward Louisiana on Friday (August 26). They said they were not fully aware of the situation until Saturday and were therefore not as prepared as they otherwise would have been.[56]
- **Overwhelming number of requests:** The size of Katrina and the destruction she wrought was immense, including the flooding of New Orleans and subsequent problems with security and the post-landfall evacuation. All of these circumstances led to an overwhelming number of requests for assistance.[57]
- **Overcrowding in the EOC:** The EOC building and main room were very crowded by the large contingent of state and federal officials. [58] The EOC main room has a capacity of about 50 people, but there were about 200 people. The EOC building as a whole was also overcrowded with about 750-1,000 people in it. There were only 12 Emergency Support Function (ESF) rooms for 15 ESFs. State officials cited the size of the current Joint Field Office (JFO) (in an old department store with thousands of staff) as an indication of the amount of physical space and number of people needed to run an operation the size of Katrina.[59]
- **EOC Information Technology was overloaded:** The Information Technology system was overloaded by the number of additional computers logged in and the volume of information processed. This was slowing down and destabilizing the system, and officials had to add two servers in the middle of the response.[60]
- **Deviation from normal procedures:** Due to the overwhelming number of requests and degraded

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FEMA should have been more sympathetic and provided more assistance when it was clear Louisiana was overwhelmed by the size of Katrina's devastation.

communications, officials had to deviate from normal procedures for requesting assistance.[61] The federal government contributed to this problem by also deviating from normal procedures. Specifically, other federal agencies tasked FEMA directly rather than putting requests to the parishes in the first place so they could go through the normal process (e.g., from the parish to the state and then to FEMA to be mission-assigned to other federal agencies.)[62]

- **Freelancing by other federal, state, and local agencies:** State officials said, and a FEMA official confirmed, that federal agencies were "freelancing," or just showing up without coordinating with the appropriate authorities at FEMA or the state. They would bypass the command structure and just appear in the EOC.[63] In addition, several freelancers showed up from other state and local agencies, again, without coordinating with the appropriate authorities. They too would just appear in the EOC not knowing what to do.[64]
- **Visits by politicians and celebrities:** Several elected officials from the state and national levels showed up in the EOC. While they just wanted to see what was going on and were trying to help, their presence distracted the EOC personnel.[65] There were similar visits by celebrities such as Oprah Winfrey and Sean Penn.[66] Most visits by elected officials and celebrities had large media crews covering them, further distracting the EOC personnel from their more urgent tasks.[67]

State officials who directed operations in the EOC — Col. William Doran and Mr. Jim Ballou — noted that with all of these operational factors, it would be easy for an outsider to conclude the EOC was a chaotic place.[68] In response to criticism from FEMA's Michael Brown, these two state officials (as well as the SCO Smith) said some level of confusion was to be expected in the EOC under the circumstances. They said FEMA should have been more sympathetic and provided more assistance when it was clear Louisiana was overwhelmed by the size of Katrina's devastation.[69]

Federal government also lacked unity of command across and within agencies

Like the states, the federal government also struggled to maintain unity of command across and within agencies. According to Louisiana SCO Smith, the federal government did not follow its own plan, the NRP, which calls for a unified command. In his prepared statement before the Select Committee, Smith stated "[a]nyone who was there, anyone who chose to look, would realize that there were literally three separate Federal commands."[70] Smith's statement goes on to describe these three separate command structures:

- FCO and Joint Field Office (JFO): This was the unified joint command with the FCO (Lokey) and SCO (Smith) located initially at the state EOC, then moved to the Joint Field Office (in the old department store) once that was established.[71] The FCO, by doctrine, is the individual that is supposed to be in charge of all federal response operations, and only the FCO has the authority to obligate federal funds.[72]
- Principal Federal Official (PFO): Smith said that "[t]he Primary *[sic] Federal Officer (PFO)* by doctrine is not supposed to be an operational person directly involved in response activities . . . . The PFO in Katrina went operational and began directing and guiding response operations and to a large degree left out the Federal Coordinating Officer (FCO)."[73] This was inconsistent with the NRP: "The PFO cell was operating on its own, communicating directly with the Governor, communicating directly with the Mayor of New Orleans and a myriad of other local elected officials," Smith said.[74]
- Joint Task Force Katrina: This command was intended to serve DOD active duty forces. According to Smith, "[w]henever the task force commander of Hurricane Katrina, General Honoré, came onto the scene, he was also operating independently with little regard whatsoever for the Joint Field Office, which should have been the only unified command."[75]

The Select Committee found ample evidence supporting the view that the federal government did not have a unified command. For example, FEMA officials Lokey and Wells supported Smith's position, saying the PFO was not supposed to have an operational role and

Lokey said the federal government and particularly FEMA, were overwhelmed. Overwhelmed organizations cannot achieve unity of command.

was not supposed to bypass the FCO.[76] They stated the initial PFO, Michael Brown, followed protocol. However, the second PFO, Coast Guard Admiral Thad Allen, immediately began directing operations and established a separate command in New Orleans, set apart from the SCO and FCO in the Joint Field Office. Both FEMA officials said Allen's direction of operations as a PFO exceeded his authorities as enumerated in the Stafford Act.[77]

Eventually Allen was appointed FCO in addition to PFO.[78] As Smith noted, "DHS in essence acknowledges that there was a problem …when DHS appointed the PFO as the FCO as well. DHS discovered the PFO did not have the authority to obligate money. Only the FCO has authority to obligate money."[79] This issue also arose in an April 2005 national level exercise sponsored by DHS called TOPOFF 3, where there was confusion over the different roles and responsibilities performed by the PFO and FCO.[80] The PFO issue is also discussed in detail in the NATIONAL FRAMEWORK chapter.

FEMA officials also acknowledged that DOD frequently acted on its own, outside the established unified command. Lokey said Honoré was directing activities from his JTF Katrina command ship (the USS Iwo Jima, docked pier-side in Orleans) without coordinating with the FCO at the state EOC and later the Joint Field Office.[81] He said Honoré, like the PFO was coordinating directly with local parishes and was accepting taskings from them, which violated established federal protocols.[82] Requests for assistance are supposed to go from the local level, to the state SCO, then to the FEMA FCO, and if appropriate, then to the Defense Coordinating Officer for DOD support.[83] Some may forgive Honoré for bypassing this process because it was broken and therefore unworkable after Katrina (as we discuss in the NATIONAL FRAMEWORK chapter). In fact, Lokey praised Honoré for "doing what had to be done to get things moving."[84] However, one of the results of Honoré's *modus operandi* of acting independently was further impairing FEMA's ability to maintain unity of command across the federal government. Assistant Secretary of Defense Paul McHale testified that "[m]ilitary command and control was workable, but not unified."[85] Additional difficulties between FEMA and DOD are discussed in the MILITARY chapter.

In addition to the problems with establishing and maintaining a unified command with DOD, FEMA struggled to establish a unified command with other organizations within DHS. According to Wells, the Coast Guard did not fuse their command in the search and rescue operation with the state and FEMA. Wells stated that for "the U.S. Coast Guard, who had junior officer representation but no authority to direct search and rescue air operations, all operations were directed by senior Coast Guard officers from another location. These officers refused to meet and conduct joint search and rescue operations with FEMA and state agencies."[86] Captain Bruce Jones, the Coast Guard officer in charge of air operations, commented that airborne search and rescue was sufficiently coordinated between the Louisiana National Guard's Task Force Eagle at the Superdome and the Coast Guard's air operations center at Belle Chasse Naval Air Station and that having two incident commands was an effective way to divide the work load.[87] Regardless of the positive outcome of saving lives, there was not unity of command across the function of search and rescue.

In addition to its problems coordinating with other federal agencies, FEMA had problems coordinating its own activities. Because most communications systems were impaired, Lokey could not talk directly with his advance team leader in New Orleans, Parr.[88] Thus, they were unable to coordinate their activities. As another example, Lokey and his staff in the EOC did not know another FEMA official, Marty Bahamonde, was in New Orleans during and immediately after landfall until they were informed by FEMA headquarters on late Monday, August 29. Before that time, they did not even know Bahamonde was there or what his function was.[89] More generally, Lokey said the federal government and particularly FEMA, were overwhelmed.[90] Overwhelmed organizations cannot achieve unity of command.

Louisiana EOC conference calls provide additional evidence there was a lack of coordination within FEMA.[91]

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Once emergency communications were restored and the Louisiana EOC restarted its conference calls with the

parishes on September 9, it was clear FEMA activities were not well-coordinated. The September 9 call recorded a discussion in which Smith stated FEMA's "right hand is not always knowing what the left hand is doing."[92]

Parish officials agreed with this assessment and provided several examples. They noted the local FEMA representatives (situated in the parish EOCs) were working hard to resolve their problems, but that "other FEMA people just keep showing up."[93] The call indicates some FEMA officials were making commitments to various local elected officials, without coordinating with the FEMA FCO, the state EOC, or the parish EOC. One parish official said this situation was "creating downright chaos."[94]

Temporary housing was cited as a particular area where FEMA coordination was unacceptable to the state and parishes. According to Smith, a FEMA regional housing team was not coordinating with the JFO. Smith said he "blew his top" that morning because these FEMA regional officials were bypassing the state and parish EOC process in planning for temporary housing. FEMA needs to have appropriate state and parish representatives involved in any FEMA discussions of temporary housing, he said. Smith told the parishes the FEMA FCO needs to "ride herd" on the FEMA regional housing group so they follow established procedures.[95]

Finding: Lack of communications and situational awareness paralyzed command and control

Localities, without communications, could not participate in unified command

One of the key factors that impaired command and control was the lack of communications and situational awareness. While the reasons for these deficiencies were detailed previously (see the COMMUNICATIONS chapter), their impact was to paralyze normal command and control mechanisms. Many local governments in Mississippi and Louisiana lost all communications capabilities for some period. This prevented them from communicating their situation to the state level.

Alabama, as noted before in this chapter and the COMMUNICATIONS CHAPTER, experienced relatively few communications problems. Federal and state

FEMA

officials alike concluded their communications capacity functioned well during their response to Katrina.[96] The Alabama EMA has various communications redundancy programs to ensure that it maintains a high level of connectedness throughout the state. The EOC has equipment and trained personnel to communicate over all types of communications networks, including satellite, 800 MHz digital phone service, amateur radio, and others. Communications systems and capabilities are viewed by AEMA staff as a strength, and during Katrina, this redundancy proved effective. That said, the goal of true interoperability within and among county emergency response and law enforcement agencies remains elusive since each county has its own authority and timetable to procure communications technology.[97]

In Mississippi, most land-based communications systems, including cellular phones, were inoperable. According to Mississippi's EMA Director, Robert Latham, voice and data systems statewide were also inoperable.[98] As a result, often the only communications capability present in Mississippi — for both the state EMA as well as the affected counties — was through satellite phones and

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radios, which operate by connecting to satellites rather than routing calls through land-based lines or cellular towers. Despite FEMA efforts to bring in additional communications capabilities to the affected counties' EOCs, Carwile reported that communications capabilities were far short of what was needed to be effective.[99]

To illustrate the problem in Louisiana, the EOC uses conference calls as a way to provide command and control and ensure unity of effort among the state and effected parishes. However, after the conference call during landfall on Monday morning, August 29, the parishes lost their communications capabilities and were unable to convene another conference call until 11 days later, on Friday, September 9.[100] Even then, the participants in the conference call noted that it was still hard to make regular phone calls.[101]

State of Louisiana officials lost local input to unified command, and were unreachable for coordinating activities

The state EOC in Louisiana experienced its own communications problems, with officials in the EOC unable to communicate reliably with local officials, other state officials, or federal officials.[102] In one conference call, Smith noted that part of the problem was the state EOC had not been wired for the volume of communications required for a major catastrophe.[103] Many e-mails noted the difficulty of communicating with the state EOC. As one example, a U.S. Northern Command (NORTHCOM) e-mail that laid out the procedures for requesting DOD assistance through the Defense Coordinating Officer in the EOC also emphasized the EOC telephone appeared to be continuously busy.[104]

Federal government also lost communications and failed in initial efforts to improve command and control

Similarly, the federal government lost some communications, and initial efforts to bring in supplemental capabilities to improve command and control were unsuccessful. For example, FEMA has a mobile command and control suite, named Red October, which is housed in an oversized tractor trailer.[105] Lokey and his staff said during Hurricane Katrina, Red October was pre-deployed to Shreveport, in northern Louisiana, to keep it out of harm's way but also to allow rapid movement into Baton Rouge or New Orleans after the hurricane passed.[106] Red October, once deployed and opened up, had a command and control suite with about 30 work stations and robust communications.

As the situation unfolded in New Orleans, and the flooding destroyed much of the command and control capability of the city, FEMA officials decided to move Red October to New Orleans to provide on-site command and control to its advance team and to help connect with New Orleans and National Guard authorities at the Superdome.[107] However, while some tractor trailers were able to get into the flooded city, Red October was unable to do so because of its oversized dimensions. Other FEMA communications vehicles, such as the Mobile Emergency Response Support detachments, noted in the COMMUNICATIONS chapter, were not capable of driving through the floodwaters without damaging their sensitive electronic equipment. Therefore, FEMA was unable to use these to restore command and control with its forward team in New Orleans, led by Parr.[108]

Finding: A lack of personnel, training, and funding also weakened command and control

A lack of sufficient personnel hindered command and control

The lack of trained, professional personnel at both the state and federal level greatly hindered the response. According to FEMA, the Louisiana Office of Homeland Security and Emergency Preparedness (LOHSEP) had an inadequate staff, both in numbers and training. "There were too few professional staff" provided by the state, according to Wells.[109] The FCO Operations Chief, Tony Robinson, agreed, saying the EOC had only 40 full-time trained staff, leaving only 20 staff to operate in 12 hour shifts.[110] Twenty people were far too few to run the EOC during a large disaster and the state should have developed a surge capacity, Robinson said.[111]

Wells said LOHSEP's supplemental staff were inadequately trained, and LOHSEP relied too heavily on the Louisiana National Guard troops to work the EOC.[112]

He characterized the guardsmen as well meaning but not trained to be professional emergency managers.[113] Wells cited this as one of reasons the state EOC personnel did not understand the unified command under the ICS.[114] Robinson also said the ability to effectively operate decreased as the state's cadre of professional emergency managers was augmented by these inexperienced guardsmen.[115] FEMA was also significantly short on available trained staff to send into the field.[116] Finally, Wells stated that "[w]e did not have the people. We did not have the expertise. We did not have the operational training folks that we needed to do our mission."[117]

A lack of training also hindered command and control

In Louisiana the lack of adequately trained personnel was also a major impediment to utilizing ICS and achieving effective command and control over state and federal resources. Wells said the state personnel lacked overall discipline, lacked clear control lines of authority, lacked a clearly understood command structure, and lacked consistency in operational procedures.[118] "If people don't understand ICS, we can't do ICS. And if we can't do ICS, we cannot manage disasters," he stated in testimony before the Senate.[119]

Valuable time and resources were expended to provide on-the-job training in ICS to state personnel assigned to the emergency operations center in Baton Rouge.[120] Wells noted that state officials hired a consultant to teach their EOC staff about ICS after landfall.[121] Specifically, the state hired former FEMA Director James Lee Witt as a consultant, and one of Witt's staff (a former FCO) was training the state staff in the EOC on Tuesday and Wednesday, August 30 and 31.[122] Wells said it was ridiculous to try to teach unified command after the hurricane had hit when everyone in the EOC should have already known it by then; at that point, it was too late, and the training created additional confusion in the EOC, Wells said.[123]

In Mississippi, ICS issues were less of a problem. According to Carwile, "[t]here had been training previous to Hurricane Katrina by the Mississippi Emergency Management Agency on down to the county emergency managers. So, it worked well."[124]

Inadequate funding cited as reason for inadequate personnel and training

As addressed more fully in the FEMA PREPAREDNESS chapter, the lack of adequate staff and insufficient training are directly attributable to limited funding for FEMA operations. For example, the funding for training exercises is, and has been deficient. This is evident in the lack of coordination of FEMA staff. According to Carwile, training funding for national emergency response teams dried up in 2003.[125] Teams sent to the Gulf coast never had an opportunity to train together beforehand. Prior to activation, the teams were nothing more than names on rosters. This contributed greatly to the inefficient and timely delays in the initial federal response. Senator Joe Lieberman described the training and funding issues as "a FEMA disaster waiting to happen because we weren't giving [FEMA] the resources to get ready for this."[126]

Senator Joe Lieberman described the training and funding issues as "a FEMA disaster waiting to happen because we weren't giving [FEMA] the resources to get ready for this."

Finding: Ineffective command and control delayed many relief efforts

The lack of effective command and control, and its impact on unity of command, degraded the relief efforts. Moreover, the problems experienced individually by the local, state, and federal governments exacerbated the challenges of coordinating across all levels of government and prevented overall unity of command.

The evacuation of the Superdome provided one of the clearest examples of how ineffective command and control and the lack of unity of command hindered urgently needed relief. It was planned multiple times by different parties. On the day after Katrina's landfall, Parr worked with the Louisiana National Guard to devise a

FEMA

plan for evacuating the Superdome through the use of Chinook and Blackhawk helicopters.[127] After working through most the night, the plan was ready for execution Wednesday morning. Parr and the Louisiana National Guard officer working with him estimated it would take 30 hours to completely evacuate the Superdome. However, earlier that day Blanco had instructed Landreneau of the Guard to contact Honoré of Northern Command to arrange for active duty military support of response operations in Louisiana.[128]

This request was made outside the unified command and without the knowledge of FEMA and Parr. During the early morning hours of Wednesday, Landreneau instructed Louisiana National Guard officials at the Superdome to cease planning for the evacuation as Honoré would be "taking charge" of the evacuation project, thus bypassing the unified command and requirements that state requests to federal agencies go through FEMA to further coordinate and limit duplication.[129] Parr said this resulted in the evacuation of the Superdome population 24 hours later than would have occurred under the joint National Guard / FEMA plan put together at the Superdome.[130]

Other delays and poor assistance efforts caused by a lack of command and control, mainly in Louisiana, include:

- Search and Rescue. Search and Rescue efforts were uncoordinated. During the critical first days after Katrina and the flooding, there was no unity of command between the various local, state, and federal agencies participating in search and rescue efforts. While heroic efforts by these agencies immediately saved lives, there was little coordination of where the victims should be or actually were taken. This resulted in victims being left in shelters or out in the open on high ground for days without food and water. For more details, see the EVACUATION chapter.

"All levels of government have "a fundamental lack of understanding for the principals and protocols set forth in the NRP and NIMS."

- Military Support. Much of the military support was also uncoordinated. The Louisiana National Guard and DOD active duty forces, under Joint Task Force Katrina, were under separate commands. Federal attempts to bring them under the same command were rejected by the Governor. This resulted in delays in the arrival of DOD active duty troops—troops that provided a robust reservoir of manpower and a wide array of capabilities. For more details, see the MILITARY chapter.

- Medical Evacuations. There was confusion over which agencies or personnel were supposed to assist with hospital evacuations. Hospitals reported that Army and FEMA officials came and surveyed the situation and never returned despite saying that they would. This resulted in delays in evacuating patients, with sometimes fatal consequences. For more details, see the MEDICAL CARE chapter.

- Lawlessness in New Orleans. The New Orleans Police Department, in addition to losing hundreds of its personnel who did not report to duty, lost command and control over those that still reported to work. This resulted in delays in determining where problems were, dispatching officers to those locations, and otherwise planning and prioritizing operations to restore law and order. For more details, see the LAW ENFORCEMENT chapter.

Conclusion

In responding to Hurricane Katrina, elements of federal, state, and local governments lacked command, lacked control, and certainly lacked unity. Some of the reasons for this can be traced back to the magnitude of the storm, which destroyed the communications systems that are so vital to effective command and control. In addition, the magnitude of the storm created so much damage across such a wide area that it overwhelmed agencies and individuals who were struggling to mount an organized response.

But some of the lapses in command and control can be traced back to agencies and individuals demonstrating a *failure of initiative* to better protect their command and control facilities, better clarify command and control relationships on location, and better follow established protocols for ensuring unity of command. This problem of not following protocols is summed up well in a recent DHS-IG report on an exercise involving federal, state, and local governments: all levels of government have "a fundamental lack of understanding for the principals and protocols set forth in the NRP and NIMS."[131]

Finally, to some degree, lapses in command and control can be traced to a lack of sufficient qualified personnel, inadequate training, and limited funding. In total, these factors paralyzed command and control, leading to an agonizingly disjointed and slow response to the disaster. ■

[1] U.S. Dep't of Homeland Security, *National Response Plan*, (Dec. 2004) at 1 [hereinafter *NRP*].
[2] *Id*. at 66.
[3] *Id*. at 1.
[4] *See* Interview by Select Comm. Staff with Leigh Anne Ryals, Emergency Manager, Baldwin County [hereinafter Ryals Interview], in Washington, DC, via telephone from AL (Oct. 25, 2005); *see* Interview by Select Comm. Staff with Walter Dickerson, Emergency Manager, Mobile County [hereinafter Dickerson Interview], in Washington, D.C., via telephone from AL (Oct. 25, 2005).
[5] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Mississippi Before Select Comm.*, 109th Cong. (Dec. 7, 2005) at 5 (written statement of William L. Carwile) [hereinafter *Dec. 7, 2005 Select Comm. Hearing*].
[6] *Id*. at 125-127 (statement of Steve Longo).
[7] *Id*.
[8] Interview by Select Comm. Staff with Hootie Adams, Director, Emergency Management for Hancock County, MS, in Hancock County, MS (Oct. 14, 2005).
[9] Interview by Select Comm. Staff with Bobby Strahan, Director, Pearl River County Emergency Management Agency, in Washington, D.C., via telephone from MS (Nov. 29, 2005).
[10] Interview by Select Comm. Staff with Jeff Smith, Deputy Director, LA Office of Homeland Security and Emergency Preparedness [hereinafter Smith Interview], in Baton Rouge, LA (Nov. 7, 2005).
[11] Interview by Select Comm. Staff with Dr. Walter Maestri, Emergency Manager for Jefferson Parish, in New Orleans, LA (Nov. 8, 2005).
[12] *Id*.
[13] *See* Interview by Select Comm. Staff with Rex Macdonald, Information and Technology and Communications Director, Department of Public Safety and Corrections [hereinafter Macdonald Interview], in Baton Rouge, LA (Nov. 7, 2005); *see also* Interview by Select Comm. Staff with Terry Ebbert, Director of Homeland Security for the City of New Orleans [hereinafter Ebbert Interview], in New Orleans, LA (Nov. 9, 2005).
[14] Macdonald Interview; *see also* Ebbert Interview.
[15] *See* Interview by Select Comm. Staff with Jacques Thibodeaux, LtC, LA Nat'l Guard [hereinafter Thibodeaux Interview], in New Orleans, LA (Nov. 3, 2005); *see* Interview by Select Comm. Staff with Mark Mouton, Col, LA Nat'l Guard [hereinafter Mouton Interview], in New Orleans, LA (Nov. 3, 2005).
[16] *Hearing on Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama Before Select Comm.*, 109th Cong. (Oct. 27, 2005) at 194 (statement of H. Steven Blum) [hereinafter *Oct. 27, 2005 Select Comm. Hearing*].
[17] *See* Thibodeaux Interview; Mouton Interview.
[18] *Id*.
[19] Interview by Select Comm. Staff with Lonnie Swain, Deputy Chief New Orleans Police Department [hereinafter Swain Interview], in New Orleans, LA (Nov. 9, 2005).
[20] Ebbert Interview.
[21] Interview by Select Comm. Staff with Scott Wells, Deputy Fed. Cordinating Officer, FEMA [hereinafter Wells Interview], in Baton Rouge, LA (Nov. 9, 2005).
[22] *Id*.
[23] Interview by Select Comm. Staff with Ralph Mitchell, LA State Police [hereinafter Nov. 4, 2005 Mitchell Interview], in Baton Rouge, LA (Nov. 4, 2005); *see also* Interview by Select Comm. Staff with Joseph Booth, LA State Police [hereinafter Booth Interview], in Baton Rouge, LA (Nov. 4, 2005).
[24] Mitchell Interview; *see also* Booth Interview.
[25] *Id*.
[26] *See* Thibodeaux Interview; Swain Interview.
[27] *See* Interview by Select Comm. Staff with Bruce Baughman, Director, AL Emergency Management Agency [hereinafter Baughman Interview], in Clancy, AL (Oct. 11, 2005); *see also*, Interview by Select Comm. Staff with David Tranter, General Counsel for AL Emergency Management Agency [hereinafter Tranter Interview], Clanton, AL (Oct. 11, 2005).
[28] AL Emergency Management Agency EM/2000 Tracker System message 05-1992, (Aug. 29, 2005) (Doc. No. AL 002567).
[29] AL Emergency Management Agency EM/2000 Tracker System message 05-1969, (Aug. 30, 2005) (Doc. No. AL 002600).
[30] AL Emergency Management Agency EM/2000 Tracker System message 05-1948, (Aug. 30, 2005) (Doc. No. AL 002625).
[31] AL Emergency Management Agency EM/2000 Tracker System message 05-1974, (Sept. 21, 2005) (Doc. No. AL 002593).
[32] AL Emergency Management Agency EM/2000 Tracker System message 05-2096, (Sept. 5, 2005) (Doc. No. AL 002444).
[33] *Hearing on Hurricane Katrina: The Role of the Federal Emergency Management Agency before Select Comm.*, 109th Cong. (Sept. 27, 2005) at 32, 157 (statement of Michael Brown) [hereinafter *Sept. 27, 2005 Select Comm. Hearing*].
[34] *Id*.
[35] Wells Interview.
[36] *Id*.
[37] *Id*.
[38] *Id*.
[39] *Id*.
[40] *Id*.
[41] *Id*.
[42] Interview by Select Comm. Staff with Bill Lokey, FEMA Federal Coordinating Officer [hereinafter Lokey Interview], in Washington, DC (Dec. 2, 2005); *see also Hearing on Hurricane Katrina: Preparedness and Response by the State of Louisiana Before Select Comm.*, 109th Cong. (Dec. 14, 2005), at 229-230 (statement of Bill Lokey) [hereinafter *Dec. 14, 2005 Select Comm. Hearing*].

[43] Lokey Interview; *see also Dec. 14, 2005 Select Comm. Hearing* at 229-230 (statement of Bill Lokey).
[44] Interview by Select Comm. Staff with Phil Parr, Dep. Fed. Coordinating Officer, FEMA [hereinafter Parr Interview], in Washington, DC (Dec. 6, 2005).
[45] Lokey Interview; *see also Dec. 14, 2005 Select Comm. Hearing* at 196 (statement of Phil Parr).
[46] *See* Interview by Select Comm. Staff with LTC William Doran, Chief, Operations Division, LA Office of Homeland Security and Emergency Preparedness (LOHSEP) [hereinafter Doran Interview]; *see* Interview by Select Comm. Staff with Jim Ballou, Operations Division, LA Office of Homeland Security and Emergency Preparedness (LOHSEP) [hereinafter Ballou Interview], in Baton Rouge, LA (Nov. 7, 2005); *see also* Smith Interview.
[47] Smith Interview.
[48] *Id*.
[49] Smith Interview; *see also* Lokey Interview.
[50] *Dec. 14, 2005 Select Comm. Hearing*, Appendix: Photo Presentation Slide 26 (written statement of Jeff Smith).
[51] Smith Interview.
[52] *See generally* Audio recordings of Hurricane Katrina Conference Calls, Louisiana State Emergency Operations Center (Aug. 26 – Sept. 9, 2005).
[53] *Id*.
[54] *Id*.
[55] *Id*.
[56] *See* Doran Interview; Ballou Interview.
[57] *Id*. *see also* Lokey Interview; *see also* Parr Interview.
[58] *Id*.
[59] *Id*.
[60] *See* Doran Interview; Ballou Interview; *see also* Parr Interview.
[61] *See* Doran Interview; Ballou Interview; *see also* Lokey Interview; Parr Interview.
[62] *See* Doran Interview; Ballou Interview; *see also* Parr Interview.
[63] *See* Doran Interview; Ballou Interview; *see also* Lokey Interview; Parr Interview.
[64] *See* Doran Interview; Ballou Interview; *see also* Parr Interview.
[65] *See* Doran Interview; Ballou Interview; *see also* Lokey Interview; Parr Interview.
[66] Nicole Bode, *Sean Penn Gets into Rescue Act*, DAILY NEWS (N.Y.) (Sept. 8, 2005) at 6; Ryan Parry, *150 Hurricane Brits Missing*, MIRROR (London) (Sept. 5, 2005) at 1, 4 ("Last night [Sept. 04] TV's Oprah Winfrey arrived in New Orleans with 33 supply trucks.").
[67] *See* Doran Interview; Ballou Interview; *see also* Parr Interview.
[68] *See* Doran Interview; Ballou Interview; *see also* Lokey Interview; Parr Interview; Smith Interview.
[69] *See* Doran Interview; Ballou Interview; *see also* Smith Interview.
[70] *Dec. 14, 2005 Select Comm. Hearing* at 16 (written statement of Jeff Smith).
[71] *Id*.
[72] *Id*.
[73] *Id*.
[74] *Id*.
[75] *Id*.
[76] Lokey Interview; *see also* Wells Interview.
[77] *Id*.
[78] Smith Interview.
[79] *Dec. 14, 2005 Select Comm. Hearing* at 16 (written statement of Jeff Smith).
[80] Office of Inspector General, Dep't of Homeland Security, *A Review of the Top Officials 3 Exercise* (Rpt. No. OIG-06-07) at 1, 12 (Nov. 2005) [hereinafter *DHS IG Report*].
[81] Lokey Interview; Office of the Assistant Secretary of Defense: Legislative Affairs, DOD Support for Hurricane Katrina Relief: Executive Summary Mon., Sept. 12, 2005 as of 0700 (Sept. 12, 2005).
[82] Lokey Interview.
[83] *Id*.
[84] *Id*.
[85] *Oct. 27, 2005 Select Comm. Hearing* at 134 (statement of Paul McHale).
[86] *Hearing on Hurricane Katrina: Perspectives of FEMA's Operational Professionals Before Senate Comm. on Homeland Security and Governmental Affairs*, 109th Cong. (Dec. 8, 2005) at 45 (statement of Scott Wells) [hereinafter *Dec. 8, 2005 Senate Hearing*].
[87] Interview by Select Comm. Staff with Bruce Jones, Captain, Coast Guard, in Washington, D.C. via telephone from New Orleans, LA (Jan. 10, 2006).
[88] Lokey Interview; *see also* Parr Interview.
[89] *Id*.
[90] Lokey Interview.
[91] *See* Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Aug. 26 – Sept. 9, 2005).
[92] *Id*.
[93] *Id*.
[94] *Id*. It was not possible to determine exactly which parish official made this statement.
[95] *See* Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Sept. 9, 2005).
[96] *See generally* Ryals Interview; *see also* Dickerson Interview; Baughman Interview; Tranter Interview.
[97] Baughman Interview; *see also* Tranter Interview.
[98] *Dec. 7, 2005 Select Comm. Hearing* at 34 (statement of Robert R. Latham, Jr.).

[99] *Id*. at 7 (written statement of William L. Carwile).
[100] *See* Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Aug. 26 – Sept. 9, 2005).
[101] *See* Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Sept. 9, 2005).
[102] Macdonald Interview.
[103] *See* Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Sept. 9, 2005).
[104] E-mail correspondence from Clair Blong (DHS/FEMA NORAD USNORTCOM IC) to FEMA-NRCC and FEMA-HSOC Staff (Sept. 01, 2005 7:51 p.m.), citing e-mail correspondence from Nanette Nadeau (DAF NORAD USNORTHCOM), to Clair Blong, Sept. 01, 2005 (Doc No. DHS-FEMA-0028-0000685).
[105] Lokey Interview; *see also* Parr Interview.
[106] *Id*.
[107] *Id*. It is not clear which FEMA official ultimately approved this decision.
[108] Lokey Interview; *see also* Parr Interview.
[109] *Dec. 7, 2005 Select Comm. Hearing* at 5 (written statement of William L. Carwile).
[110] Interview by Select Comm. Staff with Tony Robinson, FEMA JFO Operation [hereinafter Robinson Interview], in Baton Rouge, LA (Nov. 10, 2005).
[111] Robinson Interview.
[112] Wells Interview.
[113] *Id*.
[114] *Id*.
[115] Robinson Interview.
[116] Wells Interview.
[117] *Dec. 8, 2005 Senate Hearing* at 58 (statement of Scott Wells).
[118] Wells Interview.
[119] *Dec. 8, 2005 Senate Hearing* at 46 (statement of Scott Wells).
[120] Wells Interview.
[121] *Dec. 8, 2005 Senate Hearing* at 46 (statement of Scott Wells).
[122] Wells Interview.
[123] *Id*.
[124] *Dec. 8, 2005 Senate Hearing* at 48 (statement of William L. Carwile).
[125] *Id*.
[126] *Dec. 8, 2005 Senate Hearing* at 61 (statement of Senator Joseph Lieberman).
[127] Parr Interview.
[128] *Id*.
[129] *Id*.
[130] *Dec. 8, 2005 Senate Hearing* at 70-72 (statement of Phil Parr).
[131] *DHS IG Report* at 1, 12.

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"In the early hours of Hurricane Katrina, and without regard to their own safety, and in many cases, knowing their own homes were probably destroyed, these great citizens of Louisiana began to go out, by helicopter and boat, to begin the massive search and rescue operations.

"Pulling residents from rooftops, out of attics, and directly from the water, the men and women of the Louisiana National Guard were there, saving thousands of lives …"

Major General Bennett C. Landreneau
The Adjutant General, State of Louisiana
Select Committee hearing, October 27, 2005

The military played an invaluable role, but coordination was lacking

Summary

The active and reserve components of the United States armed forces have a long and proud history of providing essential aid to the civilian populace of this country in the aftermath of natural disasters. There are several reasons the nation continues to rely on the military to perform this role. One is that the military is able to provide essential, life saving services more quickly and more comprehensively than any other entity when local and state response capabilities are overwhelmed, including the ability to provide helicopter and boat rescue, shelter, food, water, and medical support. Importantly, much of this capability is vested with the National Guard, and is thus an asset under the control of the governor of each respective state or territory and the District of Columbia.

As robust as the military capability is, there are limitations, many of which are highlighted in the specific findings below. The most important limit to the military's ability to manage domestic disaster response is the nation's traditional reliance on local control to handle incident response. The federal government, with the Department of Defense (DOD) serving as part of the federal response team, takes its directions from state and local leaders. Since that is our nation's tradition, DOD does not plan to be the lead agency in any disaster situation and expects to assist as local authorities request and direct. Furthermore, DOD lacks the detailed knowledge of local conditions essential to effective relief operations.

Even so, the element of the U.S. military with the longest tradition of service — the militia, now called the National Guard — is a particularly valuable asset to each state, territory, and the District of Columbia. Units can be called to active duty by the order of the governor and serve as the state's chief executive directs. Thus, the National Guard is responsive and will possess knowledge of local conditions. In contrast, the processes by which active military forces are brought to a region are lengthy and burdensome. When they arrive, these forces will not have detailed local knowledge and will be prohibited by law

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from performing law enforcement functions. In addition, there will be two distinct military chains of command — one for federal troops and one for National Guard troops under state command.

This dual chain of command structure, lengthy federal troop activation system, and, in the case of Katrina, devastated local authorities, contributed to a poorly coordinated federal response to Katrina. It would not be possible to anticipate all problems and prevent all the difficulties that ensued from a storm of this magnitude, but better planning, more robust exercises, and better engagement between active forces and the National Guard both before and during disaster response would have helped prevent human suffering. Two new organizations created after September 11, 2001, the Department of Homeland Security (DHS) and DOD's Northern Command, are integral parts of this process, and the growing pains were evident to the Select Committee. Northern Command is charged with managing the federal military response to disasters and DHS is in charge of the overall federal effort. Northern Command has taken strides, but needs better integration with FEMA and with the National Guard effort at disasters and emergencies. Clearly, more needs to be done.

Even though there were problems, the military played an invaluable role in helping the citizens of Louisiana, Alabama, and Mississippi respond to the devastation of Katrina and saved countless lives. Indeed, as Assistant Secretary of Defense for Homeland Defense Paul McHale testified:

> "The Department of Defense's response to the catastrophic effects of Hurricane Katrina was the largest military deployment within the United States since the Civil War."[1]

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There is no doubt DOD resources improved the national response to Katrina. Although trained and equipped for war fighting, there is enough commonality of expertise and equipment that made for a significant military contribution to the majority of Emergency Support Functions (ESFs) of the National Response Plan. DOD is the only federal department with supporting responsibilities in each of the fifteen ESFs.[2]

The Hurricane Katrina response also reinforced the National Response Plan's designation of the National Guard as the military's first responders to a domestic crisis.

> "In contrast to Hurricane Andrew (1992) in which National Guard forces constituted 24% of the military response, National Guard forces represented more than 70% of the military force for Hurricane Katrina."[3]

Number of National Guard and active Duty Personnel in Joint Operational Area of Hurricane Katrina

Date	National Guard	Active Duty
August 26	2,505	n/a
August 27	2,633	n/a
August 28	4,091	n/a
August 29	7,522	n/a
August 30	8, 573	1,000
August 31	11,003	2,000
September 1	13,113	3,000
September 2	16,928	4,011
September 3	22,624	4,631
September 4	30,188	10,952
September 5	32,760	15,204
September 6	42,990	17,417
September 7	45,420	18,342
September 8	48,560	19,749
September 9	50,116	21,408
September 10	50,116	21,168
September 11	48,045	22,028
September 12	48,280	22,670
September 13	45,791	22,232
September 14	45,063	18,690

SOURCE: NORTHERN COMMAND TIMELINE

Despite the immediacy of required action, confusion created by multi-intergovernmental agency activities and dual military responses, the men and women of the armed services came when they were called. And whether on the ground, in the air, or on the water, they worked extremely hard to save and offer aid to the victims of Hurricane Katrina.

There are a number of specific areas where better coordination mechanisms could have greatly improved the execution of military support during Hurricane Katrina. The protocols associated with sharing essential information, the coordinated movement of personnel and equipment, and prior joint planning and training are vital to an effective and comprehensive response.

Finding: The National Response Plan's Catastrophic Incident Annex as written would have delayed the active duty military response, even if it had been implemented

The National Response Plan (NRP) creates confusion about federal active duty military involvement due to unresolved tension between the possible need for active duty military assistance when state and local officials are overwhelmed, and the presumption that a governor will use his or her understanding of the situation on the ground to decide whether and when to ask for active duty military support.

A foundational assumption of the NRP's Catastrophic Incident Annex (CIA) is that local and surrounding jurisdictions' response capabilities may be insufficient as they could be quickly overwhelmed by an event. Despite this guiding assumption, NRP-CIA policy assumes that state/local incident command authorities will be able to integrate federal resources into the response effort. The NRP-CIA fails to reflect whether in a catastrophic incident, DHS should rely upon the same principle — the presence of local and state first responders for the first 48-72 hours of an emergency — as the non-catastrophic incident portion of the NRP. This failure would have delayed the federal military response and prevented full integration of the National Guard and active duty missions, even if the NRC - CIA had been involved.

Whether there exists an effective local and state response for the first 48-72 hours of a disaster is a critical element in determining the need for and extent of military involvement. Some point out that in cases of a major catastrophe, the President through the Stafford Act can designate and deploy federal resources without following NRP procedures. This view does not address if the NRP procedures in place in the event of a major catastrophe — whether or not the President chooses to federalize the response — are sound.

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Recognizing that federal resources might be required to augment overwhelmed state and local response efforts, the NRP-CIA establishes protocols to pre-identify and rapidly deploy essential resources that are urgently needed to save lives and contain incidents. Under the NRP-CIA, normal procedures for a number of the Emergency Support Functions (ESF) may be expedited or streamlined to address urgent requirements. These include: medical teams, urban search and rescue teams, transportable shelter, medical and equipment caches, and communications gear. Standard procedures regarding requests for assistance may be, under extreme circumstances, temporarily suspended.

One of the planning assumptions of the NRP-CIA is that a detailed and credible common operating picture may not be achievable for 24 to 48 hours after the incident. As a result, the NRP-CIA calls for response activities to begin without the benefit of a complete situation and critical needs assessment. Moreover, under this Annex, notification and full coordination with states should not delay or impede the rapid mobilization and deployment of critical federal resources.

Finding: DOD/DHS coordination was not effective during Hurricane Katrina

The Department of Homeland Security and the Department of Defense share responsibility for ensuring the security and safety of America. Since the establishment of DHS after 9/11, both departments have sought to define their roles and responsibilities.

McHale testified at a recent congressional hearing that he was the Defense Department's principal liaison with DHS.[4] A memorandum of understanding between DHS and DOD assigns 64 DOD personnel to DHS to fill critical specialties, principally in the areas of communications and intelligence. There is also a Homeland Defense Coordination Office at DHS headquarters, as well as around-the-clock DOD presence in the DHS Homeland Security Operations Center.

Despite these efforts to integrate operations, gaps remained in DOD/DHS coordination. During a BRAC Commission hearing conducted August 11, 2005, a commissioner asked Peter F. Verga, Principal Deputy Assistant Secretary of Defense (Homeland Defense), of the existence of any document issued by DHS that would help DOD determine the requirements for military assistance to civilian authorities. Verga replied: "To my knowledge, no such document exists."[5]

On August 30, an e-mail generated in the Office of the Secretary of Defense (OSD) indicated concern about the flow of information between DOD and FEMA and a lack of understanding of what was an official request for assistance and what was not.[6] Another e-mail from DHS to DOD on this day indicated Secretary Chertoff was requesting updated information on the levees in New Orleans, shelter information, and search

Communications between DOD and DHS, and in particularly FEMA, during the immediate week after landfall, reflect a lack of information sharing, near panic, and problems with process.

and rescue missions DOD was performing. The OSD response expressed wonder at why DHS was asking for this information, as FEMA had not yet even generated requests for these missions for DOD.[7] Communications between DOD and DHS, and in particularly FEMA, during the immediate week after landfall, reflect a lack of information sharing, near panic, and problems with process.[8] As time went on, and FEMA and DOD worked out Requests for Assistance (RFAs), and communications and information sharing did improve.[9]

These problems are indicative of a dispute between DOD and DHS that still lingers. DOD maintains it honored all FEMA requests for assistance in the relief effort, refusing no missions.[10] FEMA officials insist that notwithstanding the official paper trail, DOD effectively refused some missions in the informal coordination process that preceded an official FEMA request.[11] Therefore, when DOD thought a mission was inappropriate, FEMA simply did not request the assistance from DOD.

The reliance of FEMA on DOD during the Hurricane Katrina response, although not anticipated in scope, became at its most basic, a takeover of FEMA's responsibilities as the logistics manager for the federal response. According to Secretary McHale:

> During Katrina, the federal military remained under FEMA's control. It meant that the Defense Department, which had the resources to appraise the situation and prioritize its missions more quickly than could FEMA, actually drafted its own requests for assistance and sent them to FEMA, which copied them and sent them back to the Department of Defense for action.[12]

Finding: DOD, FEMA and the State of Louisiana had diffculty coordinating with each other, which slowed the response

The process for requesting DOD active duty forces has several layers of review and is understandably not well understood or familiar to state officials who rarely would need to request DOD support. Even though state officials do not routinely work with DOD, requests for DOD assistance are generated at the state level. These go from the state to FEMA's Federal Coordinating Officer (FCO), who in turn requests assistance from the Defense Coordinating Officer (DCO). The DCO passes these requests on to the joint task force, which routes them through Northern Command to the Office of the Secretary of Defense Executive Secretariat, to the Joint Directorate of Military Support on the Joint Staff. At each stage, the request is validated to ensure it can be met and that it is legal to provide the assistance. Once vetted, the request is tasked to the services and coordinated with Joint Forces Command, and forces or resources are then allocated to the joint task force, which in turn gets the support down to the user level by way of the DCO. This process is in place not only to satisfy DOD internal requirements, but to ensure maximum coordination with both FEMA and the state.

DOD's process for receiving, approving, and executing missions was called bureaucratic by Louisiana officials.[13] Despite the multiple layers of paperwork requirements described above, the Select Committee could not definitively determine the origin of the request for DOD to provide active duty forces. Louisiana officials said their Adjutant General made the request directly of General Russel L. Honoré — without coordinating the request through FEMA — the established process to request all federal assistance.[14] This request outside of normal channels may reflect frustration with the bureaucratic process.

Current FEMA FCO Scott Wells told Select Committee staff this direct state request to DOD was indicative of Louisiana not having a unified command during Katrina and created coordination problems during the response and recovery efforts.[15] Without a unified command, the system for requests for assistance was difficult. This difficulty was compounded by the scarcity of telephone

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communication capability remaining in Louisiana, resulting in a communications chokepoint at the EOC in Baton Rouge where the telephone was continuously busy.

Prior to the arrival of Honoré, senior FEMA officials were unable to get visibility on their requests. For example, former Undersecretary for Emergency Preparedness and Response and FEMA Director, Michael Brown, testified that he did not know what happened to some of his requests for assistance.[16]

While DOD officials testified in October that DOD was "leaning forward" and taking quick action prior to Katrina's landfall, FEMA officials said the DOD process appeared cumbersome.[17] Louisiana Governor Blanco's Chief of Staff Andy Kopplin said DOD was, in his opinion, slow and overly bureaucratic.[18] It appears that although DOD may have been doing the best it could with the system it had, Hurricane Katrina was of such magnitude that more rapid response was necessary. Although acknowledging that General Honoré operated outside normal FEMA-led channels, FEMA FCO William Lokey praised him for getting things done that Louisiana and FEMA could not.[19]

Finding: National Guard and DOD response operations were comprehensive, but perceived as slow

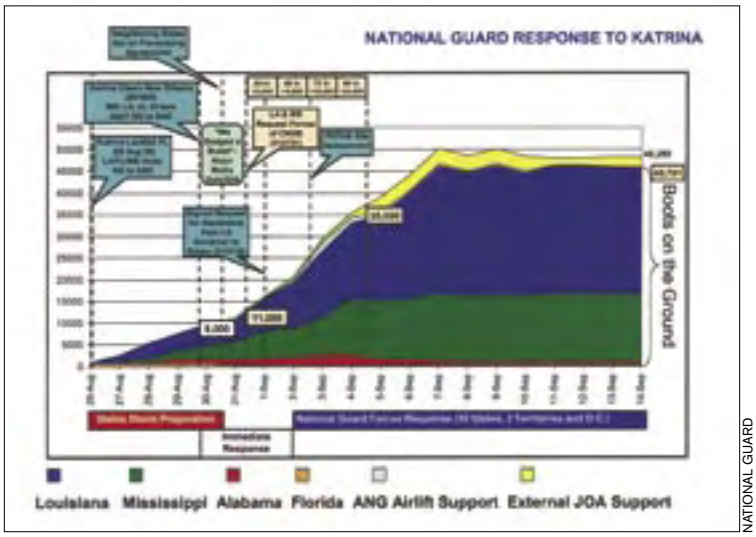
National Guard response

> "I am particularly proud of the timeliness and magnitude of the National Guard's efforts in advance of Hurricane Katrina and our response in its immediate aftermath. National Guard forces were in the water and on the streets of New Orleans rescuing people within four hours of Katrina's passing. More than 9,700 National Guard Soldiers and Airmen were in New Orleans by the thirtieth of August. The National Guard deployed over 30,000 additional troops within 96 hours of the passing of the storm."[20] ***Lieutenant General H Steven Blum, Chief, National Guard Bureau***

When reports on the catastrophic damage in Louisiana and Mississippi began to flow in, the National Guard Bureau did not hesitate to act. The NGB took responsibility for coordinating the flow of Guard resources and personnel from all 50 states to speed up the process and increase efficient use of resources as requirements from coastal states grew beyond their ability to coordinate individual state-to-state compacts.[21] The NGB Joint Operations Center (NGBJOC) worked closely with the Army National Guard Crisis Response Cell and the Air National Guard Crisis Action Team to source and move these forces into the Gulf Coast.

Initially, this operated via a "push" methodology with supporting states pushing available forces based on requirements identified by the Adjutants General in the supported states.[22] As situational awareness improved, this gradually transitioned to a "pull" process whereby supported states submitted requests for forces through the NGBJOC to be sourced by the supporting states.

NGB operated its Joint Operations Center around the clock to coordinate all National Guard actions associated with information sharing between Office of the Secretary of Defense, the Army and the Air Force, Northern Command, state emergency operations centers, and other DOD liaison officers. This coordination supported National Guard response activities in the affected states.[23] One of the challenges of Katrina for the Department of Defense was the lack of protocols set by Northern Command for information flow between the separate DOD entities.[24]



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On Tuesday, August 30, state Adjutants General reported the following troop deployments to the NGB: 5,149 to Louisiana, 2,826 to Mississippi, 1,066 to Alabama, and 753 to Florida for a total of 9,794.[25] At this time, Louisiana and Mississippi were supplemented

by Guardsmen from nine other states. In position and responding were 64 Army National Guard aircraft, that reported 186 search and rescue missions performed, 1,017 patients moved, 1,910 evacuees, 91 cargo movements, and 29 food and water movements.

On August 31, at 7:21 a.m., Lieutenant General Blum and Army National Guard Director Lieutenant General Clyde A. Vaughn placed a phone call to Louisiana State Adjutant General Landreneau.[26] The following is a record of their conversation:

> **General Blum:** Benny, how are things going?
> **General Landreneau:** Sir, we've had a difficult night.
> **General Blum:** What do you need?
> **General Landreneau:** We need 5K soldiers to help out. The armory is flooded. My command and control is at the Superdome. We have a lot of undesirables here trying to cause trouble.
> **General Vaughn:** Hey Benny, can we drive to the Superdome?
> **General Landreneau:** No sir, we are cut off by the rising water, along with the armory.
> **General Vaughn:** Where do you want us to send the incoming soldiers?
> **General Landreneau:** Sir, send them to the intersection of Interstate 310 and State 10.
> **General Blum:** Benny, when's the last time you got any sleep?
> **General Landreneau:** Well sir, I think two days ago.
> **General Blum:** Listen, you need to get some rest, you sound exhausted.
> **General Landreneau:** I'll try Sir, but every time I lay down someone gets me up for a little emergency.
> **General Blum:** Try and get some rest, this is an ongoing effort and we need your energy.
> **General Vaughn:** Benny, we're going to push help so be ready.[27]

On Wednesday, August 31, Blum set up a teleconference with all state Adjutants General at noon to coordinate "full capabilities of National Guard to be deployed as rapidly as possible to save life and limb."[28] Every state Adjutant General reported their Guard forces deploying or available for deployment.[29]

On Thursday, September 1 at 11:30 a.m., Secretary of Defense Rumsfeld and Blum met with President Bush to

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discuss the National Guard response.[30] At this briefing, the President agreed with Rumsfeld that the National Guard was responding effectively to the disaster and chose not to federalize Guard troops.[31] At 1:15 p.m., Blum was asked to be part of a DHS press conference with Chertoff and McHale, to discuss federal assistance to the Gulf. At 5:30 p.m., after coordinating with McHale and Rumsfeld, Blum departed for Belle Chasse, Louisiana, and immediately met with Louisiana State Adjutant General Landreneau at the Superdome. Later that evening, Blum met with Governor Kathleen Blanco to discuss troop and resource requirements in Louisiana.[32]

Also during this time, federal officials considered ways to structure a unified command. According to Deputy Homeland Security Advisor Ken Rapuano, federal officials discussed with Blanco federalizing the National Guard.[33] President Bush ultimately offered Blanco a "Memorandum of Agreement Concerning Authorization, Consent and Use of Dual Status Commander for JTF Katrina," making Honoré, as commander of Joint Task Force Katrina, a member of the Louisiana National Guard.[34] An excerpt from a DOD letter drafted for Governor Blanco to President Bush explained how the command would have been structured under the proposal:

> In order to enhance Federal and State efforts, and if you grant permission, I would like to appoint the Regular Army officer commanding the Federal Joint Task Force Katrina to be an officer in the Louisiana National Guard. I would assign him to command the National Guard forces under my command.[35]

Thus, President Bush's proposal would not have put National Guard troops under federal control. Rather, the proposal would have put Honoré under Blanco's command in the chain-of-command over National Guard troops in Louisiana. In this proposal, Honoré would

have served in two capacities — first, as the commander of federal troops ultimately answering to the President, and second, as the commander of the Louisiana National Guard, answering to Blanco. This proposal was intended to establish a single command for all military operations in Louisiana.

Blanco wrote to President Bush on September 3, declining this proposal. The Governor only agreed to the importance of creating a single military commander for federal forces that "could enhance the contribution of over 25 National Guard states currently being commanded by the Louisiana State Adjutant General."[36] As a result, federal troops remained under one command — Honoré and Northern Command, while the National Guard remained under the separate command of Landreneau and the Governor.

Administrative matters proved to be a challenge as well for National Guard troops deploying under Emergency Management Assistant Compacts (EMAC) with various states. Since these forces were activated in state-to-state agreements they were on state active duty and subject to the rules and entitlements authorized by their respective home states. This plethora of statuses made administration problematic for the National Guard, and led to a request that these forces be activated under Title 32 of the U.S. Code. This federal status permits uniform administration while allowing continued command and control by the Governor.[37] Numerous state Adjutants General suggested the National Guard Bureau request that guard troops be activated under Title 32.[38] In response, the National Guard Bureau strongly advocated for the use of Title 32:

> not only because it allowed Governors to retain control, but because it was the right thing to do for the soldiers and airmen. Each state has a different way of handling pay and benefits under State Active Duty. We had soldiers and airmen operating under 54 different payroll systems and receiving different benefits such as medical care and disability coverage. Our forces needed the protection provided by DOD entitlements.[39]

Between September 2 and September 5, the governors of Alabama, Mississippi, and Louisiana sent letters to the Secretary of Defense asking for all National Guard assets to be put under Title 32.[40] Blum then discussed putting the Guard on Title 32 status with McHale and together, they submitted a formal Title 32 request to Rumsfeld.[41] On September 7, Deputy Secretary of Defense Gordon England approved Title 32 status retroactive to August 29.[42]

On September 8, the NGB noted 50 States, two territories, and the District of Columbia had contributed forces in support of operations in Louisiana and Mississippi. National Guard forces reached peak deployment numbers for Katrina relief with over 50,000 personnel mobilized on this day.[43]

Army National Guard

> "Four hours after landfall, Army National Guard helicopters are performing rescue missions, with 65 helicopters positioned in Florida, Texas, Louisiana, Mississippi and Alabama." ***Northcom Timeline: Hurricane Katrina 1/3/06***[44]

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The Army National Guard contributed heavily to the Katrina response, including the primary priority of search and rescue, evacuation, and commodity distribution. Distribution of water, ice, and food from military stockpiles in the days immediately following landfall was done at both designated and undesignated distribution sites. The Army Guard also provided much needed military transportation, helped clear debris from roads and residences, and provided assistance to law enforcement.[45] Unlike their active duty counterparts, the National Guard is not restricted from performing law enforcement duties under federal law, and thus rendered considerable assistance to civilian law enforcement efforts.[46] According to the daily log of Mississippi National Guard activities prepared for the Select Committee, the majority of the mission requests were for security, a mission that would only increase in the weeks following landfall.[47]

The following chart contains the number of Army National Guard present in the Gulf States.

Date	Number of Army Guard Personnel In Katrina Joint Operational Area
August 26	922
August 27	1,701
August 28	4,444
August 29	6,908
August 30	9,668
August 31	10,428
September 1	14,284
September 2	18,678
September 3	24,548
September 4	29,588
September 5	33,608
September 6	38,093
September 7	39,736
September 8	40,667
September 9	42,164
September 10	42,257
September 11	42,264
September 12	41,530
September 13	40,928
September 14	41,119
September 15	38,831

NATIONAL GUARD BUREAU AFTER ACTION REVIEW OBSERVATIONS TIMELINE, 12/21/05

Air National Guard

August 30: "The Air National Guard launches its first Air National Guard JTF-Katrina mission. A C-17 crew assigned to the 172nd Fighter Wing, Mississippi ANG flew its first sortie in support of Hurricane recovery. The mission lasted for 3 days. They airlifted 85 civilians from Gulfport."
Northcom Katrina Timeline 12/22/05

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The Director of the Air National Guard Lieutenant General Daniel James III, told the Select Committee the efforts of the Air National Guard during Hurricane Katrina represented "the largest military airlift operation supporting disaster relief in the United States."[48]

But the Air National Guard brought more than evacuation, rescue, and airlift capabilities to the response. The Air National Guard also has an emergency medical capability. ANG medics treated over 13,000 patients by September 19.[49] Expeditionary Medical Support (EMEDS) units provided medical personnel and equipment to support up to 10 major trauma surgeries without re-supply.[50] The Air National Guard also has a large civil engineering capability in its Rapid Engineer Deployable Operational Repair Squadron Engineer (RED HORSE) Squadrons.

Date	Number of Air Guard Personnel In Katrina Joint Operational Area (includes Air Guard in transit from outside wings transporting personnel, supplies and equipment)
August 26	8
August 27	932
August 28	932
August 29	933
August 30	956
August 31	960
September 1	972
September 2	2,464
September 3	3,998
September 4	4,596
September 5	6,613
September 6	5,770
September 7	5,952
September 8	5,735
September 9	4,347
September 10	4,581
September 11	4,125
September 12	4,109
September 13	4,112
September 14	3,477
September 15	3,512

NATIONAL GUARD BUREAU AFTER ACTION REVIEW OBSERVATIONS TIMELINE, 12/21/05

Some of the highlights of ANG activity in the first few days following landfall include:

August 29 — Aero-medical Evacuation Squadron positioned to respond in Mississippi
50 ANG medical personnel at Naval Air Station New Orleans

August 30 — The ANG launches its first Air National Guard JTF Katrina mission. A C-17 crew assigned to the 172nd FW, Mississippi ANG flew its first sortie in support of Hurricane recovery. The mission lasted for three days.

They airlifted 85 civilians from Gulfport.
All ANG Airlift and Tanker units put on alert and places all air crew on Title 32 status
Texas ANG starts reconnaissance, activates search and rescue personnel and security forces to Louisiana
ANG establishes Tanker Airlift Control Center

August 31 ANG sources a NORTHCOM request for ANG Combat Weather Team to New Orleans
ANG reports 700 ANG Civil Engineer and 350 Red Horse personnel available
Tennessee and Oklahoma ANG help evacuate 143 patients from the New Orleans Veterans Hospital
The 259th ATCS Louisiana Air National Guard deploys their MSN-7 Mobile Control Tower to the Superdome[51]

September 1 First Air Force, composed of ANG wings across the country, is tasked to lead for planning, orchestrating and overseeing all Air Force support to Joint Task Force Katrina.[52] Gulfport, Mississippi is designated the main operating base for sustained ANG Hurricane relief efforts, including evacuation.
ANG Expeditionary Medical Support (EMEDS) units, civil engineering units arrive in Mississippi and New Orleans
On this day ANG Para-rescuemen are credited with 48 air saves and 250 boat saves in New Orleans. ANG Combat Controllers provide air movement for 750 helicopter sorties where 3,000 people are evacuated. From September 1 through 9, ANG from Alaska and Oregon pushed through 3,169 military and civilian helicopter sorties at multiple landing zones in New Orleans. ANG aircraft and crew would fly 2,542 sorties, airlifting 21,874 people and 11,110 pounds of cargo in support of hurricane relief.[53]

September 2 149th Air National Guard Surgical Team established field hospital in parking lot adjacent to New Orleans Convention Center.[54]

The National Guards of other states also played key roles in the Hurricane Katrina response. Through Emergency Management Assistance Compacts (EMAC), Louisiana and Mississippi were able to request and receive assistance from scores of states from across the country. While the EMAC process is a direct state-to-state relationship, both FEMA and the National Guard Bureau participated in negotiations to facilitate the identification and procurement of specific types of assistance from other states. There was a consensus among federal, state, and local officials that EMAC worked well. These troops served in Title 32 status, and were therefore commanded by the respective Governors of Louisiana and Mississippi and paid with federal funds.

Louisiana

The Louisiana National Guard conducted roving patrols, manned checkpoints, and supported the New Orleans Police Department in the parishes. The Army National Guard also secured key infrastructure sites, including levees,[55] and provided support for general purpose shelters and special needs shelters with medical personnel. One of the Guard's largest missions was to provide security and other support at the Superdome. Approximately 250 Guardsmen were at the Superdome, searching entrants for weapons, providing them with food, water, and medical attention, and attempting to maintain law and order.

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After Katrina hit, the National Guard was deeply involved in search and rescue operations to save people after the levees breached and many areas flooded.[56] Their role included both helicopter and boat sorties to rescue people from roofs and floodwaters and take them to

high ground. They were also part of the more deliberate post-flood activities to go house to house and search for survivors and victims.

The National Guard also had a law enforcement mission beyond the shelters (e.g., the Superdome) to help restore law and order through street patrols and other activities in support of the overtaxed New Orleans Police Department.[57] One of the National Guard's law enforcement missions was to secure the Convention Center and generally maintain order there as occupants were evacuated. They provided food, water, and medical treatment, and searched evacuees as they boarded buses. Because the National Guard was never federalized, they could fully participate in all law enforcement missions.

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Finally, the National Guard played a key role in logistics and transportation, using their high-clearance vehicles and helicopters to ferry personnel and supplies into and out of flooded areas.[58] For example, they transported and distributed food into the Superdome and supported the evacuation of its occupants.

The Louisiana National Guard received much assistance from many states across the country through EMAC.[59] Examples of the specific deployments included 2,426 infantry from Pennsylvania, 1,016 military police from Puerto Rico, 580 security troops from Michigan, 500 support troops from Arkansas, 535 security troops from Massachusetts, 350 security forces from Tennessee, 315 transportation and logistics troops from Alabama, 310 maintenance troops from Illinois, 250 air traffic controllers from Texas, and 221 truckers from South Carolina. In total, Louisiana made 451 EMAC requests, and 29,502 National Guard troops responded from other states to undertake these missions.

Alabama

The Alabama National Guard headquarters began monitoring Hurricane Katrina on August 23 and actively engaged in discussions with the National Guard Bureau on August 25. When Katrina became a Category 3 hurricane on August 27, the Alabama Guard increased staff at the state emergency operations center. EOCs along the Alabama Coast for the 20th Special Forces Group, 711th Signal Battalion, and 16th Theater Support Command were opened and manned. When FEMA designated Maxwell Air Force Base as a federal staging area for supplies, the Alabama National Guard sent troops there to help prepare for distribution.[60] Governor Riley declared a state of emergency on August 28, which formally activated the state National Guard.[61]

On August 29, the Alabama Emergency Management Agency (AEMA) received requests for commodities from Mobile, Baldwin, Butler, and Washington counties, and the Alabama Guard took control of all recovery and relief operations in coastal Alabama to include county distribution points. When AEMA requested special boat teams for search and rescue, and security, the Alabama National Guard responded. The Guard also performed damage assessment tasks. The Alabama National Guard had developed mission specific force packages for emergencies like hurricanes, snow and ice storms, and chemical and biological attacks. These force packages include security forces, engineers, medical, communications and logistical equipment, and trained personnel.[62]

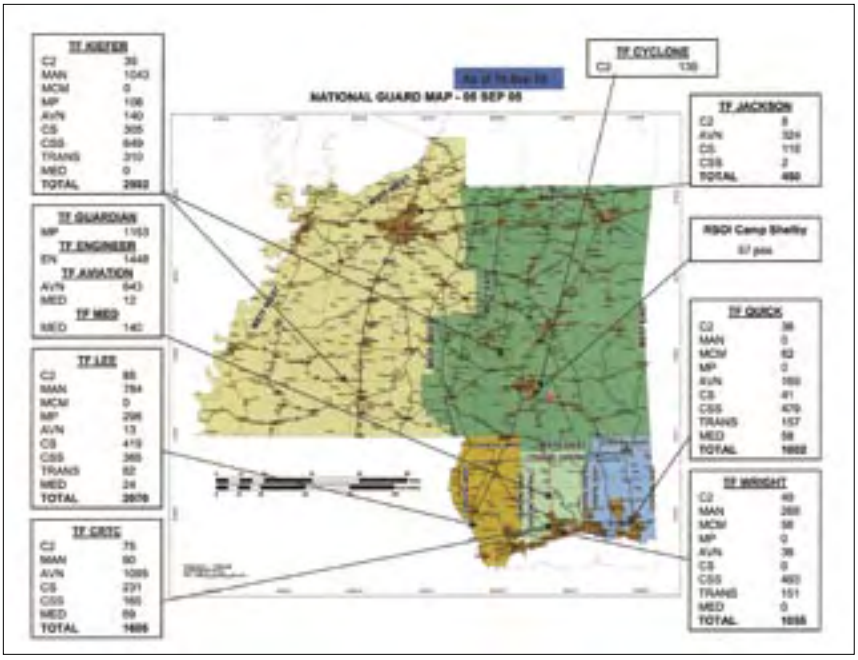
The Alabama National Guard deployed approximately 750 soldiers and airmen within Alabama, but also provided 2,000 soldiers to locations in Mississippi and Louisiana in response to immediate EMAC requests for support on August 29 and 30.[63]

Mississippi

On August 29, in the rear area operations center in Jackson, it was recorded that the Mississippi National Guard had activated 2,736 Army National Guard soldiers, and 1,003 Air National Guard members to provide security, search and rescue, and debris removal operations.[64]

In his testimony before the Select Committee, Mississippi Adjutant General, Harold A. Cross, made the following observations:

> During and immediately after landfall, National Guard search and rescue operations began on the Gulf Coast. My personnel night



MISSISSIPPI NATIONAL GUARD

ground reconnaissance on the 29th and aerial reconnaissance early the next morning clearly revealed a disaster of unprecedented proportion all along the Gulf Coast of Mississippi and significant damage as far as one hundred and fifty miles inland. After reporting this initial surveillance to Governor Barbour, I immediately directed my rear operations center to activate all remaining available Mississippi National Guardsmen and to execute the movement of pre-planned assistance from other states. In addition, I requested assistance through the National Guard Bureau from other states, up to division sized strength. Accordingly, the 4,533 Mississippi National Guard soldiers and airmen were ultimately augmented by 11,839 National Guard personnel from 36 states under EMAC agreements.[65]

The Mississippi National Guard personnel on standby at Camp Shelby moved forward after the storm had passed to a scene of unbelievable destruction. Hurricane Katrina was by all accounts the worst storm in nearly a century, but Cross was prepared.[66] As soon as the storm abated somewhat, Mississippi National Guard personnel deployed from Camp Shelby into the devastated Mississippi coast to provide security, search and rescue and debris removal operations.[67] Even so, Cross recognized his own resources would be insufficient to assist along the whole coast of the state and he needed help from the National Guard of other states. In that regard, General Cross said:

EMAC agreements negotiated with 40 states creating a division-sized force within 96 hours eliminated need for Title 10 forces. The first out of state National Guard units to arrive in Mississippi were units from Alabama. 483 soldiers arrived on 30 August with an additional 359 soldiers arriving on 31 August. This Alabama National Guard Force consisted of combat engineers, military police, security forces, and communications assets. Their quick response was due to the fact that the Alabama National Guard was already postured to respond to Katrina in the event it impacted Alabama. The personal relationship between the adjutants general of the two states allowed for the rapid response of forces.[68]

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DAILY RECAP

DATE	MSARNG	MSANG	TOTAL MSNG	OUT OF STATE	TOTAL DAILY SUPPORT
27-Aug-05	110	0	110	0	110
28-Aug-05	1006	0	1006	0	1006
29-Aug-05	2556	532	3088	0	3088
30-Aug-05	3089	633	3722	483	4205
31-Aug-05	3133	673	3806	842	4648
1-Sep-05	3289	633	3922	842	4764
2-Sep-05	3451	671	4122	1,043	5,165
3-Sep-05	3495	671	4166	2,563	6,729
4-Sep-05	3481	704	4185	10,568	14,753
5-Sep-05	3497	702	4199	10,568	14,767
6-Sep-05	3521	702	4223	10,568	14,791
7-Sep-05	3529	1022	4551	10,615	15,166
8-Sep-05	3549	1017	4566	10,723	15,289
9-Sep-05	3563	894	4457	10,723	15,180
10-Sep-05	3555	963	4518	10,721	15,239
11-Sep-05	3530	1003	4533	10,665	15,198
12-Sep-05	3474	1003	4477	11,895	16,372
13-Sep-05	3443	1003	4446	10,638	15,084
14-Sep-05	3354	1003	4357	10,579	14,936
15-Sep-05	3339	1003	4342	9,270	13,612
16-Sep-05	3325	1003	4328	9,270	13,598
17-Sep-05	3321	1003	4324	8,393	12,717
18-Sep-05	3254	1003	4257	8,397	12,654
19-Sep-05	3172	1003	4175	8,197	12,372
20-Sep-05	3159	1003	4162	5,664	9,826
21-Sep-05	3159	1003	4162	4,587	8,749
22-Sep-05	3158	1003	4161	4,364	8,525
23-Sep-05	3158	1003	4161	1,867	6,028
24-Sep-05	2332	686	3018	1,620	4,638
25-Sep-05	2332	686	3018	1,618	4,636
26-Sep-05	2060	876	2936	928	3,864
27-Sep-05	1990	876	2866	848	3,714
28-Sep-05	1983	1227	3210	824	4,034
29-Sep-05	1626	1227	2853	824	3,677
30-Sep-05	1626	1227	2853	817	3,670
1-Oct-05	1626	1227	2853	817	3,670
2-Oct-05	1626	1227	2853	817	3,670
3-Oct-05	1626	1227	2853	809	3,662
4-Oct-05	1626	1227	2853	581	3,434
5-Oct-05	1626	1227	2853	580	3,433
6-Oct-05	1626	1227	2853	588	3,441
7-Oct-05	1626	1227	2853	588	3,441
8-Oct-05	1626	1227	2853	232	3,085
9-Oct-05	1626	1227	2853	232	3,085
10-Oct-05	1626	866	2492	157	2,649
11-Oct-05					

As of: 10/11/2005 3:26

SOURCE: MISSISSIPPI NATIONAL GUARD

The initial requests for assistance from Cross were through personal relationships with other State Adjutant Generals.[69] General Blum, held a video teleconference on August 31 to solicit assistance from each of the 54 states and territories for both Louisiana and Mississippi. States responded rapidly to the urgent need and decided to worry about the authorizing paperwork later. In most cases, EMAC documentation followed after individual states provided the assets requested by Louisiana or Mississippi.[70] As noted earlier, all National Guard troops were retroactively placed in Title 32 status on September 7 by Deputy Secretary of Defense England.[71]

Out of state National Guard support in Mississippi through EMAC process

State	National Guard Assistance
Alabama	1,500 Security Forces, 7 Tactical planners and engineers, 2- CH47s with crew for S and R, 2-UH60s with crew for S and R, 300 Sleeping Bags and 80 cots, Engineering Brigade, MP Battalion, 1,450 personnel for TF, 37 personnel from Air Refueling Wing, CBCS Communications support, Ministry Team, Ground Safety Manager, EMEDS personnel
Arizona	Family Assistance Personnel, Medical support
Arkansas	100 soldiers, MP Company, 25 Heavy Trucks with 75 soldiers
California	Fire Team, Aircraft Maintenance personnel, medical support personnel
Colorado	MP Company, 50 Signal company personnel
Delaware	MP Security Company, 100 personnel to assist command and control, EMEDS personnel
Florida	4-UH60s, rescue teams, infantry battalion, 50 ambulances with crew, 15 cooks, OH-58 with crew, logistics aides, safety personnel, aircraft maintainers
Georgia	2- UH1s, 2 CH47s with crew, 1,500 Task Force personnel, Fire Vehicle, Cable/Copper Repair personnel
Idaho	Refuelers
Illinois	Security Forces, EMEDS personnel, public health personnel
Indiana	2,300 soldiers, 40 tankers
Iowa	Medical Support Battalion
Kansas	Air Refueling personnel, Emergency Medical teams, Guard Fire Fighters, Ministry Team, Internist, 25 EMEDs personnel and supplies
Kentucky	50 Heavy trucks with 150 soldiers, 24 person refueling team, food service personnel, Medical Preventative Medicine personnel, communications and LNO personnel
Kentucky	Water Purification Equipment with Operators, Ministry Team, medical personnel
Maine	Preventative Medicine Team, Cable repair personnel, Security personnel
Maryland	MP Security Company, 104 Personnel for S and R and ice and water distribution
Massachusetts	Medical Officers
Michigan	MP Security Company, construction engineers, EMEDS personnel
Minnesota	Ministry Teams, Mental Stress Team, medical support
Missouri	2-C130 Aircraft with Crew, medical personnel
Montana	Public Affairs Team
Nebraska	Security Forces, Priest, Ground Safety Manager, ARW personnel
New Hampshire	EMEDS personnel, bioenvironmental personnel
New Jersey	Medical Support Personnel, bioenvironmental personnel
New York	8 UH6s, 2 CH7, 6 UH1 and 130 personnel, Rabbi, EMEDS personnel
North Dakota	Water Purification Equipment with Operators, 72 personnel from fighter wing
Ohio	119 soldiers for debris removal, etc., 1,300 Task Force soldiers, aviation assets, generators, 3 OH-58 with crew, aircraft maintenance personnel, food service personnel, EIS Management Team, tactical support personnel, EMEDS personnel, Air wing personnel
Oklahoma	25 personnel/Air Mobility, Fire Vehicle, Medical Support personnel
Oregon	Chief of Safety, Medics, EMEDS personnel
Pennsylvania	SatCom with personnel, AVC ATS Company, Food Services, Medical Support Personnel, EMEDS personnel
Puerto Rico	Air wing personnel
Rhode Island	Units to load and unload aircraft
South Carolina	Bioenvironmental Engineer
Tennessee	ATS Co. with Tower, TTCS, 3 MP Security Companies, fixed wing support teams, engineering battalion, logistics control cell, Mobile Emergency Operations Center, EIS Teams, 26 personnel from air refueling wing, aviation assets, Forklift loader, Fire Vehicle, EIS Management Team, EIS Repair Team, 26 Security personnel
Utah	Ministry Teams
Vermont	Bioenvironmental personnel
Virginia	447 Light Infantry for security and recovery, EMEDs personnel
West Virginia	Airlift Wing support

Wisconsin	EMEDs personnel
Wyoming	Medical Support, Bioenvironmental Engineer

MISSISSIPPI EMAC COST TRACKER DATED OCTOBER 10, 2005

Cross also coordinated closely with all other state entities involved, including the Mississippi Department of Public Safety, in order to maintain a coordinated law enforcement effort. Cross noted that coordination between Guard engineering companies with various utility companies to clear roads and restore electricity and phone services was instrumental in getting power restored to the majority of coastal counties well in advance of projections.[72]

NATIONAL GUARD

The National Guard provided immediate and continued support to the people of Mississippi during Hurricane Katrina.[73] National Guard accomplishments included: 3,900 miles of roads cleared of fallen trees and debris; 1.2 million meals ready to eat (MRE) and 1 million gallons of water delivered via air (over 2,000 missions); 39 million pounds of ice, 56.4 million gallons of water, and 2.7 million MREs distributed to central distribution points in 37 counties; 200 presence patrols and more than 600 search and rescue missions conducted; law enforcement assistance provided, resulting in 72 arrests; aircraft logged over 1,995 hours and delivered 2.57 million pounds of cargo. Emergency medical assistance from the Air National Guard assisted hundreds of Mississippi citizens.

Department of Defense response

The day after Katrina made landfall, England led an early roundtable session to get damage assessments for DOD facilities and review resources that may be required of DOD to support hurricane relief.[74] The Secretary of Defense was briefed on DOD's response and Northern Command issued several more alerts in anticipation of requests for assistance.

While Honoré arrived on Wednesday, August 31, as the commander of the newly established Joint Task Force Katrina to supervise federal military operations, the first active duty Navy and Air Force personnel arrived in Louisiana late Thursday, September 1, and active duty Army personnel started to arrive early Friday, September 2.[75] These active duty personnel helped the Louisiana National Guard and the New Orleans Police Department (NOPD) control the crowds during the evacuation of the Superdome, maintain law and order in the streets, and eventually conduct secondary searches, going door to door looking for survivors or bodies and assisting those who had not yet escaped.

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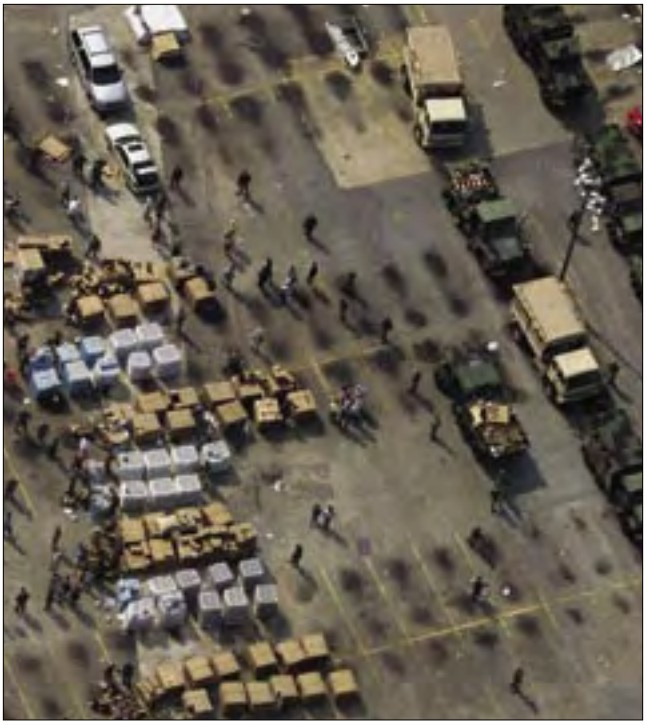
The support provided by DOD was invaluable, according to a wide variety of officials.[76] DOD active duty forces were involved in search and rescue, but generally after the initial rescues from roofs by helicopters and boats. They were involved in the more deliberate search activities where mixed teams, to include National Guard, law enforcement, Coast Guard, and DOD worked together going house to house and searching for hold-outs and dead bodies.[77]

DOD also took over FEMA's logistics distribution functions. According to FEMA Acting Director for Response during Hurricane Katrina, Edward G. Buikema, FEMA initially approached DOD about this mission on Thursday, September 1.[78] On that date, Colonel Richard Chavez informed FEMA Acting Director of Operations Ken Burris the request "would require a Secretary DHS [sic] to Secretary DoD call to initiate and significant General Counsel input."[79] The formal Mission Assignment was prepared the next day at 6:15 p.m.[80] and by 7:41 p.m., McHale informed DHS Deputy Secretary Michael P. Jackson that "SecDef agreed to support your RFA for broad logistics support" and that DOD was "working on the specific language — and a planning staff to implement it."[81] Execution of the mission apparently began the next day, September 3, according to written orders signed by Principal Deputy Secretary of Defense for Homeland Defense Pete Verga.[82]



AP PHOTO/DAVID J. PHILLIP

In the same e-mail to Jackson, McHale also said, "We may actually be able to do more than you have requested."[83] This apparently led to further meetings and, according to McHale, an additional seven approved mission assignments on Monday, September 5.[84]

Although Buikema and his FEMA colleague Deputy Director of Response Michael Lowder expressed their view that DOD acted slowly on the logistics request,[85] the record reflects a prompt decision, followed by final resolution of details involving a billion dollar mission assignment. FEMA officials' perception of a slow response from DOD reflected that they were (1) unaware of the planning already under way (as reflected in McHale's e-mail) before final details were resolved and (2) possibly an unrealistic expectation that acceptance of such a massive mission would result in immediate action. This was not, however, just a single airlift of needed supplies — it was "planning and execution for the procurement, transportation and distribution of ice, water, food, fuel and medical supplies in support of the Katrina disaster in Louisiana and Mississippi."[86]

This is not to say that all went smoothly with DOD support. For example, DOD apparently refused to allow the shipment of MREs on FEMA-provided transportation.[87] The Defense Logistics Agency (DLA) apparently claimed DLA could only ship MREs on "DOD approved carriers" and DLA "would arrange transportation within the next 24-48 hours." The September 4 e-mail lamenting this problem ended: "SEND MRE'S NOW."

Finding: The Coast Guard's response saved many lives, but coordination with other responders could improve

On August 29, the day Katrina made landfall, the U.S. Coast Guard Sector New Orleans Incident Management Team was stood up in Alexandria, Louisiana.[88] Outside of the forecasted area of impact, Coast Guard Disaster Assistance Teams from Ohio, Kentucky, St. Louis, Pittsburgh, and Miami were pre-positioned to the region to respond as soon as conditions permitted.

During normal conditions, there are 15 helicopters assigned within the Eighth Coast Guard District, along with four fixed-wing aircraft and 16 cutters.[89] Within hours of Hurricane Katrina's passing, the Coast Guard surged 31 cutters, 76 aircraft, 131 small boats, and over 4,000 personnel into the affected areas.

The first Coast Guard rescue occurred within a few hours after the storm made landfall.[90] An HH-65 helicopter working out of the Coast Guard's Air Station New Orleans located at Naval Air Station Bell Chasse rescued two adults and one infant, operating in 60-knot winds.

On August 30, all pre-positioned Coast Guard aircraft began conducting search and rescue missions, damage over-flight assessments, and logistical support, and the medium endurance cutter DECISIVE arrived offshore to conduct damage assessment of oil platforms.[91]

To maximize the number of missions that could be flown, all of the helicopters refueled at Air Station New Orleans, which was also in charge of Coast Guard air asset coordination.[92] When crew changes were to occur, the Mobile-based aircraft would return to Mobile. Tasking orders, such as directing a helicopter to pick up a particular group of people, were provided when the aircraft was located at a base, as well as any time communications were possible. Nevertheless, specific tasking orders were not necessary in the initial days after the storm because of the large volume of survivors throughout the region. Helicopters were able to rescue people without needing instructions.

Search and Rescue Communications

Communications were limited in many respects. Vital communications infrastructure was destroyed by the storm, and it was not possible for the Aviation Training

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Center or Air Station New Orleans to communicate directly with the operations centers in the rescue area, nor could the Emergency Operation Center (EOC) in Baton Rouge be contacted.[93] When aircraft left their base in Mobile, communication was limited to aircraft-to-aircraft transmissions; pilots were unable to speak with the Aviation Training Center.[94] When aircraft flew over New Orleans, communication was possible with Task Force Eagle (the National Guard command center for air operations at the Superdome) and occasionally with Air Station New Orleans.[95] Air Station New Orleans lost all power and telephone lines were inoperable.[96] When power was restored, however, it was intermittent at times and continued to limit communications.[97] By 5:00 p.m. on the first day of rescue operations, communication became more difficult because of the large volume of radio traffic in the area.[98] Boats were able to communicate via limited range low-level radios, but these did not afford continuous coverage for airborne assets.[99] On Monday August 29, a Coast Guard C-130 arrived to provide communications assistance; it could occasionally patch air communication to land lines (if operational) in St. Louis, Missouri and Alexandria, Louisiana (where Sector New Orleans had set up operations).[100]

For the first three days, no air traffic control was available, and pilots relied solely on internal pilot-to-pilot communications and standardization of training to maintain order in the airspace.[101] The Coast Guard practice of standardization allowed for easy communication between pilots who had never flown together before, and this proved to be critical to the success of search and rescue missions in the first days without air traffic control. A U.S. Customs and Border Protection P-3 aircraft arrived four days after landfall to provide air traffic control and ground communication.

On the day of the storm, helicopter crews monitored weather reports to determine locations in the region where the weather would permit them to begin rescue flight operations.[102] Subsequently, crews proceeded to areas located at the edge of the storm.[103] The first rescue occurred in 60-knot winds in Port Sulphur, Louisiana at approximately 3:00 p.m.[104] One helicopter flew to Air Station New Orleans to drop off three personnel to clear the field of debris, activate the generators, and permit operations to resume at that location, while others conducted rescues in Grand Isle, Louisiana and St. Bernard Parish, Louisiana.[105] At approximately 5:00 p.m., Coast Guard helicopters from Mobile and Houston began rescuing people in New Orleans.[106] At that time, the Coast Guard only rescued people from immediate danger and brought them to higher ground because of the tens of thousands of people in immediate danger and the limited fuel capacity of each helicopter.[107] In the case of people with medical conditions which required treatment, helicopters transported them to the Louis Armstrong New Orleans International Airport (New Orleans Airport).[108] Central drop-off locations were not set up until the next day, when large areas that were dry and close to operations were able to be identified.[109]

Conduct of Coast Guard search and rescue operations

Upon the completion of each mission and arrival on the ground at either the Mobile or New Orleans Air Stations, pilots briefed the Operations Commander on their missions, including the number of people rescued.[110] Given the time constraints of performing rescues, the Coast Guard did not record the names of those rescued, nor the locations where they were deposited.[111] While the immediate life saving measures taken by the Coast Guard crews were laudable, the failure to systemically communicate the location of the rescued citizens to local authorities resulted in some rescued persons being effectively stranded, lacking food, water, and shelter for extended periods. There was no way to confirm whether survivors would remain in these locations, and specific information concerning a number of those rescued was communicated to other entities (EOCs and other Coast Guard stations) whenever communications were possible.[112]

Within 24 hours of the storm, surface operations (boats) were conducted out of Zephyr Field (a local professional baseball stadium). According to the Coast Guard, a unified command for surface operations was established at Zephyr Field with the Coast Guard, FEMA,

While the immediate life saving measures taken by the Coast Guard crews were laudable, the failure to systemically communicate the location of the rescued citizens to local authorities resulted in some rescued persons being effectively stranded, lacking food, water, and shelter for extended periods.

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and the Louisiana Department of Wildlife and Fisheries.[113] A Coast Guard officer dispatched vessels. Crews returned to the site for food and rest.

On the second day of operations, August 30, drop off locations were chosen by helicopter pilots and established at the Superdome, Lakefront Airport, the "Cloverleaf" (an area along I-10), the University of New Orleans, Zephyr Field, and New Orleans Airport.[114] This information was communicated to the FEMA representative at Zephyr Field, who coordinated resources to assist survivors at each location. Notwithstanding this effort to coordinate, the hand-off was not effective, leaving many "rescued" persons without sustenance or shelter for extended periods. In addition, as larger numbers of survivors were placed at each location, requests were made for larger Department of Defense and National Guard helicopters, including MH-53s (from the USS Bataan) and CH-47s to shuttle them from dry land islands to locations accessible by bus for further evacuation; the helicopters began arriving on the same date.

On August 31, a Coast Guard liaison officer arrived at Task Force Eagle (the National Guard command center for air operations) at the Superdome.[115] The National Guard also received rescue requests at this site, and tasking orders would be passed to Coast Guard helicopters that arrived at that location.

The first heavy lift aircraft to arrive at the New Orleans Airport was a Coast Guard C-130.[116] It brought water and food to the area on approximately August 31, which was subsequently forwarded to Zephyr Field, the Superdome, and Air Station New Orleans to be distributed by helicopters on their return flights to flooded areas. The Coast Guard initiated this effort because it recognized that victims placed on higher ground "islands" had not yet been completely evacuated and required water and food, as temperatures during the day were nearing one hundred degrees. Once again, the effort was laudable but fell short of the need, as some evacuees remained in distress.

On the afternoon of September 1, additional communications were re-established when Coast Guard Cutter SPENCER arrived on-scene in New Orleans.[117] SPENCER took tactical control of Coast Guard surface forces in New Orleans and, on September 2 established a Vessel Traffic System (VTS) to control marine vessel traffic in the area. The SPENCER's communications capabilities include satellite, medium frequency, high frequency, and very high frequency voice and data communications (surface – to - surface communications, and surface - to - air voice and data links).

On September 2 and 3, Joint Field Operations (JFOs) were established.[118] In Louisiana, however, there were Coast Guard and urban search and rescue personnel at

AP PHOTO/DAVID J. PHILLIP, POOL

the state EOC in Baton Rouge before the formalized JFO was established. A cadre of Coast Guard personnel from Port Arthur, and others, who had been evacuated from New Orleans, was already in the EOC handling search and rescue coordination.

By September 20, the Coast Guard had organized and coordinated the rescue or evacuation of 33,544 people.[119] At the height of Katrina operations, over 33 percent of Coast Guard aircraft were deployed to the affected region.[120] Despite coordination difficulties, the Coast Guard's efforts were heroic and saved countless lives.

Finding: The Army Corps of Engineers provided critical resources to Katrina victims, but pre-landfall contracts were not adequate

The Army Corps of Engineers ("USACE" or "Corps"), another active duty military unit, provided critical resources to respond to Hurricane Katrina. The Corps provided relief and response support to FEMA in accordance with the National Response Plan as the lead federal agency for public works and engineering (Emergency Support Function #3). Some of the Corps' specific missions related to Hurricane Katrina included providing water and ice to regional warehouses, providing emergency power, providing emergency roof repair, and removing debris.

During Katrina and the aftermath, USACE provided 112 million liters of water, 232 million pounds of ice, installation of about 900 large generators, repairs to 170,000 roofs, and removal of a million cubic yards of debris.[121] USACE had pre-awarded competitively bid contracts for all of these functions to allow quick deployment of resources prior to and immediately after an event.[122] These pre-awarded contracts are part of USACE's Advanced Contracting Initiative (ACI) which has been in place for six years.

Due to the magnitude of the destruction, USACE pre-awarded contracts for roofing repair and debris removal were not adequate, and additional contracts were advertised and awarded using shortened but competitive procedures.[123] In addition, FEMA tasked USACE to

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provide structural safety evaluations of low-rise and non-public buildings in New Orleans and other locations. To date, USACE has completed assessments of 47,800 of an estimated 80,000 to 100,000 units.[124] Given the large number of uninhabitable or unusable buildings, FEMA has recently tasked USACE with demolition of buildings.[125] To date, USACE is still developing estimates and conducting planning for the demolition mission.

Finding: The Department of Defense has not yet incorporated or implemented lessons learned from joint exercises in military assistance to civil authorities that would have allowed for a more effective response to Katrina

The Department of Defense participates in several command and control exercises involving responses to domestic emergencies, ranging from the combatant command level to the national level.[126] In the past these have included Northern Command exercises UNIFIED DEFENSE (2003,2004), ARDENT SENTRY (2005), DETERMINED PROMISE (2003, 2004), VIGILANT SHIELD (2005), DILIGENT ENDEAVOR (2003), DILIGENT WARRIOR (2004), NORTHERN EDGE (2003), SCARLET SHIELD (2004), DARK PORTAL (2004) and TOPOFF (2003, 2005). Many of these exercise scenarios were designed to overwhelm local and state assets to evoke a response under the National Response Plan, including the employment of DOD assets.

Hurricane Katrina was a test of the recently established (post - 9/11) United States Northern Command, and its ability to oversee and coordinate the largest use of active duty and Guard military in a domestic action in recent

history. Although Northern Command has conducted numerous exercises with the National Guard in state and local exercises, the lessons learned during these events were not consistently applied to the military response to Katrina.

NORAD/NORTHCOM ARDENT SENTRY 05 was a combined exercise with TOPOFF 3, conducted April 4-9, 2005.[127] The overall goal of this exercise was to conduct a joint service and interagency exercise that would provide realistic training opportunities for all agencies in incident management. Canadian forces also participated as part of the North American Aerospace Defense Command (NORAD). Another objective was to plan, deploy, and employ DOD forces in support of civilian authorities' operations in accordance with the National Response Plan and DOD policy. The lessons learned during this exercise offered a preview of problems that would surface again during the Katrina response. Some of Northern Command's recommendations for improvement were as follows:

> Conduct strategic effects-based planning between DOD and DHS for each Incident Annex in the National Response Plan.
>
> Investigate requirement for integrated "National Strategic Communications Plan" in coordination with interagency partners.
>
> Develop national capability to electronically produce, staff, validate, approve and track mission accomplishment of mission assignments.
>
> Determine requirements for a "National Common Operating Picture" in coordination with DHS, Department of Justice, and other Federal agencies.[128]

TOPOFF 2 also contained findings that, if corrected, would have enhanced the federal response to Katrina.[129] From uncertainty between federal and state roles to the lack of robust and efficient local emergency communications and the need to improve data collection from military agencies, TOPOFF 2 findings were telling predictors of some of the challenges the military faced.

Northern Command predicted in its ARDENT SENTRY/TOPOFF 3 Master Executive Summary, that "this exercise success is due in part to scenario constraints that could provide a false sense of security and lack of incentive to initiate or aggressively participate in the integrated regionally-based planning that is so essential."[130] Just over four months later, Katrina struck.

After Katrina, DOD officials reflected on the value of prior exercises. McHale commented that government training exercises "have not been sufficiently challenging."[131] Other Pentagon officials noted that in many cases, top officials, from Cabinet-level secretaries and generals to governors and mayors, do not participate and these simulations do not last long enough.[132] The Government Accountability Office, in a November 29 briefing also noted key players are not always involved in drills, the lessons from previous training and exercises are not retained, and the training and exercises are more targeted at terrorist events than natural disasters.[133]

The lack of implementation of lessons learned and the training necessary to learn them resulted in less than optimal response by all military components. Oxford Analytica took the following view:

> After Katrina made landfall, the NORTHCOM-led military support mission suffered many of the same planning failures, unclear lines of authority, communication breakdowns, and shortages of critical resources that were experienced by the civilian agencies, such as the Department of Homeland Security.[134]

Finding: The lack of integration of National Guard and active duty forces hampered the military response

> "Title 10 versus 32 versus 14…again."[135]
> ***Coast Guard Vice Admiral Jim Hull, NORTHCOM***

> "Advance planning between active-duty personnel and the Guard is vital – in contrast to the cooperation that . . . unfolded during Katrina 'on the fly' – albeit by 'superb leaders'."[136] ***Washington Post, October 13, 2005,*** **quoting** ***Assistant Secretary of Defense Paul McHale***

In a speech on October 21, McHale indicated planning by the National Guard was not well integrated with the

overall military, and the Joint Staff did not have a grasp of the National Guard's plans.[137] Interestingly, a September 14 e-mail originating in the Joint Chiefs of Staff (JCS) offices commended the Bureau's efforts to provide operational information to JCS.[138] McHale stated that National Guard plans were not well integrated with overall DOD plans. The Joint Staff acknowledged that the NGB was providing timely and accurate reports, but Northern Command was apparently more focused on active operations and therefore did not have a well informed view of the significant National Guard effort in the region. The Joint Staff e-mail went on to say that Northern Command's briefings are too active duty focused and lack unity of effort.[139] In the same speech, McHale said DOD did not understand how to integrate with the plans of the National Guard.[140] The reverse was also true, despite past lessons learned.

In the TOPOFF 3 exercise in April 2005, it was clear the National Guard and the National Guard Bureau would be part of a large scale emergency response. The New Jersey National Guard noted that "although TOPOFF 3 began as an exercise with minimal National Guard involvement, it quickly evolved into one that heavily relied upon Guard participation, and identified a need early on for assistance from the National Guard Bureau."[141]

At the time of Katrina landfall, however, the National Guard did not have adequate knowledge of DOD planning guidance developed at Northern Command, including concept of operations plans and functional plans for military support to civilian authorities.[142] The National Guard After Action Report on TOPOFF 3 found that numerous members of the Guard operational leadership did not have adequate knowledge of these plans.[143]

At an after action meeting of state Adjutants General, the Adjutants General agreed coordination between active duty and National Guard in the response operation needed to be improved. According to the meeting report, "There was a lack of coordination of Joint Task Force Katrina operation with the National Guard Headquarters in the supported states."[144]

The National Guard Bureau also reported lines of command, control, and communications lacked clear definition and coordination between federal military forces and National Guard forces operating under state

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control, resulting in duplicate efforts. For example, elements of the 82nd Airborne Division moved into a sector already being patrolled by the National Guard.[145] The meeting report also stated:

> Federal troops often arrived prior to being requested and without good prior coordination. This resulted in confusion and often placed a strain on an already overburdened disaster response system. A specific case in point was the Marine Corps amphibious units which landed in Mississippi without transportation, requiring National Guard transportation assets to move them to New Orleans increasing the burden on an already stretched support system.[146]

The National Guard 38th Infantry Division, composed of smaller Guard units from many states, reported they never formally coordinated with Northern Command.[147] Members of the 82nd Airborne Division, the first active duty personnel to arrival in New Orleans on September 3, had a similar experience. In a September 9 e-mail, a soldier in the 82nd indicated coordination of evacuation efforts in New Orleans was very poor.[148]

> We're conducting boat patrols using Coast Guard boats but coordination is very difficult . . . . National Guard seems to move in and out of sectors doing what they want then just leaving without telling anyone . . . . And this is in 4 days of operations.[149]

Despite the lack of integration in Washington, D.C. and in Louisiana, active and reserve forces worked well together in Mississippi. Notably, the Governor of Mississippi did not request active duty military assistance, relying instead on Mississippi and other National Guard personnel provided through EMAC.

However, in the DOD effort to lean forward, Honoré contacted Cross immediately to offer any help needed, and remained in contact with him daily in person or on the phone.[150] On September 3, Northern Command and JTF Katrina received confirmation from the Secretary of Defense that JTF Katrina was to assume responsibility for logistical operations in Mississippi and Louisiana in response to FEMA's request.[151] All DOD operations in the state of Mississippi were conducted with Cross' consent.[152]

One of the most important roles played by DOD in Mississippi was the delivery of military stocks of food and water that started to arrive in Gulfport on September 1. In his testimony before the Committee, Cross noted:

> By the end of the second day after landfall, my intelligence reports indicated that the previously assumed flow of food and water was severely restricted. Many pre-planned distribution points were inaccessible and many hundreds of people were stranded by flood waters, blocked roadways or lack of fuel for transportation. These desperate civilians were primarily observed by aerial reconnaissance in Hancock County. Upon realization that food and water was not going to arrive by normal means in time, I offered an immediate airlift of food and water utilizing our helicopters and our rations and immediately requested through US NORTHCOM an emergency airlift of military stocks of MRE's. Within a day, massive amounts of MRE's began arriving at Gulfport just in time to be disseminated to prevent starvation. Almost 1.7 million MRE's were flown in to my position thanks to the quick reaction of Lieutenant General Joe Inge of Northern Command.[153]

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Air Force personnel and aircraft from the 920th Rescue Wing and 347th Rescue Wing, as well as Special Operations Command aircraft arrived at the Jackson Air National Guard Base the day after landfall, and along with National Guard, performed search and rescue mission in the first days.[154]

The USS Bataan, the USS Truman, the USS Whidbey Island, and other vessels supported Navy and Marine Corps operations in Mississippi, delivering personnel, equipment, and commodities.[155] The USS Bataan had six helicopters, one land craft, extensive logistics supplies, and trauma medical capabilities that were used for search and rescue in both Mississippi and Louisiana.[156] According to a September 1 e-mail from Colonel Damon Penn, Mississippi's Defense Coordinator, a total of 19 active duty and National Guard teams were conducting search and rescue missions on the Mississippi coast.[157]

The Naval Construction Battalion Center at Gulfport was severely damaged during Katrina, and although most of the 800 "Seabees" were evacuated before the hurricane struck, remaining personnel and other Seabees deployed by the Navy helped with Hurricane Katrina recovery operations.[158] Gulfport-based Seabees, who linked up with the National Guard at their Joint Operations Center in Gulfport, coordinated with the National Guard to clear roads and assisted in removing debris.[159] The Seabees also set up logistics centers to distribute food and water and provide emergency medical services.[160] Two active-duty Seabee battalions from Port Hueneme, California, their subordinate detachments from both coasts, and Reserve Seabee volunteers joined those already in Gulfport, Mississippi, forming a total Seabee force of about 3,000 sailors by September 9.[161] The Seabees were also joined by 100 Mexican Marines and 215 Canadian Navy personnel who helped them work on FEMA temporary housing sites, nursing home repair, and repairs to public buildings, schools and construction sites.[162]

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On September 5, 1,000 Marines from the I Marine Expeditionary Force (MEF), Camp Pendleton, California, arrived at Biloxi, and 1,000 Marines from the II MEF Camp Lejeune, North Carolina, arrived at Stennis Space Center.[163] These Marine units, commanded by Marine Corps Reserve Major General Douglas V. Odell, Jr., assisted in the transportation of large amounts of commodities, as well as providing personnel and

equipment to assist in recovery operations in Hancock County as directed by Cross.[164] "Without concern for service lines and or 'Title of Authority,' [Major General] Odell accepted the mission and executed all requirements, until directed by his higher headquarters to move to New Orleans," Cross said.[165]

On September 8, the USNS Comfort arrived in Pascagoula to offer medical assistance and facilities.[166] Four days later, the Northern Command suggested to the Joint Chiefs of Staff that the Comfort be withdrawn because there was "very limited usage;" estimated at "fewer than a dozen patients."[167]

According to Cross' response to questions by the Select Committee, the Mississippi National Guard maintained a very good relationship with DOD forces. "Active duty units that responded always took a subordinate, support role and these units coordinated directly with the Mississippi National Guard Forward Operations Center."[168]

In Louisiana, airborne search and rescue was another area where National Guard and DOD integration was lacking. As noted in the National Guard Bureau's After Action Report, National Guard and DOD active duty (as well as other) helicopters were conducting rescue missions over New Orleans with no preplanning for command and control. The different helicopters had different radios and used different frequencies, creating a dangerous situation for mid-air collisions in an area with little or no air traffic control.[169] Beyond the safety issue, National Guard and DOD active duty assets operated under their own tasking orders, which sometimes led to duplication.[170] Search and rescue coordination problems are discussed in more detail later in this chapter.

Another Louisiana example illustrating integration problems is the area of communication. The 35th Infantry Division, a National Guard unit, arrived at Belle Chasse Naval Air Station on September 6, and the 82nd Airborne Division, a DOD active duty unit, was to provide them with some communications support. Specifically, the 35th Infantry Division had forwarded its frequency and network requirements and the 82nd Airborne Division was to provide frequency management support – providing specific frequencies to use. However, after the arrival of the 35th, there was still confusion over what frequencies to use because many systems were already using the assigned frequency. The 35th Infantry Division did not have the proper equipment to de-conflict the frequency use, and could not obtain it until September 12, almost a week later.[171] For more information on communication difficulties during Hurricane Katrina, see chapter on COMMUNICATIONS.

Finding: Northern Command does not have adequate insight into state response capabilities or adequate interface with governors, which contributed to a lack of mutual understanding and trust during the Katrina response

> "There must be a strong agreement between state and federal leadership as to the operational objectives. State concerns about maintaining sovereignty must be respected."[172] ***General H Steven Blum, Chief, National Guard Bureau***

> "Admiral Keating, who heads US NORTHCOM, a newly created military body overseeing homeland defense, has told lawmakers that active-duty forces should be given complete authority for responding to catastrophic disasters. . . . The head of the Washington State National Guard, General Timothy Lowenberg, suggested in emails to colleagues that Admiral Keating's suggestion amounted to a "policy of domestic regime change."[173] ***Wall Street Journal, December 8, 2005***

On Friday, September 1, the President offered to place Honoré under the joint command of Northern Command and Governor Blanco. Under this proposal, Honoré would have commanded both active duty U.S. military forces and the Louisiana National Guard, subject to the command of the Governor with respect to the Guard and Northern Command with respect to the federal active duty troops. Governor Blanco declined this offer, leaving Honoré and Northern Command in charge of the federal active troops and Landrenau and Blanco in charge of the Louisiana National Guard.

The Governors of the Gulf states chose not to relinquish command of the National Guard units in their respective states. While better coordination of the military

effort may have resulted if one commander were in charge of all aspects of military support, the Governor had confidence in Landreneau and saw no need for an added layer of command.

The Department of Defense was eager to assist the Gulf states. The establishment of JTF Katrina to coordinate the military response and the command's desire to help made state sovereignty an issue during the Katrina response.[174] Florida, Alabama, and Mississippi declined active duty military assistance, but active duty units pre-positioning at active duty bases in Mississippi operated smoothly with the Mississippi National Guard. Therefore, the issue of federalism played out in Louisiana. Resolving this issue may have slowed the active duty military response and contributed to tension in the state-federal relationship. In the end, there was a dual military response to Hurricane Katrina in Louisiana. Honoré commanded the active duty military response, and Landreneau commanded the Louisiana National Guard response.

The failure of DOD, governors, and other state officials to actively participate in joint planning for emergencies, both natural and man-made, that occurred within Northern Command's area of responsibility contributed to the tension. There were too few "civilian authorities" in DOD's military assistance to civilian authority planning. As Northern Command lamented it did not have adequate insight into the states, the Gulf governors also lacked insight into the operations of Northern Command.

In Northern Command's Master Exercise Summary Report on ARDENT SENTRY/TOPOFF 3, concern was expressed that Northern Command "does not have adequate insight into state response capabilities (responders, medical systems, National Guard, etc.) and other federal capabilities (contracts, FEMA, DHHS, etc). . . . This lack of understanding could contribute to off-target planning for potential active duty DoD roles and missions." [175]

DOD understands the different capabilities of Transportation Command, Forces Command, 1st Army, 5th Army, the Air Force, the Marine Corps, the Navy and role and capabilities of Joint Forces Command, Northern Command and Joint Task Force Katrina, but the Governor of Louisiana did not. In a September 19 interview with Gannett News Service, Blanco commented on the difficulties of communicating her request for troops. She said others asked, "Did you ask for this; did you ask for that[?] It got to be a very difficult little game," she said.[176]

DOD and DHS have not adequately defined what is required for military assistance to civilian authorities during large disasters.

One cause of this misunderstanding is that DOD and DHS have not adequately defined what is required for military assistance to civilian authorities during large disasters. According to McHale, "It has never been the plan, nor has the Department of Defense been trained, resourced and equipped to provide a first responder capability."[177]

According to a September 2003 report to Congress on DOD's role in supporting homeland security missions:

> [The] Chairman [of the] Joint Chiefs of Staff, **maintains visibility** of National Guard assets performing homeland security missions. . . . Moreover, NORTHCOM and PACOM must have **insight** into state-controlled National Guard operations to facilitate coordination between Title 10 and Title 32 or State Active Duty military operations, which might be occurring in the same area, at the same time, towards a common goal. [emphasis added][178]

Honoré was not familiar with emergency operational procedures and personnel within the Katrina states. According to Blum, granting him a state commission without the knowledge and understanding of the state's operational environment would not necessarily have added anything to the response.[179] The Gulf coast governors, with their close relationships to state Adjutants General and common experiences with past emergencies, shared that view.[180]

Admiral Keating, the Commander of Northern Command has acknowledged that there are advantages to having a National Guard officer in command of homeland response:

> The advantages of using a N[ational] G[uard] officer during a disaster are: (1) the overwhelming majority of forces that respond to disasters are/will

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> be National Guard who will usually be on the scene in a state active duty status before DOD is requested to respond; (2) the NG is familiar with the local area and the local culture; (3) the NG usually has close ties with first responders such as local and state law enforcement, fire departments, etc.; and (4) the local community knows and relies upon the NG because they are part of the community. . . . NG personnel are more likely to have more experience working with local responders than the active component. A disadvantage of using a NG officer is: NG commanders might not be familiar with federal capabilities brought to the table, especially those from Navy and Marines.[181]

Some of the Adjutants General from the Gulf states and around the country believe the much needed integration, trust, and increased understanding by state officials of what constitutes joint military assistance would improve if Northern Command were a National Guard Command, led by an experienced National Guard officer.[182]

Northern Command's mission is to "deter, prevent, and defeat threats and aggression aimed at the United States."[183] It also has a mission to "provide defense support of civil authorities."[184] During a national emergency within the United States, NORTHCOM requires policies and procedures for interaction with state officials. The absence of these policies hampered the Katrina response.

The Select Committee does not believe there is a simple answer to improving state and federal integration. Local control and state sovereignty are important principles rooted in the nation's birth that cannot be discarded merely to achieve more efficient joint military operations on American soil.

Finding: Even DOD lacked situational awareness of post-landfall conditions, which contributed to a slower response

The Department of Defense has significant assets for the collection of intelligence, as well as communications and satellite equipment needed in all military operations. These assets are at the very heart of conducting comprehensive and directed military operations around the world, and were not optimally used during the Katrina response. For example, the Select Committee found little evidence that DOD satellite imagery was used to great advantage to target relief to the hardest hit areas, nor was information resulting from DOD aerial damage assessment flights properly disseminated. Lack of a unified data collection system among DOD military and civilian personnel also forced the Department to rely on other sources.

Department of Defense documents indicated an unusual reliance on news reports to obtain information on what was happening on the ground in the days immediately following landfall. It appeared the Department also relied on the press for initial damage assessment in New Orleans. Reliance on often unsubstantiated press stories appeared to make DOD reactive instead of a leading participant in the response.

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DOD e-mail and JTF Katrina Commander's Assessments cited press as the source of the information on looting, the situation at the Superdome, other shelters, and the New Orleans Hyatt.[185] E-mail from private sources to Honoré and McHale about people needing to be rescued at Xavier University and the Salvation Army Building in New Orleans were acted on. In the Xavier case, Honoré dispatched a reconnaissance team based on this

information.[186] An e-mail dated August 30 from a colonel from the National Guard Bureau noted that Northern Command, First Army, and Fifth Army commanders could not make contact with the Louisiana State Adjutant General.[187]

Keating stated that the biggest challenge for Northern Command was "gaining and maintaining situational awareness as to the catastrophic disaster."[188] This also came as no surprise to McHale, who commented that "early situational awareness was poor, a problem that should have been corrected following identical damage assessment challenges during Hurricane Andrew."[189]

Finding: DOD lacked an information sharing protocol that would have enhanced joint situational awareness and communications between all military components

According to a National Guard assessment, JTF Katrina "had limited visibility on in-transit forces" being deployed. There was no system in place to track all active duty or Guard "forces and material from ports of embarkation" through distribution.[190] For example, an August 29 e-mail generated in the Office of the Secretary of Defense indicated concern over a Navy ship that announced its deployment without legal authority or Secretary of Defense approval.[191]

Information flowing up from the National Guard state headquarters or the National Guard Bureau also did not always make its way to the JTF Katrina commander. An August 31 e-mail confirmed that 1st Army and 5th Army headquarters could not communicate directly with the Louisiana Defense Coordinating Officer, which prevented the JTF Katrina commander from knowing what Guard assets were streaming into New Orleans at the time. On September 1, a general officer at NORTHCOM complained he had not been getting e-mail from the DCOs for two days.[192]

The Office of the Assistant Secretary of Defense for Homeland Defense also had problems keeping track of what DOD capabilities were being utilized and what tasks had been performed for the Homeland Defense Secretary. In a September 4 e-mail, some questions posed were:

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> How many MREs have been made available by DoD? . .
> What is the # of hospital beds on USN ships?. . .
> What is the status of aerial surveillance capability? . . .
> What is [the] status of the New Orleans Police Department?
> How linked up is the Guard with NOPD?[193]

There was also a request: "Need a daily DoD roll-up matrix: What we're doing, Who's doing it, [and w]hat's the progress?[194]

During the TOPOFF 3 and ARDENT SENTRY 05 exercises, NORTHCOM learned that

> . . . the ground rules for the channel of communications between USNORTHCOM, NGB J[oint] O[perations] C[enter] and State National Guard JOCs is largely undefined. There is not an agreement that delineates reporting responsibilities for force readiness and disaster response planning. Needed is a framework and an agreed on channel of communications to ensure the flow of information between USNORTHCOM, NGB and State National Guard JOCs is timely and complete.[195]

Yet, during Katrina, the National Guard Bureau learned NORTHCOM did not standardize reporting guidelines.[196] E-mails, logs, and daily briefings indicated a great flow of information between DOD component headquarters and the National Guard Bureau. There also appeared to be numerous mechanisms to assist in integrating federal and state operations. These included the establishment of a National Guard desk at the National Military Command Center, Guard representation in the Northern Command Joint Operations Center, web portals, daily conference calls, and e-mail situation updates to key leaders.[197] However the Select Committee could find no

reporting requirements for sharing important information between DOD entities. Blum, however, noted that "these efforts, while effective, cannot be expected to overcome the inability of forces on the ground to effectively share information."[198]

Finding: Joint Task Force Katrina command staff lacked joint training, which contributed to the lack of coordination between active duty components

Hurricane Katrina required the Army, Air Force, Navy, and Marine Corps to work together in an emergency mission in the continental United States. Although skilled and trained in war-fighting missions abroad, conducting joint missions in this country, quickly, and under tremendous public pressure, posed integration challenges. One of the findings in an after action report from the Department of the Navy stated: "Service cultural issues seemed to dominate in a negative fashion."[199]

> The core element of the JTF is formed by the 1st Army Staff. There is a perception that JTF is in essence, an Army T[ask] F[orce], with joint augmentation and that this disposition colors their decision making processes and view of the conduct of operations. . . . In a crisis, organizations play to their strengths and [tend] to disregard unfamiliar capabilities or concepts.[200]

Retired Coast Guard Vice Admiral Jim Hull was asked by Northern Command to assess the command's Katrina response. Hull's observations were critical of JTF Katrina, noting that the capabilities of 1st Army headquarters, which formed the nucleus of JTF Katrina, "was not organized or resourced to operate as a Joint Task Force."[201] Specific challenges ranged from inexperienced personnel to lack of communications and equipment. "The JTF is an ad-hoc organization doing the best it can without the resources necessary to make it an optimal enabler," he said. Hull noted that as Honoré made command decisions away from his headquarters, his staff was not always informed. "We track General Honoré's location by watching CNN," JTF Katrina staff said.

AP PHOTO/BILL HABER

The Department of the Navy Emergency Preparedness Liaison Officer Program in a September 12 After Action Report listed key problems within JTF Katrina:

> Joint Doctrine was largely ignored. In the melee of the first few days where lives literally hung in the balance, perhaps this was a necessary course of action. However, as the Active Duty Force began to develop, the JTF Katrina headquarters never transitioned from the very tactical mindset of life saving to the operational mindset of sustaining and enabling a Joint Force. Since the Forward Command Element (General Honoré) was unable to communicate, they became embroiled and distracted with the tactical and were unable to focus on even the most basic of operational issues…. Other units who were responding from outside the area to integrate with what was called a "Joint" task force expected certain doctrinal norms which materialized very slowly or not at all.[202]

The report also remarked that since the JTF did not establish a commander for all land components, 1st Army, 5th Army, and the Marine Corps were unclear on JTF Katrina expectations, causing confusion and lack of coordination between land forces in New Orleans.[203] The effects of the difficulties with creating and sustaining a truly joint effort were visible on the ground in Louisiana, especially during later evacuation efforts, and the patrolling of New Orleans parishes.

Finding: Joint task force Katrina, the National Guard, Louisiana, and Mississippi lacked needed communications equipment and the interoperability required for seamless on the ground coordination

Reliable communications were the exception in the aftermath of Katrina. Even Honoré experienced communications problems. Honoré moved into Camp Shelby before he had the communications equipment necessary to support JTF Katrina.[204] Honoré's staff was frustrated at the lack of communications equipment. According to a Navy after action report, "At this stage it is believed that when the commander leaves Camp Shelby in the morning and returns in the evening, the staff's only access to communicate with him is through a borrowed Nextel cell phone and his Blackberry.[205] The Navy reported the USS IWO JIMA did have task force-capable communications equipment during the first ten days of the storm that would have been of great help to General Honoré.[206]

Blum also noted that "one critical area where we lack integration is in interoperable communications. National Guard units do not have the equipment necessary to effectively share information with Title 10 forces. This caused significant challenges on the ground that then bubbled up the chains."[207]

At the time of Katrina, Northern Command had yet to establish standardized communications architecture or to identify the system and information requirements to be used during homeland response operations.[208] Oxford Analytica reported:

> Since September 11, emergency response planners have recognized that during a major disaster, local communications systems would be disrupted or disabled, and communication between federal, state, and local officials is a particularly weak link in coordinating emergency response. Katrina showed that little has been accomplished to fix this disconnect. Within the military, the National Guard was hindered by a shortage of communications equipment. These shortcomings suggest that the Pentagon does not assign homeland defense a sufficiently high priority.[209]

The loss of communications infrastructure in Mississippi and Louisiana due to hurricane forces caused a great deal of confusion for days following landfall. Communication outages that occurred in state emergency offices also caused problems in situational awareness. The state Adjutant General of Mississippi on the Gulf coast could not reach the Mississippi Emergency Management Agency in Jackson until two days after landfall.[210] When cell phones and towers were destroyed or lost power, states were not equipped with backup communications capabilities even with Guard forces. According to Cross:

> One of the biggest lessons learned was the need to adequate, redundant communications systems with an emphasis on satellite backhaul capability in the event of cellular and landline failure. Obviously, this type of equipment requires resourcing. The Mississippi National Guard received $29,100 for fiscal year 2005 for Military Support to Civil Authorities. $8,000 of this amount was applied to pay the satellite phone service bill for the seven satellite phones currently on hand. In order for the Mississippi National Guard to be prepared to respond to catastrophic events, it must be funded accordingly.[211]

The Louisiana National Guard also experienced problems with lost or weak communications infrastructure.[212] Immediately after Hurricane Katrina passed, the Industrial Canal levee broke, flooding the National Guard headquarters at Jackson Barracks. The Guard had to abandon its headquarters operations center and establish a new one, including new communications connections, at the Superdome. Re-establishing these communications was greatly facilitated by the arrival of the state's Weapons of Mass Destruction (WMD) Civil Support Team (CST) and its emergency communications suite.

However, the National Guard in Louisiana was also plagued by problems with the state's 800 MegaHertz public safety radio system, which it shares with the state's law enforcement and other public safety agencies. State officials said this system was about 11 years old and

limited to 48 channels.[213] They said it was not designed to handle thousands of calls, so the volume of calls after Hurricane Katrina overloaded the system. In addition, one of the state's three 800 MegaHerz relay towers, the Buras tower in Plaquemines Parish, was toppled by the hurricane, which further degraded the capacity of the system.[214] Louisiana National Guard officials cited the weaknesses in this system as one of the reasons they had problems communicating with the state's Emergency Operations Center in Baton Rouge.[215]

The National Guard Bureau confirmed that its liaison teams should also be deployed with significant mobile communications.[216] The Louisiana NGB Liaison Officer was equipped with a satellite phone, which was critical during the first days of response.[217]

Finding: EMAC processing, pre-arranged state compacts, and Guard equipment packages need improvement

Although there was a consensus among federal, state, and local officials that Emergency Mutual Assistant Compacts worked very well, the current EMAC approval process is cumbersome, and therefore not fast or suited to a large scale emergency. While initial Adjutant General to Adjutant General coordination allowed for rapid deployment of National Guard forces during Katrina, the sheer size of the emergency pointed out weaknesses in the current system.

As key communications infrastructure was taken out, the ability to negotiate state-to-state compacts became difficult, if not impossible. In the hours immediately following landfall, when it was needed most, offers of assistance from states all over the country were delayed in the EMAC process, as other states' invaluable assets were not immediately visible to the states affected.

The National Guard Bureau stepped in to help the Gulf state Adjutants General prior to landfall, and increased its management of requests for National Guard forces throughout the response, but some states still used the standard EMAC process through the National Coordinating Committee (NCC). As both the National

The current EMAC approval process is cumbersome, and therefore not fast or suited to a large scale emergency.

Guard Bureau and the NCC tried to anticipate requests, this dual track approach for requesting troops caused confusion and duplicated efforts. Better coordination between the NGB and the NCC was needed.[218]

In addition, not all National Guard personnel are trained in the EMAC process. Louisiana National Guard officers seemed to lack the knowledge and experience necessary to manage the tremendous surge of requests for assistance, as well as field offers from other states under EMAC. This inexperience was one of the reasons the National Guard Bureau played an unusually large role in the EMAC process.[219]

More familiarity with the EMAC procedures and assets by Northern Command and other federal forces would also have enhanced joint response efforts and given them a better appreciation of National Guard capabilities.[220]

Finding: Equipment, personnel, and training shortfalls affected the National Guard response

Needed equipment and manpower

The Army National Guard relied heavily on its aviation units and found that helicopter hoist-equipped aircraft resulted in immediate and successful search and rescue operations. Current Army doctrine, however, does not provide sufficient numbers of hoist-equipped aircraft to its Guard counterpart, nor stage them regionally to support responses to events of significant size.[221] For example, the Mississippi National Guard needed more airlift and helicopters immediately. Cross suggested pre-arranged state compacts for hurricane assets, especially search and rescue aviation assets, would make these assets more readily available and not run the risk they could not be obtained through EMAC requests.[222]

The Air National Guard also relied heavily on its airlift capabilities during Hurricane Katrina. The Air National Guard flew 351 missions with C-130s between August 30 and September 6.[223] Air National Guard personnel reported that:

> The C-130 is the ANG work horse, moving equipment for the National Guard such as CST's, EMEDS, and civil engineering equipment into areas with moderate to heavy infrastructure damage…the Guard can't have enough of them for responding to major homeland emergencies…they are essential.[224]

> New aircraft like the C-17 are better suited to carry over-size equipment such as the Rapid Engineer Deployable Operational Repair Squadron Engineer (RED HORSE) Squadrons, but the limited number of C-17s in inventory require its use to take care of war fighting requirements overseas. This 404-person mobile construction squadron does it all: rapid damage assessment, repair, contingency heavy construction operations such as roads and ramps.[225] Red Horse Squadrons were invaluable during Katrina.[226]

At the time of Katrina's landfall, Northern Command had not yet articulated specific requirements or capabilities that National Guard forces need during major homeland disasters.[227] Without established formal requirements, the equipment deemed necessary for the National Guard to assist civilian authorities in Katrina had not been purchased by the Department of the Army and the Department of the Air Force. The military departments only establish units and procure equipment for which formal mission requirements have been validated, like Title 10 warfighting missions abroad. Northern Command has yet to determine — with or without input from DHS — which specific military assets should be dedicated to provide military assistance to civilian authorities, in part because DHS has not articulated the requirement to DOD in any formal manner.[228] Therefore, at the present time, DOD does not require the purchase of equipment specifically for homeland defense or military assistance to civilian authorities for the National Guard.

Attempts to rent needed equipment were complicated by the great demand for heavy machinery created by the storm. Cross noted that contractors responding to other federal, state, and local requests for assistance leased the same type of equipment sought by the National Guard, leaving little available for National Guard use.[229]

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In a National Guard After Action Review dated September 2005, it was strongly recommended that the Department of Defense "identify the Continental United States mission as a valid requirement and equip it as a valid tasking."[230]

> "I was there. I saw what needed to be done. They were the fastest, best capable, most appropriate force to get there in the time allowed. And that's what it's all about." ***General Blum***[231]

Hurricane Katrina required significant National Guard manpower, and quickly. With the current level of 457,000 personnel in the National Guard, the Katrina response demonstrated the Guard response was not hindered by the deployment of Guard troops to support the War on Terrorism. According to Blum, although National Guard from the affected states were deployed overseas, Guardsmen from surrounding, and then other states quickly supplemented the effort.[232] At landfall, over 40 percent of the Mississippi Guard, some 4,200 troops, were deployed overseas. Fortunately, critical engineering units and military police units were home.[233] In Louisiana, Blanco asked for the immediate return of Louisiana National Guard troops from Iraq, but the National Guard Bureau was satisfied it could provide sufficient troops from other states to meet the needs of Louisiana more quickly than trying to extract Louisiana troops from combat operations in Iraq.[234] The Joint Staff and Center for Army Lessons Learned were very impressed at the ability of the Guard to mobilize and move a Corps worth of personnel and equipment in four days.[235]

Nonetheless, organizational challenges surfaced in this rapid deployment. The National Guard forces flowing

into the staging areas at Alexandria, Louisiana, and to the Naval Air Station New Orleans at Belle Chasse arrived so quickly that the number of Guardsmen assigned to process and task these units was too small.[236] The capabilities of each unit were not readily known by the logistics personnel tasking officers, causing further delays.

A lack of well defined personnel and equipment packages by the Department of Defense to support civilian authorities in large disasters degraded instant tasking of units deployed to Louisiana.[237] General DOD development of regional strike forces composed of various National Guard units would have done a great deal to mitigate the effects of a large natural disaster or other catastrophic event: "Hurricane equipment packages for the Guard should be developed by the Department of Defense to help them provide more adequate assistance to civilian authorities in the future, Cross said."[238]

Current law hindered some congressionally mandated National Guard Civil Support Teams' response

Congress established WMD Civil Support Teams (CSTs) to deploy rapidly to assist local incident commanders in determining the nature and extent of an attack or incident; provide expert technical advice on WMD response operations; and help identify and support the arrival of follow-on state and federal military response assets.[239] The first 10 teams were funded as part of the National Defense Appropriations Act for FY 1999. Each team consists of 22 highly skilled, full-time National Guard members who are federally resourced, trained, and exercised in chemical, biological, and nuclear specialties, and skilled in reconnaissance, medical support, logistics, administration, communications, air liaison, and security.[240]

In these capacities, especially the use of their communications vehicles, the National Guard CSTs proved invaluable to the Katrina response. On September 2, a JTF Katrina official relayed a report from the National Guard Bureau that CSTs from Connecticut, North Carolina, Nebraska, Utah, Arkansas, West Virginia, Indiana, Kansas, Alabama, and the District of Columbia were on route to the Gulf Coast.[241]

During Katrina, there was confusion regarding the legal aspects of CST deployment, as some states interpreted the law to mean they were only authorized to be used for WMD incidents, and only in their states.[242] This interpretation delayed deployment of these vehicles to Mississippi. Lieutenant Colonel Smithson of the Mississippi National Guard said, "CSTs saved the day, I just wish they were here sooner."[243] Clarifying that they are available for use beyond WMD events would have greatly enhanced states abilities to react quickly to the Katrina disaster. [244]

Guard personnel categories caused confusion

Multiple types of duty status of National Guard personnel presented some legal challenges in the proper employment of forces.[245] State military lawyers interpreted laws, regulations, and policies pertaining to the various statuses and units of assignment very differently, which caused unnecessary delays. Delays in the Title 32 approval process, previously identified, added to the difficulty. The National Guard Bureau May 23, 2005 after action report on TOPOFF 3 found:

> As highlighted in Operation Winter Freeze, [the Democratic National Convention, the Republican National Convention] and [the] G-8 summit, and further during Ardent Sentry 05 events, the T[itle] 10/ T[itle] 32 approval process must be standardized. Current process is lengthy, largely undefined, and requires excessive time periods for approval.[246]

E-mails from various state Adjutants General began to arrive at the National Guard Bureau immediately after landfall inquiring about changing all Guard response to Title 32.[247] The National Guard Bureau agreed with these suggestions and began to actively discuss this status change with the Department of Defense.[248] On September 2, 4 and 5 respectively, Governor Riley of Alabama, Governor Barbour of Mississippi, and Governor Blanco of Louisiana wrote to the Secretary of Defense to formally ask that all National Guard personnel responding in their states be put on Title 32, Chapter 9, a new operational section of Title 32 that allows for the National Guard to perform homeland missions under governor control.[249]

The Select Committee believes the Guard response in Katrina would have been more effective had the decision to place National Guard troops in Title 32 status been made earlier by the governors, the National Guard Bureau, and the Secretary of Defense.

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Lack of unified DOD support for enhanced Guard resources under Title 32

A September 10 NGB e-mail to Blum indicated frustration at the lack of understanding by the Army and Air Force and some DOD offices of Title 32 and the resources that were to flow to the National Guard of states participating in the Katrina response.[250] Currently, there are no clear directives for the use of Title 32 National Guard homeland missions, so the confusion was not unexpected. The e-mail indicates, however, that some officials in DOD did not totally embrace the use of Title 32 during the Katrina response. The e-mail stated specifically that the Principal Deputy Assistant Secretary of Defense for Reserve Affairs, Craig Duehring, expressed that Title 32 would only apply to the three affected states; that Service Secretaries must get approval from the Deputy Secretary of Personnel and Readiness before issuing any orders; and that the Office of Reserve Affairs will "run this" and have a matrix of needed information that will be required before any consideration is given to funding of Guard activities. Even though the Deputy Secretary of Defense approved use of Title 32 on September 7, uncertainty within the Pentagon on Title 32 parameters, required the National Guard Bureau to ensure Title 32 status for those states who had rushed in to help.[251]

Lack of training for Military Assistance to Law Enforcement (MSCLEA)

Before the storm, the Louisiana National Guard opened the Superdome for evacuees with a minimal number of staff, many of whom were not military police or formally trained for crowd control operations. On Monday night, August 29, when an increased number of Louisiana National Guard arrived at the Superdome, they found many Guard personnel working at checkpoints alone, with no hand held radios, and unarmed. Though the crowd was generally peaceful, even when the plumbing failed, these soldiers were in a volatile situation they were not trained to handle.[252] An Army National Guard after action report dated December 21 found these Guard personnel were not properly trained to respond to areas where there are a large number of civilians, resulting in risk to their safety and the safety of others.[253] McHale indicated the Pentagon is interested in enhanced training for National Guard in this homeland role. "I think we will be looking at formalizing the training, equipment and deployment capability associated with National Guard military police units," McHale said.[254]

Finding: Search and rescue operations were a tremendous success, but coordination and integration between the military services, the National Guard, the Coast Guard, and other local, state, and federal rescue organizations was lacking

"During the first four days, no single organization or agency was in charge of providing a coordinated effort for rescue operations."[255] ***Admiral Timothy Keating, Commander, NORTHERN COMMAND***

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Urban search and rescue operations are multi-agency in nature and no standardized federal system currently exists to effectively integrate operations. The lack of a coordination mechanism and standardized processes led to duplication of effort in some locations

and a lack of response in others. Each military entity relied on its own airspace coordinators during the first critical days, which also contributed to a lack of awareness of who was doing what.

In New Orleans, the Louisiana National Guard and the U.S. Coast Guard maintained separate tactical operations centers for airborne search and rescue missions. The National Guard had its tactical operations center with Task Force Eagle at the Superdome, and the Coast Guard had its tactical operations center at Belle Chasse Naval Air Station. The two entities divided up areas and ran separate operations.

Because of the urgent emphasis on getting victims to high ground, the drop-off points were not well coordinated. While some were dropped off at the Superdome (which provided shelter, food, and water), others were dropped off at the Convention Center (which provided only shelter), and others were dropped off on freeway overpasses or levees (with nothing at all). The philosophy at that point was to save first, then worry later about providing other relief.[256] This situation resulted in people being saved from the floodwaters, but then suffering — some for days — in sweltering conditions with or without food and water. ■

[1] *Hearing on Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama Before Select Comm.*, 109th Cong. (Oct. 27, 2005) (written statement of Paul McHale, Assistant Secretary of Defense for Homeland Defense at 4) [hereinafter *Oct. 27, 2005 Select Comm. Hearing*].

[2] *Id.* at 8.

[3] *Id.* at 6.

[4] *Joint Hearing on Role of the Military and National Guard in Disaster Responses Before the House Armed Services Subcommittee on Terrorism, Unconventional Threats and Capabilities and the House Homeland Security Subcommittee on Emergency Preparedness, Science, and Technology,* 109th Cong. (Nov. 9, 2005) at 7 (written statement of Paul McHale, Assistant Secretary of Defense for Homeland Defense) [hereinafter *Nov. 9, 2005 Joint Armed Services and Homeland Hearing*].

[5] *Hearing Before Base Realignment and Closure Commission* (Aug. 11, 2005) at 34 (statements of Harold Gehman, 2005 BRAC Commissioner, and Peter Verga, Principal Deputy Assistant Secretary of Defense for Homeland Defense) [hereinafter *Aug. 11, 2005 BRAC Commission Hearing*].

[6] E-mail correspondence from Col. Richard Chavez, Senior Military Advisor for Civil Support to Anthony Capra, Office of Assistant Secretary of Defense for Homeland Defense, et al., (Aug. 30, 2005) (12:18 p.m.).

[7] E-mail correspondence from InSung Oaks Lee, Senior Watch Officer, Department of Homeland Security [hereinafter DHS] to Homeland Security Operations Center [hereinafter HSOC] Federal Emergency Management Agency [hereinafter FEMA] mailing list, et al. (Aug. 30, 2005) (10:43 a.m.).

[8] *See generally* E-mail correspondence from Anthony Capra, OASD Homeland Defense, Department of Defense [hereinafter DOD] Desk to Michael Ritchie, Office of the Secretary of Defense, Policy, (Aug. 29, 2005) (12:15 p.m.); E-mail correspondence from Anthony Capra, OASD Homeland Defense Desk, DOD Desk to DOD HD Coordination Group, et al. (Aug. 30, 2005) (10:54 a.m..); E-mail correspondence from Col. Richard Chavez, Senior Military Advisor for Civil Support, DOD to Anthony Capra, OASD Homeland Defense Desk, DOD Desk, et al. (Aug. 30, 2005) (12:18 p.m.); E-mail correspondence from Anthony Capra, OASD Homeland Defense Desk, DOD Desk to Col. Richard Chavez, Senior Military Advisor for Civil Support, DOD (Aug. 30, 2005) (11:36 a.m.); *see also* E-mail correspondence between DOD HSOC and FEMA HSOC (Sept. 3-4, 2005).

[9] *See generally* E-mail correspondence between policy staff of Office of Secretary for Defense (Sept, 5, 2005).

[10] *Oct. 27, 2005 Select Comm. Hearing* at 10 (written statement of Adm. Timothy Keating, Commander, North American Aerospace Defense Command [hereinafter NORAD] and U.S. Northern Command [hereinafter NORTHCOM]).

[11] *See Hearing on Hurricane Katrina: The Role of the Federal Emergency Management Agency Before Select Comm.*, 109th Cong. at 34-35, 162 (Sept. 27, 2005) (statement of Michael Brown, Former Director, FEMA) [hereinafter *Sept. 27, 2005 Select Comm. Hearing*].

[12] Mark Sappenfield, *Battle Brews Over a Bigger Military Role*, CHRISTIAN SCI. MONITOR, Dec. 13, 2005 at 3.

[13] Interview by Select Comm. Staff with Andrew Kopplin, Chief of Staff to Gov. Kathleen Blanco, State of LA [hereinafter Kopplin Interview] in Baton Rouge, LA (Nov. 6, 2005); Interview by Select Comm. Staff with Jeff Smith, LA State Coordinating Officer, in Baton Rouge, LA (Nov. 7, 2005).

[14] Kopplin Interview; Interview by Select Comm. Staff with Col. Stephen Dabadie, Chief of Staff to Maj. Gen. Bennett C. Landreneau, The Adjutant General, State of LA [hereinafter Dabadie Interview] in Baton Rouge, LA (Nov. 4, 2005).

[15] Interview by Select Comm. Staff with Scott Wells, Deputy Federal Coordinating Officer, FEMA, in Baton Rouge, LA [hereinafter Wells Interview] (Nov. 9, 2005).

[16] *Sept. 27, 2005 Select Comm. Hearing* at 34-35, 84, 109, 112, 113, 126, 161 (statement of Michael Brown, Former Director, FEMA).

[17] *See Oct. 27, 2005 Select Comm. Hearing* at 127 (statement of Adm. Timothy Keating, Commander, NORAD-NORTHCOM and statement of Paul McHale, Assistant Secretary of Defense for Homeland Defense); Interview by Select Comm. Staff with Bill Lokey, Federal Coordinating Officer for LA, FEMA in Washington, DC [hereinafter Lokey Interview] (Dec. 2, 2005); Wells Interview.

[18] Kopplin Interview.

[19] Lokey Interview.

[20] *Nov. 9, 2005 Joint Armed Services and Homeland Hearing* (written statement of Lt. Gen. H. Steven Blum, Chief, National Guard Bureau [hereinafter NGB] at 2-3).

[21] Interview by Select Comm. Staff with Lt. Gen. Steven Blum, Chief, NGB, Lt. Gen. Daniel James, III, Director, Air National Guard, and Lt. Gen. Clyde A. Vaughn, United States Army, Director, Army National Guard [hereinafter Blum, James, and Vaughn Interview] in Arlington, VA (Dec. 19, 2005).

[22] *Oct. 27, 2005 Select Comm. Hearing* (written response to questions for the record of Lt. Gen. Steven Blum, Chief, NGB).

[23] *See* NGB, *Hurricane Katrina, National Guard After Action Review Observations, National Guard Timeline*, at 17 [hereinafter *National Guard Timeline as of Dec. 21, 2005*] (Dec. 21, 2005).

[24] Interview by Select Comm. Staff with Brig. Gen. Pete Aylward, NGB, Liaison Officer assigned to Lt. Gen. Russell Honoré, First US Army, Commanding General, in Arlington, VA (Jan. 5, 2006); Memorandum from Acting Deputy Secretary of Defense Gordon England for Secretaries of the Military Departments, Chairman of the Joint Chiefs of Staff, Undersecretaries of Defense, Commander, United States Northern Command, Assistant Secretaries of Defense, and General Counsel, DOD (Sept. 9, 2005).

[25] See National Guard Timeline as of Dec. 21, 2005 at 13.

[26] Director of Army National Guard, *DARNG Katrina* [hereinafter Dec. 19, 2005 Army National Guard Binder] (Dec. 19, 2005).

[27] *Id.*

[28] *See* Dec. 19, 2005 Army National Guard Binder; National Guard Timeline as of Dec. 21, 2005 at 14; E-mail correspondence from Lt. Gen. Steven Blum, Chief, NGB to National Guard Adjutants General, et al. (Aug. 31, 2005) (10:01 a.m.).

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"The members of the public safety community aggressively moved into areas immediately after the storm passed and saved many lives and brought order. This was a very difficult mission as much of the public safety infrastructure, police and sheriff's stations, patrol cars, and communications had been destroyed in the coastal communities."

WILLIAM L. CARWILE, III
Hurricane Katrina Federal Coordination Officer for Mississippi
Select Committee hearing, December 7, 2005

The collapse of law enforcement and the lack of effective public communications led to civil unrest and further delayed relief

Summary

A wide variety of conditions led to lawlessness and violence in areas hit by Hurricane Katrina. Lack of food, water, and electricity. Uncertainty about evacuations. Even the loss of hope. Looting occurred in several locations. In some cases, people looted stores for their survival and to diminish suffering, taking items such as food, water, clothing, flashlights, batteries, and camping supplies. At least some police departments were involved in breaking into stores and commandeering supplies needed for their departments, as well as those needed for feeding people in shelters before state or federal assistance arrived. One New Orleans physician said police helped him break into a pharmacy to get needed medications and supplies. In other cases, people looted for purely criminal purposes, apparently taking items for personal use or resale that would not be needed or were useless without electricity (e.g., televisions).

General unrest and lawlessness arose in crowded areas where people were uncertain about their survival, or rescue, or prospects for evacuation. In some areas, the collapse or absence of law enforcement exacerbated the level of lawlessness and violence. Several police departments lost dispatch and communication capabilities, police vehicles, administrative functions such as booking, and jails to confine arrested suspects. Tremendous additional burdens were imposed on the police, like search and rescue operations, that took priority over normal police functions. The extent of crime and lawlessness is difficult to determine, partly because of the loss of police record keeping during the disaster and partly because of unsubstantiated reporting by the media.

The breakdown of law enforcement was particularly notable in New Orleans. Despite the well-known threat from flooding, the New Orleans Police Department had not taken basic steps to protect its resources and ensure continuity of operations. For example, communications nodes, evidence rooms, and even emergency generators were housed in lower floors susceptible to flooding. When the levees broke and the floodwaters overtook police headquarters and district offices, the department lost its command and control and communications functions. Police vehicles believed to be moved out of harm's way were lost to the floodwaters. Hundreds of New Orleans Police Department officers went missing — some for legitimate reasons and some not — at a time they were needed most. This left the city unable to provide enough manpower and other resources to maintain law and order at shelters and on the streets.

Looting broke out in the downtown section of the city, particularly along Canal Street. There were also reports, currently under investigation by the Louisiana Attorney General, that New Orleans police officers were involved in stealing vehicles from a car dealership. Even when police were present to restore law and order, they did not have the resources to arrest, book, and detain suspects. Other parts of the city, according to witnesses, were relatively calm despite the lack of law enforcement personnel.

Public communications is a key aspect of emergency management, and this function has its own emergency support function in the NRP. In Louisiana, and particularly

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New Orleans, the federal, state, and local governments did not appear to have a public communications strategy to utilize the media. This problem was particularly severe in the area of law enforcement and crime. While the media played a positive role in many aspects — such as providing situational awareness to government authorities — it also played a negative role in the often unsubstantiated reporting of crime and lawlessness, undermining the accuracy and value of that awareness.

AP PHOTO/LM OTERO

New Orleans Mayor Ray Nagin and Police Chief Eddie Compass

Media reports of violence often gave credence to rumors that were either false or highly exaggerated. Public officials did not have a strategy to get ahead of the "information curve" to use the media to the public's advantage and help quell rumors. In fact, Mayor Ray Nagin and the Chief of Police repeated rumors of rampant criminality to the national media, contributing to the exaggerated image of utter lawlessness. Many of these reports, particularly of unchecked violence in the Superdome, appear to have been unsubstantiated. Nevertheless, the hyped media coverage of violence and lawlessness, legitimized by New Orleans authorities, served to delay relief efforts by scaring away truck and bus drivers, increasing the anxiety of those in shelters, and generally increasing the resources that needed to be dedicated to security.

Law and order were eventually restored as local law enforcement officers were removed from search and rescue, reassigned to law enforcement missions, and supplemented first by state National Guard troops, then by other state and local police through the Emergency Management Assistance Compact (EMAC) process. The National Guard played a substantial role in providing security and restoring law and order. The Louisiana National Guard was deployed before landfall, and provided security at the Superdome that helped maintain order there. Once looting broke out in New Orleans, guardsmen also patrolled the streets to restore law and order.

The Alabama National Guard was also deployed before landfall, providing a security task force for Mobile and Baldwin counties. National Guards from other states sent units through the EMAC process to perform security or law enforcement duties. For example, Arkansas provided 310 guardsmen from a military police company to provide security in Mississippi.

While not immediately deployed, Department of Defense (DOD) active duty forces also played a role in restoring and maintaining law and order. For example, the U.S. Army's 82nd Airborne arrived in New Orleans on September 3 (five days after landfall) and, according to the city's Director of Homeland Security, had a "calming effect" on the populace by their mere presence on the street. Precautions were taken to prevent DOD active duty forces from direct law enforcement missions, thereby avoiding Posse Comitatus issues.

Civilian law enforcement agencies from other states and localities also provided personnel through the EMAC process to supplement beleaguered state and local police. For example, South Carolina provided 118 law enforcement personnel with equipment to Mississippi.

Federal law enforcement agencies also played a major role in restoring law and order after Hurricane Katrina. Specific agencies included the U.S. Attorney's Office, the Federal Bureau of Investigation (FBI), the Drug Enforcement Agency (DEA), the Bureau of Alcohol, Tobacco, Firearms and Explosives (ATF), the U.S. Marshal Service (USMS), the U.S. Secret Service, U.S. Customs and Border Protection, the U.S. Border Patrol, U.S. Immigration and Customs Enforcement, and the Federal Air Marshal Service (FAMS). The first priority for most of these agencies was implementing continuity of operations plans — locating their people, securing their workplaces and sensitive information, getting supplemental manpower from other field offices, and otherwise fully restoring their mission capabilities. These federal agencies then turned to assisting state and local law enforcement agencies.

These agencies brought a wide array of capabilities and tactical teams to help restore and maintain law and order. Most of the federal personnel were deputized as state law enforcement officials, so they could fully partner with local police by participating in patrols, investigating crimes, and arresting suspects. The FBI deployed its Critical Incident Response Group and ATF deployed one of its Special Response Teams. ATF located and inspected federal firearms and explosives licensees to determine if their facilities were secure. USMS assisted with evacuating prisoners from flooded jails into federal facilities. FAMS provided security at the New Orleans Airport.

Federal agencies also helped establish interagency and intergovernmental mechanisms — such as common credentialing and a Law Enforcement Coordination Center — to coordinate the activities of the multitude of federal, state, and local law enforcement agencies. Finally, these federal agencies provided equipment, supplies, and other resources to local law enforcement agencies to help them start rebuilding their capabilities.

Finding: A variety of conditions led to lawlessness and violence in hurricane stricken areas

Several conditions led to lawlessness and looting

A wide variety of conditions led to lawlessness and violence in areas hit by Hurricane Katrina. Bobby Strahan, Pearl River County Emergency Management Agency Director, said the lack of critical commodities for those residents who did not evacuate (or returned quickly) and crowds seeking shelter at a limited number of facilities with generators may have been behind some of the post-landfall requests for security and law enforcement assistance.[1] According to Strahan, Pearl River experienced some looting and other crimes in the immediate aftermath of the storm. Once the county was able to secure and distribute limited amounts of food, ice, and water (what it could gather on its own plus assistance from the state of Florida), these security problems largely dissipated.

Similarly, those who did not evacuate (or returned quickly) may have contributed to significant security challenges at some of Mississippi's healthcare facilities in the affected areas. According Dr. Brian Amy, the State Health Officer of Mississippi, most of those facilities had generators and a limited power supply.[2] This caused them to quickly attract the attention of displaced residents, who were drawn to the lights and the possibility they might seek shelter there, and created what Amy termed an "overflow" situation resulting in security issues at the facilities.[3] In Louisiana, officials cited the lack of food, water, electricity, and uncertainty about evacuations as reasons for lawlessness and looting.[4] Even Governor Kathleen Blanco said she sympathized with people who looted stores to survive.[5]

Looting occurred in several locations. Mississippi experienced some looting, armed robbery, and crowd control problems immediately after the storm.[6] Security-related requests the state received from local officials included: (1) nighttime military police (MP) security at pharmacy and drug dispensing operations in several coastal cities; (2) help with security issues at an understaffed shelter that was about to receive evacuees from New Orleans; (3) law enforcement personnel to deal with reported theft and carjacking threats at a medical center in Biloxi; and (4) additional National Guard protection to deal with looters at the South Mississippi Regional Center in Long Beach.[7]

In Louisiana, state police officials said looting was most concentrated in the New Orleans area.[8] However, major looting was generally limited to the Canal Street area and ended by Tuesday, August 30. According to these officials, in some cases people looted stores for their survival, taking items such as food, water, clothing, flashlights, batteries, and camping supplies. In other cases, people looted for criminal purposes, apparently taking items for their personal use or resale that would not be needed or were useless without electricity (e.g., televisions). Once most perpetrators realized they had no way to transport their loot and no place to store it, they often abandoned it. State police officials said several blocks away from the looting area, many large electronic items and appliances were found abandoned in their original boxes.

AP PHOTO/DAVE MARTIN

At least some police departments were involved in breaking into stores and taking supplies. Plaquemines Parish Sheriff Jiff Hingle said his officers broke into stores and commandeered food, water, and medicine.[9] Some of these items were needed to sustain the sheriff's office and other emergency personnel. Most of the items taken,

CHRISTIAN SCIENCE MONITOR/ANDY NELSON

however, were food and medical items for the growing population at the parish's designated shelter of last resort. The shelter had been originally set up to house the police, other emergency workers, and those with special needs. However, after landfall, the shelter became crowded with additional evacuees or people rescued by boat. Eventually the numbers increased to about 400, and since state and federal relief was slow in arriving, the sheriff's officers commandeered needed items. The sheriff said he later contacted the stores and asked for forgiveness, which was granted under the circumstances.

In Alabama, there were almost no reports of lawlessness, looting, or other crimes. Officials said this was because Hurricane Katrina did not hit Alabama as hard as it hit the other states.[10] In addition, Alabama's law enforcement infrastructure was not as severely damaged and remained functional in the immediate aftermath of the hurricane.

General unrest and violence occurred in crowded areas

General unrest and lawlessness arose primarily in crowded areas where people were uncertain about their survival, or rescue, or prospects for evacuation. For example, local officials in Mississippi asked the state to send National Guard soldiers to provide security and crowd control at a Red Cross shelter because of "chaotic conditions" and the shelter director's belief that help was needed to prevent "potential behavioral problems."[11] Some of the most notorious locations for unrest were in New Orleans, at the Superdome, the Convention Center, and the Cloverleaf, as discussed in the EVACUATION chapter. The conditions at the Superdome, as described in a National Guard report, illustrate the desperation felt by the crowd inside:

AP PHOTO/DAVE MARTIN

> The water pressure declined steadily over the first several days and failed to provide toilet function on or about Wednesday the 31st of August. Unfortunately, many of the toilets had overflowed by then and foot traffic distributed fecal material and urine throughout the facility…The warm temperature, combined with the floodwaters on the lower level, rotting food and other refuse, human and animal (pets) waste material, and the aroma of unwashed humans, produced an increasingly noxious smell in the place.[12]

Louisiana National Guard personnel said a lack of hope was also a factor in the Superdome with the crowd becoming restless and, in isolated incidents, violent.[13] These people had lost their homes and belongings, had to suffer unbearable conditions, and were uncertain about their future. Exacerbating the problem were continuing delays in getting buses to evacuate the Superdome, as discussed in the EVACUATION chapter. After people had been told for several days they would be evacuated the next day, the buses did not arrive in large numbers, and people did not see any progress.

The collapse or absence of law enforcement exacerbated lawlessness

In some areas, the collapse or absence of law enforcement exacerbated the level of lawlessness and violence. For example, several police departments lost their dispatch and communication functions, police vehicles, administrative functions such as booking, and jails to confine arrested suspects. Tremendous additional burdens were imposed on the police — such as search and rescue — that took priority over normal police missions.

In Mississippi, massive damage to police and sheriff cars and stations, emergency response vehicles, and emergency operations centers made it very difficult to maintain law and order. According to William Carwile, the FEMA Federal Coordinating Officer for Mississippi, much of this public safety infrastructure was destroyed in the coastal counties.[14] Mayor Thomas Longo of Waveland said the city staged at various points around the area some of the resources it expected to need to respond to the storm's damage, including dump trucks and front-end loaders.[15] Waveland also staged some of these resources about 10 miles north of the city as a backup in the event of a catastrophe. Nonetheless, despite those preparations, the hurricane destroyed the resources Waveland had staged north of the city as well as much of what remained in the city itself. Waveland lost all of its police cars (in addition to other emergency vehicles), and the storm destroyed all of Waveland's public buildings, severely limiting its ability to mount a response to the storm.[16]

FEMA

FEMA-provided temporary buildings out of which Waveland's city government, including its police department, is now operating.

Also in Mississippi, Hancock County lost its emergency operations center — the location from which it expected to manage the county's response to the storm — to severe flooding soon after the hurricane hit.[17] Pearl River County lost its emergency operations center in the early hours of the storm due to wind and water damage that knocked out its emergency backup generator and caused other damage, making the center inoperable.[18] These losses degraded the ability to maintain law and order.

In Louisiana, there were similar losses of law enforcement infrastructure, in both rural and urban areas, that weakened the law enforcement community's ability to function. The lack of preparation and almost total loss of police capabilities in New Orleans are addressed in the next finding.

Plaquemines Parish, in contrast to New Orleans, appeared to take many precautions before Katrina made landfall. According to Plaquemines Parish Sheriff Jiff Hingle, all police vehicles were moved and parked on high ground.[19] Only one or two vehicles were slightly damaged when flying debris cracked their windows. Before landfall, the sheriff's office gathered all administrative records, loaded them into U-Haul trailers, and moved them to safe locations in the north. In addition, Plaquemines Parish evacuated all its prisoners in advance to upstate facilities.

After landfall, the Plaquemines Parish sheriff's office was immediately able to conduct search and rescue missions, along with some embedded Louisiana National Guard and Coast Guard personnel who had radios.[20] The sheriff reported no major law enforcement issues, in part because his office could function immediately after the storm.

The full extent of crime and lawlessness is difficult to determine, partly because of the loss of police record keeping during the disaster, and partly because of unsubstantiated reporting by the media (discussed below).

Finding: The New Orleans Police Department was ill prepared for continuity of operations and lost almost all effectiveness

New Orleans Police Department had not prepared for flooding

The collapse of law enforcement was particularly notable in New Orleans. Despite the well-known threat from flooding, the New Orleans Police Department had not taken some basic steps to protect its resources and ensure continuity of operations. For example, communications nodes, evidence rooms, and even emergency generators were housed in lower floors that were susceptible to flooding.

In 2004, the police department reportedly produced an "elaborate hurricane plan" which was issued to all commanders.[21] But, according to a reporter who was present during Katrina and reviewed police operations, it "stayed on their bookshelves," and the department never ran "exercises to familiarize officers with the plan."[22] Few officers the reporter spoke with even knew the plan existed.[23]

As an institution… the New Orleans Police Department disintegrated with the first drop of floodwater.

When the levees broke, the floodwaters overtook police headquarters and district offices. As a result, the department lost its command and control and communications functions. The dispatch and 911 call center ceased to function. Most police vehicles had not been moved out of harm's way and were lost to the floodwaters. The flooding created impassable roads which prevented the New Orleans Police Department from using their few remaining vehicles in most parts of the city. This left officers to patrol without any communications or transportation. With no command and control or guidance, there was no unified command or clear priorities within the department. One reporter who was on the scene wrote that "As an institution… the New Orleans Police Department disintegrated with the first drop of floodwater."[24]

Missing police officers led to a law enforcement manpower shortage

Further, hundreds of New Orleans Police Department officers went missing — some for understandable reasons and some not — at a time they were needed the most. This left the city unable to provide enough manpower and other resources to maintain law and order at shelters and on the streets.

All New Orleans Police Department officers are required to reside within the city limits, so a majority of the city's officers were personally affected by Katrina.[25] Whether it was damage to their homes or the health and safety of family members, many New Orleans Police Department officers, like members of the general public, were trapped in their homes and needed to be rescued during the critical days and hours after the levees failed and the flood waters rose.

Dereliction of duty by New Orleans Police Officers factored significantly into the department's inability to marshal an effective response. Original reports indicated that up to 320 officers (of its 1,750-officer force) resigned, were terminated, or are under investigation for abandoning their duties.[26] However, on December 14, Mayor Nagin testified that as of that date, 133 officers had been terminated or resigned after Hurricane Katrina, and said many of the original reports did not account for nearly 100 officers who were trapped or stranded on rooftops and unable to report to duty for that reason.[27] Regardless, the New Orleans Police force was severely depleted.

As a result, many residents were unable to obtain police assistance. Calls for help to the city's 911 system went unanswered.[28]

Some of the officers were also apparently involved in criminal activities. Officials from the Louisiana Attorney General's office said they are investigating thefts of luxury vehicles from a car dealership allegedly perpetrated by New Orleans Police Department officers.[29] The dealership, Sewell Cadillac Chevrolet, reported that several police officers had absconded with several brand new Cadillac Escalades.[30]

The Louisiana State Police provided relatively quick assistance. Although the New Orleans Police Department had lost its command and control capabilities, the Louisiana State Police operated under its own broad law enforcement statutory mandate. Thus, state police were able to move into the affected area quickly. As the significance of Katrina became evident, state police ceased other law enforcement activities to focus on New Orleans' needs.

AP PHOTO/RON HAVIV/VII

FEMA

Police had limited resources to stop looting in downtown New Orleans

Given the situation, police had limited resources with which to stop the looting.[31] And even when police were present to restore law and order, they did not have the resources to arrest, book, and detain suspects. One major problem was the loss of the booking and jail systems. Booking and jailing are done not by the New Orleans Police Department, but by the parish criminal sheriff. Sheriffs in each parish are constitutional positions independent from the parish president or mayor or police. The sheriff's booking offices and jails were flooded and therefore useless. While criminals, such as looters, could be apprehended by law enforcement officers, there was nowhere to book them or jail them. Many people originally apprehended for looting were just let go.

AP PHOTO/DAVID J. PHILLIP

Finding: Lack of a government public communications strategy and media hype of violence exacerbated public concerns and further delayed relief

Governments appeared to lack any public communications strategy and media and public officials fed rumors

Public communications is a key aspect of emergency management, and this function has its own emergency support function in the NRP. In Louisiana, and particularly New Orleans, the federal, state, and local governments did not appear to have a public communications strategy to deal with the media. This problem was particularly severe in the area of law enforcement and crime.

The media played a positive role in Hurricane Katrina in many aspects — such as providing situational awareness to government authorities and the public. And many media reports of violence were substantiated and responsibly reported. For example, MSNBC provided live coverage of looters, including police officers, ransacking a local Wal-Mart in New Orleans.[32]

However, other media reports were based on rumors that were either false or highly exaggerated, undermining the value of the situational awareness being provided. CNN reported repeatedly on September 1, for example, that evacuations at the Superdome were suspended because "someone fired a shot at a helicopter."[33] State and local officials later said much of the "rampant shooting" reported was actually from trapped individuals who were firing weapons into the air to attract rescuers.[34]

According to state officials, rumors and reports of people shooting at helicopters were difficult to substantiate at the time.[35] But in the end, there were no bullet holes found in any helicopters. Again, people firing into the air may have been the origin of this rumor. Other reports of people shooting at helicopters taking patients to hospitals were never verified, nor were stories of two babies found with their throats slit in Convention Center bathrooms or of the man who heard a rape victim scream, ran outside for help, and was shot and killed by troops.[36]

State law enforcement officials expressed frustration over media reports of crime.[37] Many of these officials

said the media greatly exaggerated reports of crime and lawlessness. They said any reports from the Superdome and Convention Center were generally difficult to substantiate. Few crime victims ever came forward to the police. Without an official complaint, victim, or eye witness, it was nearly impossible for the police to assess the credibility of rumors or conduct an investigation. On September 1, during a FEMA videoconference call, FEMA Federal Coordinating Officer, William Lokey, stated that "media reports and what we are getting from on-scene were contradictory and we [did not] have a clear picture of what exactly went on."[38]

Managing the spread of false or highly exaggerated rumors proved difficult – and consequential — for officials on the ground. On September 1, Colonel Jeff Smith, Deputy Director, Louisiana Office of Homeland Security and Emergency Preparedness, told public officials that "the rumor control on this thing is going to be key… [s]ome of the things you hear, some of it has probably partial basis in fact, but there's a lot of exaggeration going on there."[39] False media reports impeded the relief effort and affected decisions on where to direct resources. When asked whether exaggerated media reports impeded rescue efforts, Colonel Terry J. Ebbert, Director of Homeland Security, City of New Orleans, responded "absolutely."[40] Mayor Nagin testified that "dealing with the realities of all the multiplicity of challenges that we had, managing rumors, was the thing that we spent way too much time doing."[41]

AP PHOTO/DENNIS COOK

At the strategic level, public officials did not have a strategy to get ahead of the "information curve" to use the media to the public's advantage and quell rumors. On the contrary, Mayor Nagin and the New Orleans Chief of Police repeated unsubstantiated rumors before the national media, creating an exaggerated image of utter lawlessness.

- New Orleans Mayor Ray Nagin told Oprah Winfrey that "hundreds of armed gang members" were raping women and committing murder in the Superdome. The occupants, he said, were "in an almost animalistic state…in that frickin' Superdome for five days watching dead bodies, watching hooligans killing people, raping people."[42] Many news outlets also covered Nagin's claim that the city's death toll would top 10,000.[43]

- Police Superintendent Eddie Compass went further, and told Oprah, "We had little babies in there getting raped." Compass was also reported as saying officers were shot at inside the convention center but couldn't return fire "because of the families." He said officers caught 30 suspects by rushing at muzzle flashes.[44]

Many of these media reports, particularly of rampant violence in the Superdome, appear to be completely unsubstantiated. National Guard officials who were on the scene believe these reports were highly exaggerated.[45] Lieutenant General H. Steven Blum, Chief of the National Guard Bureau, stated "the media is not supposed to be inciting an insurrection. It is not supposed to be advertising and hyping lawlessness."[46] National Guard officials said there were numerous reports and rumors of rape or assault, but guardsmen and police could not find any witness, victim, or anyone willing to report the crime firsthand. Only two arrests were made by the police. Of the six deaths in the Superdome, none were crime-related. Guard officials said there were only 50 weapons found among the 25,000 to 30,000 people searched as they entered the Superdome. According to the Guard and police, the people in the Superdome were very unhappy and anxious, but they were never out of control. The exaggerated media reports of violence (which some of the evacuees had picked up on their transistor radios) served to further evacuees' anxiety, pushing some close to the boiling point.

Like the Superdome, there were media reports of violence and lawlessness in the Convention Center. For example, the *Times-Picayune* reported that Guard troops found 30 to 40 decomposing bodies piled in a freezer at the Convention Center.[47] But again, these reports were generally uncorroborated. There were only four dead bodies recovered from the Convention Center.[48] The National Guard officials that secured the site said they encountered no lawlessness or any resistance when

they moved in to clear out the Convention Center. As an indication of the generally peaceful intentions of the crowd, they reported there were only 13 weapons found among the 19,000 people searched before they boarded the buses.

NOPD Captain Jeff Winn said, however, he made several approaches to the Convention Center during those first few days and saw muzzle flashes.[49] He also suggested crime went unreported because of the continuing danger in the Convention Center, the lack of law enforcement resources to investigate and detain suspects, and the dispersal of witnesses when the evacuation of the facility was complete.[50] He also reported he saw a body with puncture wounds.[51]

Exaggerated media reports of crime further delayed relief efforts

The hyped media coverage of violence and lawlessness, legitimized by New Orleans authorities, served to delay relief efforts by scaring away truck and bus drivers, increasing the anxiety of those in shelters, and generally increasing the resources needed for security. With regard to the impact of the media reports on the hurricane recovery, Lieutenant General Blum, Chief of the National Guard Bureau, testified:

> They [the media reports] also prevented truck drivers coming in with the most needed supplies, water, food, ice, shelter, medicine. They were afraid to come in. They had to be escorted in by National Guard convoys, which took other manpower away from the relief efforts to go help get the commercial truckers that the civilian organizations had contracted to come in and help the people. They delayed the exact commodities from getting to the people that they were complaining weren't getting the commodities.[52]

State officials reported the hysterical and uncontrolled media images led to much confusion.[53] As the broadcast media reports became widely seen and heard, the Superdome population became increasingly agitated. Reports of truck drivers and FEMA employees turning around due to security concerns did not help the situation. First Assistant Attorney General Nicholas Gachassin said

1,000 FEMA employees set to arrive in New Orleans on Wednesday, August 31, turned back due to security concerns.

those in lesser affected neighborhoods were afraid to evacuate as looting fears prompted them to stay at their residences.[54] Similarly, the Governor's Chief of Staff Andy Kopplin reported that 1,000 FEMA employees set to arrive in New Orleans on Wednesday, August 31, turned back due to security concerns.[55] In repeating unsubstantiated rumors of mayhem, news reporters unwittingly helped slow an already slow response and further wound an already wounded population.

Finding: EMAC and military assistance were critical for restoring law and order

The Emergency Management Assistance Compact (EMAC), the state to state assistance compact, facilitated the deployment of resources to the hardest hit regions

The Emergency Management Assistance Compact (EMAC) is a mutual aid agreement and partnership between states to provide resources to one another during times of emergency.[56] EMAC offers state to state assistance during governor-declared states of emergency.[57] Ratified by Congress in 1996, 49 states and the District of Columbia have enacted legislation to become members of EMAC.[58]

EMAC is administered by the National Emergency Management Association (NEMA).[59] NEMA provides the day to day managerial support and technical infrastructure for EMAC operations and training programs. EMAC works as follows:[60]

1. Governor declares a state of emergency.
2. A representative from the state emergency management agency notifies the EMAC National Coordinating Group.
3. Affected state requests an EMAC team to be

deployed to its emergency operations center. This EMAC team is called an "A-Team."

4. A-Team arrives at state emergency operations center and begins coordinating state-wide EMAC resource requests. These resource requests are broadcast to all members of the compact soliciting assistance.
5. States willing to assist respond to the broadcast and coordinate with the A-Team the specifics of the transaction, including costs. The A-Team helps the affected state choose from available resources.
6. Formal requisitions are finalized specifying, as precisely as possible, the resources that will be made available and their costs.
7. Resources are sent to the affected states.
8. Responding state submits reimbursement request.
9. Affected state reimburses responding state.

EMAC is executed by eight components:[61]

1. Requesting state – EMAC state, operating under a governor declared emergency, requests assistance.
2. Assisting state – EMAC state, responds to a request for assistance.
3. Authorized representative – state official empowered to request assistance or commit state resources in response to a request.
4. Designated Contact – EMAC subject matter expert within each member state.
5. National Coordination Group (NCG) – national EMAC group during non-emergencies. The NCG stands ready to activate EMAC as emergencies develop.
6. National Coordinating Team (NCT) – when the Department of Homeland Security and FEMA activate their National Response Coordination Center (NRCC) to coordinate the federal response and recovery operations during emergencies, EMAC deploys a NCT to serve at the NRCC in Washington, D.C. From the NRCC, the NCT coordinates EMAC's national response.
7. Regional Coordinating Team (RCT) – If FEMA activates a Regional Response Coordination Center (RRCC) a parallel EMAC RCT is deployed. From the RRCC, the RCT coordinates deployed EMAC components responding throughout the affected region.
8. Other member states – during times of emergencies EMAC members are charged with monitoring the situation and to stand ready to assist as appropriate.

In supporting the response to Hurricane Katrina, a two-person EMAC A-Team was deployed to Baton Rouge, Louisiana on Sunday, August 28.[62] Jeff Smith was identified as the Louisiana state EMAC coordinator.[63] In Mississippi, Bill Brown, Operations Branch Chief, Mississippi Emergency Management Agency, coordinated EMAC.[64] On August 29, the A-Team was increased to four people, and shortly thereafter the team increased to eight members in Louisiana and nine members in Mississippi.[65] Through EMAC, a sizable contingent was deployed to assist Louisiana and Mississippi in the aftermath of Katrina.[66]

In Louisiana, 27,727 personnel were deployed through EMAC by September 13, and during the same time frame, in Mississippi, 18,247 people deployed.[67] There were 680 requests for assistance in Louisiana and 723 in Mississippi.[68] The total estimated cost for Louisiana is $201.8 million and for Mississippi, $314.1 million.[69] EMAC's total Katrina response involved processing 1,403 requests for assistance and 46,288 personnel deployments for a total estimated cost of $515.9 million.[70] The most commonly requested resources included: firefighters, search and rescue personnel, HAZMAT personnel, emergency medical technicians, state police, sheriffs, fish and wildlife personnel, corrections personnel, livestock inspectors, bridge inspectors, airport maintenance personnel, ambulances, medical doctors, registered nurses, and National Guard troops.[71]

EMAC officials have acknowledged a significant population of "self-deployed" personnel, a large majority of which were local and state police officers who deployed to the scene, in what is believed to be a spontaneous response to media reports of lawlessness in southeastern Louisiana.[72] Due to the *ad hoc* nature of these "self-deployed" officers, specific figures are not known. As the ranks of EMAC deployed law enforcement officials and officially deployed federal law enforcement officials continued to grow in the region, the number of "self-deployed" personnel is believed to have declined rapidly.

Without an official deployment, the "self-deployed" personnel were acting without proper authority, without liability protection, and without eligibility for expense reimbursement.

National Guard played a key role in restoring and maintaining law and order

Law and order were eventually restored as local law enforcement officers were supplemented, first by state military troops. The National Guard played a substantial role in providing security and restoring law and order. The Louisiana National Guard was deployed before landfall, and provided security at the Superdome that helped maintain order there. Once looting broke out in New Orleans, they also patrolled the streets. The Mississippi National Guard was vital to restoring order and providing security in the aftermath of the storm. According to Carwile, for example, a "massive National Guard presence" helped quell problems with isolated looting in the western affected counties (Pearl River and Hancock) within 2 days after the storm.[73] The Alabama National Guard was also deployed before landfall, providing a security task force for Mobile and Baldwin Counties.

AP PHOTO/RON HAVIV/VII

National Guards from other states also sent units through the EMAC process to perform security or law enforcement duties. In Mississippi, nearly 11,000 troops from 19 other states' National Guards joined more than 4,500 Mississippi National Guard troops in missions related to law enforcement (as well as other missions) by September 10, 12 days after landfall.[74] For example, Arkansas provided 310 guardsmen from a military police company to provide security in Mississippi.[75]

Similarly, the Louisiana National Guard's security forces were supplemented by thousands of guardsmen from other states. Through EMAC, Louisiana was able to request and receive assistance from scores of states from across the country. Examples of the larger deployments included 2,426 infantry from Pennsylvania, 1,016 military police from Puerto Rico, 580 security troops from Michigan, 500 support troops from Arkansas, 535 security troops from Massachusetts, and 350 security troops from Tennessee.

Assistant Secretary of Defense Paul McHale, in his testimony before the Select Committee, provided details on the extent of assistance provided by the National Guard. He stated that "when violence erupted in New Orleans, the National Guard Bureau coordinated the deployment of 4,200 National Guard MPs, 1,400 each day every day for 3 days in a row, a law enforcement presence nearly three times of the size of the New Orleans Police Department."[76]

There was a general consensus among federal, state, and local officials that EMAC worked very well for National Guard troops. Regarding military alone, by November 3, for Louisiana, there were a total of 451 EMAC requests and 29,502 Guardsmen who came from other states. Many of these out-of-state Guardsmen performed security and law enforcement functions and, like the Louisiana National Guard, operated under the Louisiana governor's Title 32 authority.

DOD active duty forces played an important, but less active, role in maintaining law and order

While they were not immediately deployed, DOD active duty forces also played a role in restoring and maintaining law and order. For example, the U.S. Army's 82nd Airborne arrived in New Orleans on September 3 (five days after landfall) and, according to the city's Director of Homeland Security, had a "calming effect" by their mere presence on the street. Precautions were taken to prevent DOD active duty forces from direct law enforcement missions, thereby avoiding Posse Comitatus issues. For more details on the use of the military, see the MILITARY chapter.

AP PHOTO/DAVID MARTIN

Law enforcement personnel from other states also played a key role in restoring and maintaining law and order.

Civilian law enforcement agencies from other states and localities also provided personnel through the EMAC process to supplement beleaguered state and local police. In Mississippi, local, state, and FEMA officials noted that assistance from Florida's law enforcement and emergency management agencies (as well as law enforcement from other states), plus the delivery of commodities Florida pre-positioned in the panhandle, were key to providing security and restoring order in southern Mississippi after landfall.[77]

Florida, in particular, was instrumental in the early days and received high praise from Mississippi officials for the manner in which that state's teams provided security, established an incident command structure in the coastal counties, and conducted some of the first search and rescue missions the night after the storm.[78] As noted earlier, Florida helped alleviate some of Mississippi's security problems by sending into the state some of the commodities it had pre-positioned in the panhandle region in anticipation of the hurricane striking farther east than it eventually did. Florida's supplies of food, water, and ice helped relieve the situation in Mississippi.[79]

While Florida and Alabama were among the first states to provide Mississippi with law enforcement assistance, they were not alone. Mississippi received assistance from Arkansas, South Carolina, and Georgia's state police or other state law enforcement agencies.[80] For example, South Carolina provided 118 law enforcement personnel with equipment to Mississippi.[81]

Louisiana also benefited from a very large influx of law enforcement personnel from other states. Like their counterparts in Mississippi, local, state, and federal officials involved in Louisiana's response to Katrina said EMAC was critical to restoring law and order.

The EMAC process was not always smooth. For example, a sheriff from Michigan and a sheriff from Alabama were at the Louisiana border but could not assist because no EMAC request had been made.[82] The Jefferson Parish Sheriff had apparently not made a request through the state EOC for the assistance — a requirement for providing law enforcement assistance through EMAC.[83]

Also, as late as September 2, EMAC requests simply had not been made. According to Josh Filler, the Director of DHS' Office of State and Local Government Coordination, on the September 2 video teleconference:

> My office has received numerous phone calls from law enforcement organizations across the country — major city police chiefs, national sheriffs — who want to help, but we have encouraged them not to self-deploy to New Orleans or to Louisiana, but to work through the system, but they are saying that their States are not receiving requests for assistance.[84]

Finding: Federal law enforcement agencies were also critical to restoring law and order and coordinating activities

The first priority for federal law enforcement agencies was to implement their continuity of operations plans and locate their affected personnel

Prior to August 30, federal law enforcement worked to prepare their coastal offices for Katrina's landfall. Immediately after the hurricane, these law enforcement agencies implemented their continuity of operations plans and began the process of locating personnel living in the affected areas.

On August 26, the Federal Bureau of Investigation's (FBI) Jackson Field Office notified its Resident Agencies in Hattiesburg, Pascagoula, and Gulfport to implement their hurricane plans.[85] Hurricane shutters were installed, vehicles were secured, computers were bagged, and safes were locked. The traditional FBI operations of the Jackson Field Office were moved to its Oxford Resident Agency, in northern Mississippi.[86] FBI air assets and personnel who remained on the coast were utilized to determine the damage and security of the Mississippi offices.[87]

Within 12 hours after the hurricane subsided, the Jackson Field Office was in contact with all of its personnel.[88] The Jackson Field Office established a Command Post at Keesler Air Force Base in Biloxi. On August 29, the Special Agent-in-Charge (SAC) of New

Orleans surveyed the damage to the New Orleans Field Office.[89] Sixty percent of the top floor was uncovered. Due to the sensitivity of documents housed in the Field Office, the SAC and the four agents remained at the building. The SAC ordered the move of the New Orleans Division to the Louisiana State Police headquarters in Baton Rouge.[90] All FBI personnel living in Louisiana were accounted for by September 4.[91]

On August 23, the Bureau of Alcohol, Tobacco, Firearms and Explosives (ATF) began Hurricane Katrina preparations.[92] ATF headquarters coordinated with Field Divisions in Houston, New Orleans (which includes the state of Mississippi), Nashville (which includes the state of Alabama), Tampa, and Miami.[93] Headquarters ordered the evacuation of ATF personnel in New Orleans and Mississippi prior to the hurricane, and a list was comprised of personnel who chose to stay on the coast.[94] All ATF personnel leaving the affected area were instructed to contact their supervisors after the storm. Due to the damage to the ATF facilities, a continuity of operations site was activated on August 30 in Mandeville, Louisiana.[95]

On the same day, ATF began contacting all ATF personnel living in the affected area.[96] The New Orleans Division Office was relocated to Shreveport, where it resumed responsibility over Louisiana and Mississippi.[97] The Biloxi Field Office was relocated to a public safety compound behind the Harrison County Sheriff's Department.[98] The Mobile Field Office was moved to Brookley Air Force Base, an inactive base in the Mobile area.[99] ATF established a Critical Incident Management Response Team in Baton Rouge to coordinate ATF operations.[100]

On August 26, in anticipation of Katrina's landfall, the New Orleans Field Division Special Agent-in-Charge ordered the Drug Enforcement Administration's (DEA) Field Division closed and all DEA personnel were asked to evacuate the area.[101] The New Orleans Field Division and the Gulfport Resident Office were severely damaged by the hurricane.[102] DEA established teams responsible for locating all Field Division personnel following the storm.[103] On August 31, command centers were established at the Baton Rouge District Office and in Mobile. DEA headquarters chose the Office of Aviation in Addison, Texas to serve as a logistical command center for the field divisions throughout the country. On September 1, the New Orleans Field Division established an operations center at a high school in Mandeville, Louisiana, to house firearms and sensitive items from the New Orleans Field Office.[104]

On August 29, the United States Marshals Service (USMS) activated an Emergency Operations Center in Washington, D.C. in preparation for Hurricane Katrina.[105] USMS also placed four Operational Management Teams (OMT) on standby. Following Katrina, the OMTs began accounting for all USMS personnel in Louisiana, Mississippi, and Alabama.[106] Operational Medical Personnel were also deployed to the coast to assist USMS personnel.[107] OMT created a command post in Pineville, Louisiana and Jackson, Mississippi. On August 30, USMS deployed personnel and surveillance planes to survey the hurricane damage to USMS facilities.

Prior to landfall, U.S. Immigration and Customs Enforcement (ICE) pre-deployed Federal Protective Service (FPS) personnel located in Texas.[108] FPS was able to move into the affected area the day after the hurricane to assist FEMA. ICE's Gulfport office sustained no major damage and due to backup generators, was utilized as a staging site and provided assistance to ICE employees affected by the hurricane, as well as other state and local law enforcement.[109] From landfall until September 2, ICE's New Orleans field office worked to account for ICE personnel assigned to the New Orleans, Lake Charles, Lafayette, Baton Rouge, and Gulfport offices and obtain needed supplies.

On August 26 and 27, U.S. Customs and Border Patrol (CBP) ordered the ports of Mobile and New Orleans, and the Hammond Louisiana Air and Marine Branch to activate their hurricane preparedness plans.[110] CBP moved its air assets to Shreveport and Dallas. CBP's Mission Critical Team relocated from New Orleans to Shreveport and on August 29 began to locate CBP personnel living in the affected area.[111] CBP created a Forward Deployed Operations Command Center at the air hanger in Hammond to coordinate all CBP missions.[112] By September 4, all CBP employees were located.[113]

While the Federal Air Marshal Service (FAMS) did not need to implement a continuity of operations plan for a specific office, they are responsible for meeting their nationwide primary mission, while coordinating in preparation for severe weather and flight disruptions.[114] In anticipation of these disruptions due to Katrina, FAMS began monitoring the hurricane's track the week of August 21.[115]

From August 26 to August 29, Federal Bureau of Prisons (BOP) personnel from the Office of Emergency Preparedness, in Washington, D.C. and BOP's South Central Regional Office in Dallas monitored Hurricane Katrina's path.[116] The Office of Emergency Preparedness is responsible for coordinating the evacuation and for supporting corrections institutions in the areas affected by the hurricane. On August 30, BOP opened a command center to help the Louisiana Department of Public Safety and Corrections with transporting inmates out of the New Orleans area.[117]

AP PHOTO/RIC FRANCIS

While working to reconstitute themselves, federal law enforcement agencies supplemented state and local law enforcement with forces and supplies

While surveying office damage and locating personnel, federal law enforcement worked to assist state and local law enforcement with additional forces and supplies. While it is impossible to account for every federal law enforcement agent or officer who responded to requests for assistance by state and local law enforcement, or even by hurricane victims, there were specific assets brought to bear by federal law enforcement that should be highlighted to illustrate the degree of coordination with entities outside the federal government.

On August 30, FBI headquarter officials put their Field Offices on alert that additional personnel were needed in the affected area.[118] Ten Special Weapons and Tactics (SWAT) agents from the Houston Division were deployed to New Orleans to assist the New Orleans Police Department (NOPD) SWAT.[119] These agents brought a boat that enabled them to transport personnel and supplies. On September 1, the Critical Incident Response Group deployed agents from the Dallas, Atlanta, Baltimore, and Houston SWAT teams and Hostage Rescue Teams (HRT) to continue to help NOPD control its affected area.[120] The Violent Gang Task Force from the New Orleans Division worked out of the Gretna Police Department.[121] Over 30 more agents coordinated with NOPD to back up NOPD SWAT, FBI SWAT, and HRT Special Agents.[122]

The FBI Command Post at Keesler Air Force Base in Biloxi, Mississippi communicated with the Mississippi Bureau of Criminal Investigations, the Mississippi Highway Patrol, the Homeland Security Director for the State of Mississippi, and local police and sheriffs to respond to requests for assistance.[123] The FBI was able to create a Virtual Command Center for the Law Enforcement On-Line Internet site.[124] All law enforcement nationwide were able to log onto the website and receive daily situation reports regarding FBI relief efforts.[125]

AP PHOTO/ANN HEISENFELT

The first group of ATF personnel detailed to the affected area arrived on September 2.[126] Thirty-four members of Special Response Teams (SRT), tactical teams specifically trained to handle high risk law enforcement and civil unrest, from the Dallas and Detroit Field Offices and seven SRT support staff were deployed to Algiers, Louisiana.[127] The SRT members were sent to New Orleans to assist the NOPD, whose SWAT teams were down to 25 percent capacity.[128] On September 6 and 7, 10 ATF agents were deployed to Biloxi, and 30 ATF agents were deployed to Gulfport.[129] These agents performed investigative roles, as well as assisting local police with firearms-related calls.[130]

FEMA

From August 30 to September 12, 251 DEA Temporary Duty agents reported from Miami, Atlanta, St. Louis, Houston and Dallas to provide law enforcement and search and rescue support in New Orleans.[131] On September 4, DEA deployed personnel from the Atlanta Field Division, as well as the Houston Mobile Enforcement Team (MET), self-contained, specially trained teams of eight to twelve agents that specialize in law enforcement missions involving violence.[132] These agents were then joined by the Charlotte MET on September 5, and the Miami MET on September 7. The METs helped state and local departments in conducting routine law enforcement tasks, including patrols as well as search and rescue missions.

On September 1, five USMS Marshals from the Training Academy in Glynco, Georgia were deployed to provide security at the Biloxi Airport.[133] USMS deployed an additional four Marshals to the airport on September 3. USMS supported NOPD by working with the 1st and 5th districts in New Orleans and responded to backlogged 911 calls. In addition, USMS redirected NOPD National Crime Information Center traffic to the USMS Communications Center. USMS deployed more personnel to Mississippi on September 5 to help local police and sheriff departments.[134] They provided security for 11 search and rescue teams, operated a missing persons task force and a task force to locate sex offenders, and protected the Mississippi gulf coast's fuel depot in Collins.

On September 2, ICE began its support of local law enforcement in New Orleans' 4th District.[135] The 4th District was still populated at that time, as it had not taken on water. The New Orleans Special Response Team (SRT), ICE's tactical team, was in the city on September 1. SRT teams from Chicago and San Antonio, consisting of 12 to 18 members, arrived the afternoon and evening of September 2. By midnight of September 2, there were over 100 ICE agents in New Orleans preparing to assist in the response to the hurricane.

Throughout the week, ICE agents were tasked with patrols and shifts with local law enforcement, worked to curtail looting, assisted with evacuations, and followed up on the approximately 6,000 911 calls made during and after the hurricane.[136] ICE's Tampa Field Office provided three inflatable Zodiac boats that helped ICE personnel assist with transportation for fire departments and medical personnel and respond to rescue calls. ICE agents and logistical teams assisted the Mississippi Highway Patrol, county sheriffs, and city police forces in Mississippi with patrols, rescues, and searches.[137]

AP PHOTO/STEVEN SENNE

On the morning of August 30, the Border Patrol's Tactical Unit pre-deployment site survey team left for the affected area.[138] This deployment was pursuant to a request for CBP to assist in evacuating the Superdome and for riot control. However, the agents also worked other law enforcement functions and relief operations, such as distributing water, assisting with minor medical care, and

CBP

helping evacuees onto buses and helicopters. CBP had 100 agents, along with CBP vehicles, emergency equipment, and lifesaving supplies in Louisiana by September 1.[139] On September 2, Border Patrol agents were sent to provide security at the Louisiana State University Hospital, which served as the regional triage center. Border Patrol agents were also deployed to the New Orleans Airport to assist with crowd control and security.

A day after Katrina made landfall, FAMS responded to reports of deteriorating conditions at Louis Armstrong New Orleans International Airport.[140] The airport was starting to receive evacuees and was therefore becoming a shelter. As a response, FAMS sent personnel – drawing from its Houston Field Office – to the airport to assist as necessary.[141] Conditions at the airport continued to deteriorate as thousands of displaced persons sought refuge there.[142] There was no food, water, restroom facilities, or security. Consequently, when FAMS personnel began to arrive, they needed to help restore order.[143] On September 1, FAMS began initial deployment, including 54 from the Houston Field Office, arriving in-person by car. Also by late evening, evacuation flights out of the airport were fully operational. By September 2, FAMS personnel at the airport expanded their mission to include interim law enforcement activities as well as all necessary activities to operate the airport.[144]

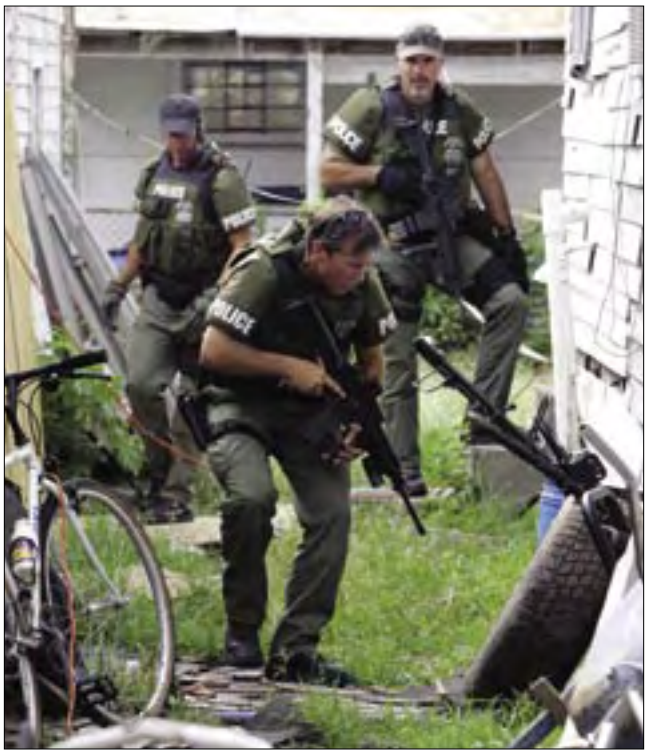
On September 3, the Secret Service was asked by NOPD and the Louisiana State Police to take control of the credentialing process for state and local law enforcement in the New Orleans area.[145] The need for secure credentials for NOPD was a primary concern, as many police officers had lost their official identification badges during the hurricane.[146]

On September 5, the Louisiana Department of Public Safety and Corrections requested that BOP provide 1,000 beds and transportation for Louisiana state inmates.[147] BOP, along with USMS transferred 964 inmates to the United States Penitentiary Coleman-II, Florida.[148] From August 30 to September 7, BOP transported approximately 2,500 inmates or detainees in Louisiana to facilities outside of New Orleans.[149] In addition, BOP provided clothing, food, and water from Texas correctional institutions to the Louisiana State Police headquarters in Baton Rouge.[150]

Obtaining peace officer status presented problems for some federal law enforcement entities responding to the hurricane

The process for federal law enforcement being deputized or sworn in as a peace officer under state law in Louisiana and Mississippi proved cumbersome for some entities. The general concern was that in the process of assisting state or local law enforcement, or victims of the hurricane, federal law enforcement officers might find it necessary to make arrests outside of their federal jurisdiction. Due to the lack of an across-the-board policy on how to deal with federal law enforcement during a state of emergency, some federal law enforcement entities were required to seek advice from their individual Office of the General Counsel on how to proceed. The process was more difficult in Louisiana, where it became necessary to fly in representatives from the Louisiana Office of the Attorney General to the affected area to swear in the law enforcement officers or agents in person. Still other federal law enforcement agents were deputized by the Louisiana State Police.

Under Louisiana law, FBI agents have qualified immunity that protects them when responding to felonies committed in their presence or when assisting state officers.[151] However, FBI agents did not specifically have peace officer status when responding to Hurricane Katrina



AP PHOTO/ANN HEISENFELT

in Louisiana.[152] Governor Blanco granted the Louisiana Office of Attorney General authority to deputize FBI agents, and all FBI agents deployed to Louisiana were deputized by a representative of the office.

FBI agents deployed to Mississippi did not receive peace officer status until September 9, when Governor Barbour wrote a letter to all state and federal law enforcement officers.[153] The letter granted federal law enforcement officers working in cooperation with local law enforcement "the authority to bear arms, make arrests and to make searches and seizures, in addition to any other power, duty, right and privilege as afforded forces of the State of Mississippi."[154]

Prior to ATF agents being deployed to the affected area, DOJ examined the capabilities of ATF agents in assisting state and locals with law enforcement functions.[155] ATF agents are not afforded automatic peace officer status in the states of Louisiana and Mississippi. As ATF agents conducted their core statutorily required mission, DOJ determined ATF agents did not need to receive peace officer status.

Pursuant to federal statute, USMS "may exercise the same powers which a sheriff of the State my exercise . . . ."[156] USMS received further state law enforcement powers when the Director of USMS received an order from U.S. Attorney General Alberto Gonzales requesting the Director to "take all necessary and appropriate steps within available resources to provide the assistance" to Mississippi.[157]

The Louisiana Attorney General's Office coordinated the peace officer status for ICE agents deployed to Louisiana.[158] ICE agents were required to fill out paperwork and were sworn in by the Louisiana State Police every time a new rotation of ICE agents arrived in Kenner, Louisiana. ICE agents were sworn in as peace officers in Mississippi by the Hancock Sheriff's Department.

Border patrol agents were deputized by the state of Louisiana with law enforcement status on September 2.[159] Agents were not sworn in as peace officers in Mississippi.[160] On September 3, CBP's Office of Chief Counsel determined that CBP officers and Border Patrol agents could make arrests for state crimes in Louisiana, Mississippi, Alabama, Florida, and Texas, if the officer or agent was acting in his or her official capacity.[161]

On September 3, Louisiana began to deputize FAMS personnel as Louisiana State Police Officers, giving them full authority to enforce local and state laws.[162]

Emergency Support Function #13 (ESF-13) of the National Response Plan

DOJ, along with the Department of Homeland Security (DHS), is responsible for the Emergency Support Function #13 (ESF-13) of the National Response Plan.[163] ESF-13 covers Public Safety and Security and tasks DOJ and DHS with integrating federal non-investigative/non-criminal law enforcement public safety and security capabilities and resources to "support the full range of incident management activities with potential or actual Incidents of National Significance." The Office of the Deputy Attorney General and the Office of Legal Counsel assist in coordinating DOJ's ESF-13 responsibilities. The Bureau of Alcohol, Tobacco, Firearms and Explosives is responsible for DOJ's day-to-day actions with respect to ESF-13.

After the hurricane, ESF-13 requests were processed through the Law Enforcement Coordination Center (LECC) in Baton Rouge, because the LECC had working knowledge of the available regional resources.[164] The LECC determined whether the request could be met under ESF-13. The LECC (1) confirmed the requestor could not perform the mission, (2) determined whether the request was valid for ESF-13, (3) determined whether there were available federal law enforcement resources; and (4) approved or declined the request. The LECC then forwarded the approved request to Washington, D.C. Each requested agency coordinated with FEMA to establish funding.

Federal law enforcement coordination required communication between the U.S. Department of Justice, U.S. Department of Homeland Security, and the governors of the affected states

The Attorney General of the United States may "appoint officials . . . to detect and prosecute crimes against the United States."[165] The Attorney General may also approve the request of a state governor for federal law enforcement assistance if the Attorney General concludes that such "assistance is necessary to provide an adequate response to a law enforcement emergency."[166]

DOJ also has the authority under the Stafford Act to provide for non-operational assistance. In the case of a major disaster or an emergency, the President may direct the Department to "utilize its authorities and resources granted to it under Federal law (including personnel, equipment,

supplies, facilities, and managerial, technical and advisory services) in support of State and local efforts."[167]

On Friday, September 2, Gonzales sent a memorandum to the heads of DOJ's law enforcement agencies, asking each agency to continue coordinating with state and local law enforcement.[168] The Attorney General specifically requested that: (1) the Federal Bureau of Investigation continue to deploy agents and tactical assets, (2) the Drug Enforcement Administration prepare to deploy its Mobile Enforcement Teams, (3) the Bureau of Alcohol, Tobacco, Firearms and Explosives establish a Violent Crime Impact Team in Baton Rouge, Louisiana, and (4) the United States Marshals Service conduct prisoner transport operations and provide court security.

On September 3, Gonzales received a letter from Mississippi Governor Barbour requesting the "deployment of Deputy U.S. Marshals to the State of Mississippi in support of law enforcement requirements created by the effects of Hurricane Katrina."[169] The same day, Gonzales responded in writing to Barbour that his request was approved, and an order authorizing the Director of the U.S. Marshals Service to "take all necessary and appropriate steps within available resources to provide the assistance so requested by [Governor Barbour]" was issued.[170]

The same day, Gonzales received a letter from Blanco requesting the deployment of the USMS and/or other Department of Justice personnel to the area affected by Hurricane Katrina.[171] On September 4, Gonzales responded in writing to Blanco that her request was approved, and an order authorizing the Deputy Attorney General to "take all necessary and appropriate steps within available resources to provide the assistance so requested by [Governor Blanco]" was issued.[172]

On September 6, Gonzales and DHS Secretary Michael Chertoff received a letter from Blanco requesting "the deployment of Immigration and Customs Enforcement officers, Customs and Border Protection personnel and/or other Department of Homeland Security personnel . . . in support of the law enforcement challenges created by the effects of Hurricane Katrina."[173] Gonzales responded in writing to Governor Blanco on September 7, saying that after consulting with DHS, he approved Blanco's request and deployed the appropriate law enforcement personnel.[174] Chertoff also responded to Blanco on September 7, stating that DHS law enforcement would "continue to provide assistance" with state and local authorities in Louisiana.[175]

The Law Enforcement Coordination Center in Baton Rouge, Louisiana coordinated the efforts of all federal law enforcement in the greater New Orleans area and assisted the New Orleans Police Department in reorganization

During the first week following the hurricane, local, state, and federal law enforcement working in New Orleans began daily 9:00 a.m. meetings at the Harrah's Casino in downtown New Orleans.[176] These meetings enabled the law enforcement entities to meet face to face and coordinate critical missions. The New Orleans Police Department (NOPD) District Captain for each city district attended the meetings, along with the Bureau of Alcohol, Tobacco, Firearms, and Explosive (ATF), the Drug Enforcement Agency (DEA), the Federal Bureau of Investigations (FBI), and U.S. Immigration and Customs Enforcement (ICE).

Michael J. Vanacore, Director of International Affairs ICE, and Michael Wolf, Special Agent-In-Charge for the FBI's Critical Incident Response Group, were detailed by their respective agencies to Baton Rouge to coordinate the federal law enforcement response to Hurricane Katrina in Louisiana.[177] The two men were designated as Co-Senior

AP PHOTO/DAVE MARTIN

During the first week following the hurricane, local, state, and federal law enforcement working in New Orleans began daily 9:00 a.m. meetings at the Harrah's Casino in downtown New Orleans.

Federal Law Enforcement Officers (SFLEO) and stood up the Law Enforcement Coordination Center (LECC) at LSP headquarters in Baton Rouge.[178]

Vanacore arrived at the Louisiana State Police (LSP) headquarters in Baton Rouge on Sunday, September 4.[179] At the time, Vanacore understood his role was to work with the ICE New Orleans Agent-in-Charge, Michael Holt, and report to ICE headquarters in Washington, D.C. on ICE's mission in the area affected by the hurricane. Late that evening, Vanacore was informed of the decision to designate him SFLEO. He was instructed he would share SFLEO responsibilities with Wolf. Wolf arrived in Baton Rouge on Monday, September 5. The same day, Vanacore reviewed an unsigned letter designating him and Wolf as SFLEO.

Vanacore and Wolf had their first meeting late on September 5.[180] On September 6, it was clear to Vanacore and Wolf they needed an operations center to coordinate federal law enforcement efforts in New Orleans.[181] The center was then designated the LECC. The LECC did not have command and control over the federal law enforcement missions. Rather it served as the point of contact for all federal law enforcement in the greater New Orleans area. The missions of the LECC were to coordinate efforts to reestablish the NOPD and efforts of all law enforcement agencies' deployed resources to the New Orleans area. According to Vanacore, the main mission of the LECC was to ensure officer safety.[182]

On September 6, officials from the LECC, including Vanacore, met with the Mayor of New Orleans, the City of New Orleans Homeland Security Director and counsel for the Mayor.[183] Officials also met with the NOPD precinct captains.[184] Vanacore reported the Mayor's office and NOPD were "very helpful" and worked well with the LECC.[185] The LECC had little communication with the Louisiana Governor's Office, but Vanacore and Wolf both said interaction with the Governor's office was not necessary to achieve LECC's goals.[186]

Wolf brought additional FBI agents with him to Baton Rouge, as well as a Blue Whale Command, the FBI's mobile command station, specially equipped with office and communication equipment.[187] Vanacore stated the mobile command center was invaluable to standing up the LECC.[188] By September 7, the LECC was gathering and centralizing information, to ensure there were not duplicate law enforcement missions.[189]

The LECC divided the federal law enforcement entities by New Orleans police districts.[190] Each federal law enforcement agency was responsible for coordinating with the precinct captain of the district.[191]

The LECC also began daily 8:00 a.m. meetings with representatives from state and federal law enforcement.[192] ICE, FBI, DEA, ATF, USMS, U.S. Customs and Border Protection, including the Border Patrol, the National Guard, the U.S. Attorney's Office from New Orleans and Baton Rouge, the Office of the Louisiana Attorney General, LSP, NOPD, and the New Orleans Fire Department were all represented at the meetings. The City of New Orleans Homeland Security Director also attended the daily meetings. In addition, the U.S. Secret Service, the Sheriff's Association, and the Federal Air Marshals participated on a limited basis. CBP and FBI provided helicopters to transport attendees to and from New Orleans and the LECC for the meetings.[193]

The daily meetings commenced with Wolf reporting the number of arrests and incidents from the prior day.[194] There was then a roll call of all attendees to report their force numbers. Vanacore summarized the daily events on his blackberry and communicated to Jon Clark at ICE headquarters in Washington, D.C. Wolf communicated with FBI Headquarters.[195]

As the LECC worked from Baton Rouge, it became apparent to Vanacore and Wolf that in order to achieve its goals, the LECC needed to be located in New Orleans.[196] On September 9, the LECC and NOPD moved into the Royal Sonesta Hotel on Bourbon Street.[197] The LECC and NOPD each had a conference room and an additional room was used to receive incoming 911 telephone calls.[198]

The LECC worked with NOPD to assist in "standing up" the police department. There were eight NOPD district offices in New Orleans.[199] Four were rendered useless due to insufficient power, and four were flooded. LECC acquired air conditioning compressors and generators for the district offices that needed power. Temporary office spaces were procured to replace the flooded offices. The evidence and property rooms for the NOPD were under water and contained mold. The LECC assisted NOPD with procuring contractors to recover and process the evidence and property, and clean NOPD headquarters.

As a result of stolen uniforms, destroyed homes, and displaced New Orleans police officers, NOPD was patrolling the city without proper uniforms.[200] The LECC was able to procure temporary battle dress uniforms off

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the Federal Supply Schedule maintained by the General Services Administrations (GSA) for acquisitions by federal agencies. By using GSA for the uniforms, the NOPD did not have to utilize its local procurement process, which would have required three separate bids before purchasing new uniforms.

In addition, the LECC located photographers to create credentials for LECC and NOPD guards and officials at the Royal Sonesta.[201] LECC provided lights and generators to assist 15 police checks points. Supplies were provided for crime scene processing, including gloves and masks to protect police from mold.

Both Vanacore and Wolf reported the LECC had a positive working relationship with NOPD and that the department was receptive to LECC's assistance.[202]

Conclusion

First the levees were breached––and then law and order. As Katrina left people scrambling for food, for water, for supplies – for survival — lawlessness and violence, both real and imagined, spread, creating yet another problem for authorities who were burdened enough already.

How did this happen? For starters, the lack of basic necessities for residents who did not evacuate, or went back to their homes too quickly, contributed. As we saw in Pearl River County, once there were sufficient amounts of food, ice, and water, order was restored. Another problem was the uncertainty about evacuations. Confusion reigned, especially in places like the Superdome and the Convention Center, where conditions were terrible, nerves frayed, people desperate.

Compounding these difficulties was the collapse or absence of law enforcement. The police, in some cases, were unable to function or were diverting their attention to search and rescue operations. The New Orleans Police Department had known of the threat that could arise from flooding, yet failed to properly protect its resources or come close to continuity of operations. There was also a dereliction of duty by some New Orleans officers when, of course, their presence was needed most.

The federal, state, and local governments also lost another battle, this one with the media. Rumors spread, as fast as the fear. Some turned out to be true, but many did not, resulting in exaggerated reports that scared away truck and bus drivers who could have furnished people with much-needed supplies. Authorities needed to be on top of this situation, not a victim of it.

Fortunately, the National Guard in all three affected states were able to help out overburdened local authorities. About 20 other states added support, an effort that prevented a dire situation from being much worse. DOD active duty forces also came through, their mere presence serving to reduce tensions. Federal law enforcement agencies played an important role, as well, with additional forces and supplies.

For an exhaustive account of all federal law enforcement actions in response to Hurricane Katrina from August 23 to September 12, 2005, please see Appendix 5. ■

1 Interview by Select Comm. Staff with Bobby Strahan, Dir. Pearl River County Emergency Mgmt. Agency, State of Miss., in Wash., D.C. (Nov. 29, 2005) [hereinafter Interview with Bobby Strahan].
2 *Hearing on Hurricane Katrina: Preparedness and Response by the State of Mississippi Before Select Comm.*, 109th Cong. (Dec. 7, 2005) at 11 (statement of Dr. Brian Amy, State Health Officer, Miss. Dep't of Health) [hereinafter *Dec. 7, 2005 Select Comm. Hearing*].
3 *Id.*
4 Interview by Select Comm. Staff with Maj. Ralph D. Mitchell, Jr., Region 1 Commander, La. State Police and LtC. Joseph Booth, Deputy Superintendent, La. State Police, in Baton Rouge, LA (Nov. 9, 2005) [hereinafter Interview with Mitchell and Booth].
5 *Hearing on Hurricane Katrina: Preparedness and Response by the State of Louisiana Before Select Comm.*, 109th Cong. (Dec. 14, 2005) at 103 (statement of Governor Kathleen Blanco, State of LA) [hereinafter *Dec. 14, 2005 Select Comm. Hearing*].
6 EM2000 Messages, Nos. MEMA-0011924, MEMA-0012244, MEMA-001228, MEMA-0012312, MEMA-0013022 (on file with Select Comm.).
7 *Id.*
8 Interview with Mitchell and Booth.
9 Interview by Select Comm. Staff with Jiff Hingle, Sheriff, Plaquemines Parish, LA, in New Orleans, LA (Nov. 8, 2005) [hereinafter Interview with Jiff Hingle].
10 Interview by Select Comm. Staff with David Tranter, Deputy Attorney Gen. and Gen. Counsel, State of AL Emergency Mgmt. Agency, in Clanton, AL (Oct. 11, 2005).
11 EM2000 Messages, No. MEMA-0011924 (on file with Select Comm.).
12 Tiger Team Katrina Report, LA Nat'l Guard at 27 (Nov. 2, 2005) (on file with Select. Comm.).
13 Interview by Select Comm. Staff with LtC. Jacques Thibodeaux and Col. Mark Mouton, LA Nat'l Guard, in New Orleans, LA (Nov. 3, 2005) [hereinafter Interview with Thibodeaux and Mouton].
14 *Dec. 7, 2005 Select Comm. Hearing* at 5 (Statement of William L. Carwile, former FEMA Fed. Coordinating Officer).
15 *Id.* at 125-26 (Statement of Mayor Tommy Longo, Waveland, Miss.).
16 *Id.* at 125-27 (Statement of Mayor Tommy Longo, Waveland, Miss.).
17 Interview by Select Comm. Staff with Hancock County Emergency Operations Ctr. personnel, in Hancock County, Miss. (Oct. 11-14, 2005).
18 Interview with Bobby Strahan.
19 Interview with Jiff Hingle.
20 *Id.*
21 Dan Baum, *Deluged, When Katrina Hit, Where Were the Police?*, THE NEW YORKER, Jan. 9, 2006 at 54 [hereinafter Deluged Article].
22 *Id.*
23 *Id.*
24 *Id.* at 52.
25 Interview by Select Comm. Staff with Lonnie Swain, Deputy Chief, New Orleans Police Dep't, in New Orleans, LA (Nov. 9, 2005) [hereinafter Interview with Lonnie Swain].
26 Interview with Mitchell and Booth.
27 *Dec. 14, 2005 Select Comm. Hearing* at 226 (statement of C. Ray Nagin, Mayor, City of New Orleans, LA).
28 Interview with Mitchell and Booth.
29 Interview by Select Comm. Staff with Thomas Enright, Assistant Attorney Gen., Public Prot. Div., LA Dep't of Justice, in New Orleans, LA (Nov. 8, 2005) [hereinafter Interview with Thomas Enright].
30 Deluged Article at 54.
31 Interview with Lonnie Swain.
32 *Stealing for Salvation*, (MSNBC Television News Broadcast, Aug. 31, 2005).
33 Robert E. Pierre and Ann Gerhart, *News of Pandemonium May Have Slowed Aid*, WASH. POST, Oct. 5, 2005 [hereinafter Pandemonium Article].
34 Interview with Thibodeaux and Mouton; Interview by Select Comm. Staff with Terry Ebbert, Dir., Homeland Sec., City of New Orleans, in New Orleans, LA (Nov. 9, 2005) [hereinafter Interview with Terry Ebbert].
35 Interview with Thibodeaux and Mouton; Interview with Terry Ebbert; Interview by Select Comm. Staff with Nicholas Gachassin, First Assistant Attorney Gen., LA Dep't of Justice, in Baton Rouge, LA (Nov. 6, 2005) [hereinafter Interview with Nicholas Gachassin].
36 David Carr, *More Horrible Than Truth: News Reports*, N.Y. TIMES, Sept. 19, 2005 [hereinafter Carr Article].
37 Interview with Nicholas Gachassin; Interview with Thomas Enright.
38 Daily Video Teleconferences among officials dated Aug. 25 – Sep. 4, 2005 at 15 [hereinafter Daily VTC]. State and local officials from each of the impacted areas met daily with officials from, among other agencies, FEMA, and Nat'l Hurricane Center.
39 *Id.* at 6.
40 *Dec. 14, 2005 Select Comm. Hearing* at 214 (Statement of Terry Ebbert).
41 *Id.* at 226 (Statement of Mayor Ray Nagin, City of New Orleans, LA).
42 Carr Article; Susannah Rosenblatt and James Rainey, *Katrina Takes Toll on Truth, News Accuracy*, L.A. TIMES, Sept. 27, 2005; Beth Gillin, *Katrina Spawned Rumors*; Media Ran with Them, PHILA. INQUIRER, Sept. 28, 2005.
43 *Id.*
44 *Id.*
45 Interview with Thibodeaux and Mouton.
46 *Hearing on Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama Before Select Comm.*, 109th Cong. (Oct. 27, 2005) at 196 (statement of Lt. Gen. H Steven Blum, Chief of the Nat'l Guard Bureau) [hereinafter *Oct. 27, 2005 Select Comm. Hearing*].
47 Pandemonium Article.
48 Interview with Thibodeaux and Mouton.

[49] Telephone Interview by Select Comm. Staff with Capt. Jeff Winn, New Orleans Police Dep't., New Orleans, LA, in Wash., D.C. (Jan. 26, 2006).
[50] *Id.*
[51] *Id.*
[52] *Oct. 27, 2005 Select Comm. Hearing*, at 196-97 (statement of Lt. Gen. H Steven Blum, Chief of the Nat'l Guard Bureau).
[53] Interview with Thibodeaux and Mouton; Interview with Nicholas Gachassin; Interview with Terry Ebbert.
[54] Interview with Nicholas Gachassin.
[55] Interview by Select Comm. Staff with Andy Kopplin, Chief of Staff, Office of the Governor of LA, in New Orleans, LA (Nov. 6, 2005).
[56] EMAC Operations Manual (Oct. 2005) [hereinafter EMAC Ops Manual]; Telephone Interview by Select Comm. Staff with EMAC personnel, in Wash., D.C. (Dec. 13, 2005) [hereinafter Telephone Interview with EMAC]; EMAC website: What Is EMAC. www.emacweb.org/?9 (last visited Jan. 26, 2006).
[57] EMAC Ops Manual; Telephone Interview with EMAC; EMAC website: What Is EMAC. www.emacweb.org/?9 (last visited Jan. 26, 2006).
[58] Emergency Management Assistance Compact, Pub. L. No. 104-321, 110 Stat. 3877 (1996). Hawaii has not ratified EMAC. (E-mail correspondence from EMAC personnel to Select Comm. Staff (Dec. 13, 2005) (5:14 p.m.)).
[59] EMAC Ops Manual.
[60] EMAC website: How Does EMAC Work. www.emacweb.org/?142 (last visited Jan. 26, 2006).
[61] *Id.*
[62] Telephonic Interview with EMAC.
[63] *Id.*
[64] *Id.*
[65] *Id.*
[66] *Id.*
[67] E-mail correspondence from EMAC personnel to Select Comm. Staff (Dec. 19, 2005) (5:25 p.m.).
[68] Presentation Materials prepared by EMAC personnel, EMAC Responses to Hurricanes Katrina and Rita (Oct. 4, 2005).
[69] *Id.*
[70] *Id.*
[71] Master Log of EMAC Requisitions (unaudited draft).
[72] Telephone Interview with EMAC.
[73] *Dec. 7, 2005 Select Comm. Hearing* at 5 (Statement of William L. Carwile, former FEMA Fed. Coordinating Officer); Interview by Select Comm. Staff with William Carwile, former FEMA Fed. Coordinating Officer, in Wash., D.C. (Dec. 6, 2005).
[74] Hurricane Situation Report 54, Miss. Emergency Management Agency (Sept. 10, 2005 at 1500 hours); updated Miss. Guard numbers from Miss. Nat'l Guard Daily Recap (Oct. 11, 2005).
[75] EMAC Assistance to Miss., Nat'l Emergency Mgmt. Ass'n (Nov. 3, 2005).
[76] *Oct. 27, 2005 Select Comm. Hearing* at 133 (statement of Paul McHale, Assistant Sec'y of Def. for Homeland Def.).
[77] *Dec. 7, 2005 Select Comm. Hearing* at 111 (statement of William L. Carwile, former FEMA Fed. Coordinating Officer).
[78] Interview by Select Comm. Staff with Col. Marvin E. Curtis, Jr., Assistant Comm'r, Dep't of Public Safety, State of Miss., in Jackson, Miss. (Oct. 2005).
[79] *Dec. 7, 2005 Select Comm. Hearing* at 111 (statement of William L. Carwile, former FEMA Fed. Coordinating Officer) ("[I]n addition to the relief we got from the things that Mississippi brought to bear, the state of Florida which prepositionalized things up at the Panhandle, they bought us time too, because it would have been much worse had it not been for the things we got from Florida.").
[80] Hurricane Situation Reports, Miss. Emergency Mgmt. Agency (Sept. 2, 2005 at 1200 hours; Sept. 6, 2005 at 0200 hours); *Dec. 7, 2005 Select Comm. Hearing* at 2 (Statement of Governor Haley Barbour, State of Miss.).
[81] EMAC Assistance to Miss., Nat'l Emergency Mgmt. Ass'n (Nov. 3, 2005).
[82] E-mail correspondence from Patrick Rhode to Casey Long and Brooks Altshuler (Sept. 2, 2005) (6:46 p.m.).
[83] *Id.*
[84] Daily VTC, at 9 (Sept. 2, 2005).
[85] Telephone Interview by Select Comm. Staff with Federal Bureau of Investigation [hereinafter FBI] personnel, in Wash., D.C. (Dec. 15, 2005) [hereinafter Dec. 15 Telephone Interview with FBI]; The Jackson Field Div. covers the entire state of Miss. and has 10 Resident Agencies located in: Southaven, Oxford, Tupelo, Columbus, Greenville, Meridian, Hattiesburg, Macomb, Gulfport, and Pascagoula (E-mail correspondence from FBI personnel to Select Comm. Staff (Dec. 5, 2005) (6:10 p.m.)) [hereinafter Dec. 5 E-mail from FBI].
[86] Dec. 15 Telephone Interview with FBI.
[87] Interview by Select Comm. Staff with FBI personnel, in Wash., D.C. (Nov. 28, 2005) [hereinafter Nov. 28 Interview with FBI]; Dec. 15 Telephone Interview with FBI.
[88] Dec. 15 Telephone Interview with FBI.
[89] Nov. 28 Interview with FBI.
[90] Dec. 5 E-mail from FBI.
[91] Telephone Interview by Select Comm. Staff with FBI personnel (Jan. 27, 2006).
[92] Bureau of Alcohol, Tobacco, Firearms and Explosives [hereinafter ATF] Summary of Significant Activity (Nov. 18, 2005) [hereinafter ATF Summary of Significant Activity].
[93] ATF Summary of Significant Activity; Interview by Select Comm. Staff with ATF personnel, in Wash., D.C. (Nov. 29, 2005) [hereinafter Interview with ATF].
[94] Interview with ATF.
[95] ATF Summary of Significant Activity.
[96] *Id.*
[97] Interview with ATF; E-mail correspondence from ATF personnel to Select Comm. Staff (Dec. 7, 2005) (11:47 a.m.) [hereinafter E-mail from ATF]. The office in Shreveport oversaw the administrative functions of the Shreveport, Little Rock, Jackson, and Oxford, Miss. Field Offices.

(E-mail from ATF).

98 Interview with ATF.

99 E-mail from ATF.

100 Interview with ATF; Telephone Interview by Select Comm. Staff with ATF personnel, in Wash., D.C. (Dec. 1, 2005).

101 Response from the U.S. Dep't of Justice, to Chairman Tom Davis, Select Comm., and Charlie Melancon, U.S. Congressman (Nov. 23, 2005) [hereinafter Nov. 23 Dep't of Justice Response].

102 Hurricane Katrina Drug Enforcement Agency [hereinafter DEA] COOP Assessment (DAG000000223) (Jan. 26, 2006).

103 Nov. 23 Dep't of Justice Response.

104 Nov. 23 Dep't of Justice Response; Interview by Select Comm. Staff with DEA, in Wash., D.C. (Nov. 28, 2005).

105 Nov. 23 Dep't of Justice Response.

106 Response from the U.S. Dep't of Justice, to Chairman Tom Davis, Select Comm., and Charlie Melancon, U.S. Congressman (Dec. 8, 2005) [hereinafter Dec. 8 Dep't of Justice Response]; Interview by Select Comm. Staff with U.S. Marshal Service [hereinafter USMS] personnel, in Wash., D.C. (Dec. 8, 2005) [hereinafter Interview with USMS]. An Operational Mgmt. Team (OMT) oversees USMS' national response. There are OMTs located throughout the United States. A Chief Deputy, the highest ranking career Marshal in the district is in charge of the OMT. Each OMT has a core group of eight personnel. (Interview with USMS).

107 Dec. 8 Dep't of Justice Response.

108 Interview by Select Comm. Staff with U.S. Immigration and Customs Enforcement [hereinafter ICE] in Wash., D.C. (Nov. 16, 2005) [hereinafter Nov. 16 Interview with Interview with ICE].

109 Interview by Select Comm. Staff with ICE personnel, in Wash., D.C. (Dec. 2, 2005) [hereinafter Dec. 2 Interview with ICE].

110 U.S. Customs and Border Prot. [hereinafter CBP] Timeline Aug. 24-Aug. 30 (Dec. 8, 2005) [hereinafter CBP Timeline Aug. 24-Aug. 30]; CBP Hurricane Katrina Support and Operations PowerPoint (Sept. 20, 2005).

111 CBP Timeline Aug. 24-Aug. 30.

112 Interview by Select Comm. Staff with CBP personnel, in Wash., D.C. (Dec. 6, 2005) [hereinafter Interview with CBP]; CBP Timeline Aug. 30-Sept. 13 (Dec. 21, 2005) [hereinafter CBP Timeline Aug. 30-Sept. 13].

113 E-mail correspondence to Select Comm. Staff from CBP personnel (Jan. 26, 2006) (1:35 p.m.).

114 Fed. Air Marshal Serv. [hereinafter FAMS] Timeline prepared for Select Comm. Staff (Nov. 29, 2005) [hereinafter FAMS Timeline].

115 Interview by Select Comm. Staff with FAMS personnel, in Wash., D.C. (Nov. 29, 2005) [hereinafter Interview with FAMS]; FAMS Timeline.

116 Interview by Select Comm. Staff with Fed. Bureau of Prisons [hereinafter BOP] personnel, in Wash., D.C. (Dec. 5, 2005) [hereinafter Interview with BOP]; Dec. 8 Dep't of Justice Response.

117 Dec. 8 Dep't of Justice Response.

118 Nov. 28 Interview with FBI.

119 Nov. 23 Dep't of Justice Response.

120 Telephone Interview by Select Comm. Staff with FBI personnel (Jan. 27, 2006) [hereinafter Jan. 27 Telephone Interview with FBI]; Nov. 23 Dep't of Justice Response.

121 Nov. 23 Dep't of Justice Response. There are four Rapid Deployment teams located in: New York City, Wash., D.C., Los Angeles, and Miami. The teams are comprised of 160 people with different specialties. They are equipped to respond and be self sufficient for seven days on their own. (Telephone Interview by Select Comm. Staff with FBI personnel, in Wash., D.C. (Dec. 5, 2005) [hereinafter Dec. 5 Telephone Interview with FBI]).

122 Nov. 23 Dep't of Justice Response.

123 Dec. 15 Telephone Interview with FBI.

124 Nov. 23 Dep't of Justice Response. The Law Enforcement On-Line Internet site is not available to the general public. Law enforcement entities from around the country must have a password to access the FBI's information. (Dec. 5 E-mail from FBI).

125 Dec. 5 Telephone Interview with FBI.

126 ATF Summary of Significant Activity.

127 ATF Summary of Significant Activity; Interview with ATF.

128 Interview with ATF.

129 ATF Summary of Significant Activity.

130 ATF Summary of Significant Activity; Interview with ATF.

131 Response from U.S. Dep't of Justice, to Chairman Tom Davis, Select Comm., and Charlie Melancon, U.S. Congressman (Dec. 21, 2005). The day by day breakdown is as follows: Aug. 30 (24), Aug. 31 (17), Sept. 1 (32), Sept. 2 (16), Sept. 3 (33), Sept. 4 (38), Sept. 5 (11), Sept. 6 (13), Sept. 7 (39), Sept. 8 (10), Sept. 9 (6), Sept. 10 (5), Sept. 11 (4), Sept. 12 (4). (*Id.*).

132 Nov. 23 Dep't of Justice Response.

133 Dec. 8 Dep't of Justice Response.

134 *Id.* Police Dep'ts included: Pass Christian Police Dep't, Gulfport Police Dep't, Biloxi Police Dep't, Long Beach Police Dep't, and Harrison County Sheriff's Dep't.

135 Dec. 2 Interview with ICE.

136 *Id.*

137 Dec. 2 Interview with ICE; E-mail correspondence from Ronald R. Grimes, DHS to Gerald Garren, et al, (Sept. 6, 2005) (5:27 p.m.). Miss. entities assisted by ICE: Miss. Highway Patrol, Gulfport Police Dep't, Harrison County Sheriffs Office, Waveland Police Dep't, Bay St. Louis Police Dep't, Long Beach Police Dep't, Pass Christian Police Dep't, Hancock County Sheriffs Office, and Jackson County Sheriffs Office. (*Id.*; Dec. 2 Interview with ICE).

138 CBP Timeline Aug. 24-Aug. 30.

139 CBP Timeline Aug. 30-Sept. 13.

140 Interview with FAMS.

141 FAMS Timeline.

[142] Interview with FAMS.
[143] FAMS Timeline.
[144] Interview with FAMS. This included, meeting arriving buses, helicopters, trucks, and ambulances; canvassing evacuees for information on those left behind in New Orleans; handwriting manifests for the New Orleans International Airport departing flights; pre-screening and loading passengers; crowd control; baggage handling; air traffic control; operating heavy equipment to facilitate blocking and dispatching aircraft; hand-carrying hundreds of sick, injured and elderly passengers on to departing aircraft; working with FEMA triage personnel to carry patients on stretchers for medical evaluation; delivering patients to the "Expected to Die" and morgue holding areas; and assisting in other medical emergencies. (*Id.*).
[145] Additional Info. Relating To Secret Service [hereinafter USSS] Contributions Toward Response and Recovery Efforts Associated With Hurricane Katrina (Dec. 5, 2005) [hereinafter Dec. 5 Additional Info. Relating to USSS]; Additional Info. Relating To USSS Contributions Toward Response and Recovery Efforts Associated With Hurricane Katrina (Dec. 7, 2005).
[146] Dec. 5 Additional Info. Relating to USSS.
[147] Dec. 8 Dep't of Justice Response.
[148] Interview with BOP; Dec. 8 Dep't of Justice Response.
[149] Dec. 8 Dep't of Justice Response. A total of 54 BOP personnel were responsible for the transportation. These personnel were detailed from the Federal Correction Complex (FCC) in Beaumont, TX; FCC Forrest City, Arkansas; FCC Yazoo City, MS; FCC Oakdale, LA; the United States Penitentiary in Pollock, LA; the Federal Detention Center in Houston, TX. (*Id.*).
[150] Dec. 8 Dep't of Justice Response; Interview with BOP.
[151] Dec. 5 Telephone Interview with FBI; Dec. 5 E-mail from FBI (citing LA. REV. STAT. ANN. § 9:2793.1 (2005)).
[152] Dec. 5 E-mail from FBI.
[153] Dec. 5 E-mail from FBI; Dec. 5 Telephone Interview with FBI; Letter from Haley Barbour, Governor, State of Miss., to all state and local law enforcement officers (Sept. 9, 2005) [hereinafter Sept. 9 Governor Barbour letter]. The Governor's request was made under the Emergency Law Enforcement Assistance provisions of the Justice Assistant Act of 1984, 42 U.S.C. §§ 10501-10513, which authorizes the U.S. Dep't of Justice to provide law enforcement assistance to a state. (*Id.*).
[154] Dec. 5 E-mail from FBI (citing order issued pursuant to MISS. CODE ANN. § 33-15-1 (2005)); Sept. 9 Governor Barbour letter. The Governor's request was made under the Miss. Emergency Mgmt. Law § 33-15-11(10). (*Id.*).
[155] Interview with ATF.
[156] 28 U.S.C. § 564 (2005).
[157] Order No. 2778-2005 from Alberto R. Gonzales, U.S. Attorney Gen. to USMS, Dir., Sept. 3, 2005 [hereinafter Gonzales Order to Dir. USMS].
[158] Dec. 2 Interview with ICE.
[159] CBP Timeline Aug. 30-Sept. 13.
[160] Interview with CBP.
[161] CBP Timeline Aug. 30-Sept. 13.
[162] FAMS Timeline.
[163] Nov. 23 Dep't of Justice Response.
[164] E-mail correspondence from Bill Mercer to Bill Mercer (ODAG) (Sept. 8, 2005) (6:04 p.m.).
[165] Nov. 23 Dep't of Justice Response (citing 28 U.S.C. § 533).
[166] Nov. 23 Dep't of Justice Response (citing 42 U.S.C. § 10501).
[167] *Id.*
[168] Memorandum from Alberto R. Gonzales, U.S. Attorney Gen., to Heads of Fed. Law Enforcement Agencies (Sept. 2, 2005).
[169] Letter from Haley Barbour, Governor, State of Miss., to Alberto R. Gonzales, U.S. Attorney Gen. (Sept. 3, 2005). The Governor's request was made under the Emergency Law Enforcement Assistance provisions of the Justice Assistant Act of 1984, 42 U.S.C. §§ 10501-10513, which authorizes the U.S. Dep't of Justice to provide law enforcement assistance to a state. (*Id.*).
[170] Letter from Alberto R. Gonzales, U.S. Attorney Gen., to Haley Barbour, Governor, State of Miss. (Sept. 3, 2005); Gonzales Order to Dir. USMS.
[171] Letter from Kathleen Blanco, Governor, State of LA, to Alberto R. Gonzales, U.S. Attorney Gen. (Sept. 3, 2005). The Governor's request was made under the Emergency Law Enforcement Assistance provisions of the Justice Assistant Act of 1984, 42 U.S.C. §§ 10501-10503, which authorizes the U.S. Dep't of Justice to provide law enforcement assistance to a state. (*Id.*).
[172] Letter from Alberto R. Gonzales, U.S. Attorney Gen., to Kathleen Blanco, Governor, State of LA (Sept. 4, 2005); Order No. 2779-2005 from Alberto R. Gonzales, U.S. Attorney Gen. to Deputy Attorney Gen. (Sept. 4, 2005).
[173] Letter from Kathleen Blanco, Governor, State of LA, to Alberto R. Gonzales, U.S. Attorney Gen. and Michael Chertoff, Sec'y, Dep't of Homeland Sec. (Sept. 6, 2005). The Governor's request was made under the Emergency Law Enforcement Assistance provisions of the Justice Assistant Act of 1984, 42 U.S.C. §§ 10501-10503, which authorizes the U.S. Dep't of Justice to provide law enforcement assistance to a state. (*Id.*).
[174] Letter from Alberto R. Gonzales, U.S. Attorney Gen., to Kathleen Blanco, Governor, State of LA (Sept. 7, 2005).
[175] Letter from Michael Chertoff, Sec'y, Dep't. of Homeland Sec., to Kathleen Blanco, Governor, State of LA (Sept. 7, 2005).
[176] Dec. 2 Interview with ICE.
[177] Nov. 16 Interview with ICE; Dec. 2 Interview with ICE; Interview by Select Comm. Staff with FBI personnel, in Washington, D.C. (Dec. 6, 2005) [hereinafter Dec. 6 Interview with FBI].
[178] Dec. 2 Interview with ICE; Nov. 23 Dep't of Justice Response.
[179] Dec. 2 Interview with ICE.
[180] *Id.*
[181] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI.
[182] Dec. 2 Interview with ICE.
[183] *Id.*
[184] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI.
[185] Dec. 2 Interview with ICE.
[186] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI.

[187] Nov. 28 Interview with FBI; Dec. 2 Interview with ICE.
[188] Dec. 2 Interview with ICE.
[189] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI.
[190] *Id.*
[191] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI; Dec. 5 E-mail from FBI. The assignments were as follows: District 1: ATF/ DEA, District 2: FBI/Border Patrol's Tactical Units (BORTAC), District 3: Federal Protective Service, District 4: ICE, District 5: USMS/DEA/BORTAC, District 6: FBI/ATF, District 7: FBI/DEA/BORTACT, and District 8: ATF. (Dec. 5 E-mail from FBI).
[192] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI.
[193] Dec. 2 Interview with ICE.
[194] *Id.*
[195] Dec. 6 Interview with FBI.
[196] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI.
[197] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI; Dec. 5 E-mail from FBI.
[198] Dec. 6 Interview with FBI.
[199] *Id.*
[200] *Id.*
[201] *Id.*
[202] Dec. 2 Interview with ICE; Dec. 6 Interview with FBI.

AP PHOTO/BILL HABER

"It's like being in a Third World country.
We're trying to work without power.
Everyone knows we're all in this together.
We're just trying to stay alive."

Mitch Handrich
Registered Nurse Manager at Charity Hospital[1]

Medical care and evacuations suffered from a lack of advance preparations, inadequate communications, and difficulties coordinating efforts

Summary

Public health preparedness and medical assistance are critical components to any disaster response plan

Hurricane Katrina tested the nation's planning and preparedness for a major public health threat and highlighted the importance of strong cooperation and partnerships among health agencies at all levels of government. The threat of any type of disaster emphasizes the need for planning and practice. Public health preparedness and medical assistance are critical components to any disaster response plan — the faster the health community responds, the more quickly control strategies can be developed and appropriate treatments can be identified. And the faster human suffering is diminished.

The annual hurricane season is a continuous challenge to public health infrastructures and a strain on resources. As seen in the preparation for and response to Katrina, medical personnel, supplies, and equipment were in constant need in the Gulf coast region. Despite deficiencies in coordination, communication, and capacity, public health and medical support services effectively treated a massive and overwhelming evacuee population. Federalized teams of medical first responders were deployed to the affected region to provide assistance. Millions of dollars worth of medical supplies and assets were consumed. Some Department of Health and Human Services (HHS) assets, like the Federal Medical Shelters, had never been used or tested prior to Katrina but were deployed and were, for the most part, considered effective.

FEMA

Despite difficulties, the medical assistance and response to Hurricane Katrina was a success. Thousands of lives were saved because of the hard work and enduring efforts of public health officials and medical volunteers. Poor planning and preparedness, however, were also too big a part of the story, resulting in delays and shortages of resources, and loss of life in the region.

This chapter outlines what medical personnel and supplies were pre-positioned, and deployed post-landfall, to the affected area and how those assets were utilized. It explains the plans in place prior to Hurricane Katrina for health care facilities and shelters. The findings in this chapter conclude several deficiencies in public health and medical response plans exist at all levels of government and within medical care facilities. Ultimately, better planning and initiative would have resulted in a more proactive, coordinated, efficient, and effective response.

Personnel

HHS and the Department of Homeland Security (DHS) have the capabilities to mobilize and deploy teams of medical personnel to disaster areas. HHS controls the Public Health Service Commissioned Corps, the Medical Reserves Corps, and personnel from its agencies such as the Centers for Disease Control and Prevention (CDC), National Institutes of Health, Substance Abuse and Mental Health Services Administration, and the Food and Drug Administration. DHS, specifically FEMA, has direct control over the National Disaster Medical System (NDMS), which supplies and organizes teams of medical personnel in each state who stand ready to deploy at any moment. Unfortunately, limited numbers of personnel were pre-positioned prior to landfall, and most deployments were delayed until after the storm hit and the magnitude of devastation was realized.

Supplies

In addition to medical personnel, HHS, FEMA, and the Department of Defense (DOD) have medical supplies at their disposal to respond to a public health emergency. HHS has control over the Strategic National Stockpile (SNS), a national repository of pharmaceuticals and medical supplies. NDMS personnel teams are always accompanied by large caches of supplies and drugs. DOD has a mobile medical unit capability as well. Limited amounts of supplies, however, were staged in the region prior to landfall. Several officials argued the magnitude of the storm's devastation could not have been predicted, and the amount of supplies needed was unknown until the fog cleared. Despite that argument, more supplies and personnel could have been pre-positioned prior to landfall.

AP PHOTO/BILL HABER

Evacuation plans, communication, and coordination must be executed well for effective response

During the days following Hurricane Katrina, around the clock media coverage of patients and staff trapped in New Orleans hospitals inundated television screens across the country. The nation watched in horror. How long would it take for evacuations to begin? And why had these hospitals not evacuated before the storm?

The Select Committee focused part of its medical investigation on these questions, as well as the overarching issues of impaired communications and lack of coordination. The Select Committee acknowledges this chapter does not tell the story of every hospital devastated by Hurricane Katrina. Nor does it include every detail of the communications and coordination difficulties which impeded the medical response.

Rather, this chapter provides findings based on an in-depth examination of specific plans in place before the storm, and a timeline of events that *actually* took place after the storm. Similarly, the Select Committee recognizes this section of the report focuses on the evacuations of New Orleans medical facilities in particular. Because New Orleans hospitals and facilities experienced the most complete failure of equipment and communications, and because the need to evacuate New Orleans hospital patients was so extreme, the Select Committee chose these institutions as its focal point.

Evacuations

As it stands, Louisiana hospitals and nursing homes are responsible for having and implementing their own emergency evacuation plans. The Louisiana Hospital Association (LHA) does not provide specific emergency response or evacuation guidance and said, with respect to protecting patients and staff, the primary priority for all hospitals is to "shelter in place" versus evacuate. Hospitals are, however, expected to comply with requirements set forth by the Joint Commission on Accreditation of Healthcare Organizations.[2]

The majority of hospital CEOs, as well as state and local medical personnel with whom the Select Committee met, cited time and money as two key factors influencing their decision about whether to evacuate patients from a shelter or medical facility prior to a hurricane. Time is critical given that the majority of hospital and Department of Veterans Affairs Medical Center (VAMC) plans call for evacuation decisions to be made anywhere from 36 to 72 hours in advance of a hurricane's projected landfall — hospitalized patients require a significant amount of time and staff to be moved safely. In the case of Hurricane Katrina, the then Methodist Hospital CEO, Larry Graham, said when he realized Hurricane Katrina was going to hit New Orleans, there simply was not enough time to evacuate patients.

The second much-discussed factor, cost, is perhaps even more critical to the decision. Expenses for evacuating a hospital are astronomical, and in the case of for-profit hospitals, these costs are not reimbursable by FEMA. In

Time is critical given that the majority of hospital and Department of Veterans Affairs Medical Center (VAMC) plans call for evacuation decisions to be made anywhere from 36 to 72 hours in advance of a hurricane's projected landfall

most cases hospitals say that given their cost/risk analyses, it makes the most economic sense to ride out a storm and protect patients within the hospital rather than evacuate them. For example, going to Code Grey alone (without factoring in evacuation expenses), costs Louisiana State University's hospitals $600,000 per day.[3] Many members of the New Orleans medical community likewise made the point, had Hurricane Katrina not resulted in such catastrophic flooding, their facilities would have been prepared, and their decision not to evacuate patients would have been the most prudent course of action. With the factors of time and money in mind, this chapter seeks to understand evacuation plans in place prior to Katrina, and preparedness levels of hospitals and the government to fully evacuate New Orleans medical facilities.

Communication and Coordination

Medical responders and coordinating officers from the government, hospitals, and private entities, cited non-existent or limited communication capabilities as a primary obstacle to their response. Emergency plans in place prior to Hurricane Katrina did not prevent oversights and confusion in procedures for ensuring functional and sufficient communications equipment in the event of a disaster. A comparison of the VAMC plans for Louisiana, Mississippi, and Alabama, for example, demonstrates they are not standardized — some pieces of VAMCs' communications plans do clearly outline the who, what, where, and when of keeping communication systems operating, while other VAMC plans leave many questions unanswered. Most VAMC and hospital emergency plans, reviewed by Select Committee staff do not have one separate section devoted to communications preparation.

The LHA and its hospitals rely on multiple phone service providers, and all LHA hospitals rely on an emergency two-way radio such as Hospital Emergency Area Radio (HEAR) or 800 MHz radio.[4] This chapter describes how VAMC and hospital emergency plans address emergency communications and equipment, as well as exactly how such plans and equipment failed medical responders when they most needed it.

One of the most common and pervasive themes in the response to Hurricane Katrina has been a systematic failure of communications at the local, state, and federal levels — a failure that hindered initiative. The accounts of New Orleans medical facilities and special needs shelters are no exception, underscoring how failed communications with the outside threatened the safety of medical staff and the lives of their patients. It was difficult to ascertain a clear timeline of communication capabilities and failures for medical first responders and personnel. Institutions did not have time to collect information for hourly or even daily reports of how communication equipment and systems were working or not. Medical responders and personnel simply did not have adequate communications capabilities immediately following the hurricane. The majority of cell phones were rendered inoperable because they could not be recharged. Satellite communications were unreliable, and the distribution of satellite phones appeared insufficient.

Government agencies also encountered problems with coordination due to red tape and general confusion over mission assignments, deployments, and command structure. On a large scale, command structure presented problems when HHS, the coordinating agency for Emergency Support Function 8 (ESF-8), and NDMS, the system that houses most of the resources needed for a medical response, did not share an understanding of who controlled NDMS during the emergency. Confusion resulted when these two entities were operating separately, albeit with efforts to coordinate with each other. On a smaller scale, e-mails from first responders and medical personnel immediately following the storm reflect coordination problems. Misunderstandings about deployment orders and mission assignments resulted in streams of e-mails expressing uncertainties and frustrations.

ESF-8 Background

HHS is the "principal agency for protecting the health of all Americans and providing essential human services, especially for those who are least able to help

themselves."[5] As such, HHS plays a role in the emergency management process. Under the National Response Plan (NRP), ESF-8 provides for the federal government to augment state and local resources and assist in response. Upon activation, ESF-8 "provides the mechanism for coordinated federal assistance to supplement state, local, and tribal resources in response to public health and medical care needs (to include veterinary and/or animal health issues when appropriate) for potential or actual Incidents of National Significance and/or during a developing potential health and medical situation."[6]

The Assistant Secretary for Public Health Emergency Preparedness serves on behalf of the Secretary to coordinate the HHS preparation for, response to, and efforts to prevent public health and medical emergencies or disasters. ESF-8 is tasked with the assessment of public health and medical needs, including behavioral health, conducting public health surveillance, and the provision and deployment of medical care personnel and medical equipment and supplies.[7]

As the designated primary agency for ESF-8, HHS is responsible for:

- Orchestrating federal support within their functional area for an affected state;
- Providing staff for the operations functions at fixed and field facilities;
- Notifying and requesting assistance from support agencies;
- Managing mission assignments and coordinating with support agencies, as well as appropriate state agencies;
- Working with appropriate private-sector organizations to maximize use of all available resources;
- Supporting and keeping other ESFs and organizational elements informed of ESF operational priorities and activities;
- Executing contracts and procuring goods and services as needed;
- Ensuring financial and property accountability for ESF activities;
- Planning for short-term and long-term incident management and recovery operations; and
- Maintaining trained personnel to support interagency emergency response and support teams.[8]

While HHS has a number of internal assets to supplement state, local, and tribal government entities, the NRP lists a number of additional external assets for HHS to use in coordinating the federal response. Support agencies under ESF-8 include DHS (FEMA and NDMS), DOD, VA, and the Department of Transportation (DOT).

Finding: Deployment of medical personnel was reactive, not proactive

Federalized teams were deployed and provided assistance in several locations after landfall

Thousands of people in the Gulf region were treated and hundreds of lives were saved due to the services provided by medical personnel in response to Hurricane Katrina. However, with few medical personnel teams pre-positioned prior to landfall, public health officials scrambled to mobilize and deploy personnel teams after the storm hit the Gulf coast. As a result, medical assistance in some areas was unnecessarily delayed by hours, even days. Personnel and supplies are readily available to decision-makers. With a few exceptions, the deployment of medical personnel was reactive, not proactive as most assets were not utilized until after the need was apparent. Ultimately, public health and medical support services were effectively but inefficiently delivered. Below is a comprehensive assessment of when and where medical personnel were deployed in the Gulf coast region to provide medical treatment and care.

FEMA

FEMA

NDMS

FEMA is home to the NDMS. The mission of NDMS is to maintain a national capability to deliver quality medical care to the victims and responders of a domestic disaster.[9] NDMS has medical, mortuary, and veterinarian assistance teams located around the country. These specialized teams include:

- 45 Disaster Medical Assistance Teams (DMATs), groups of professional and paraprofessional medical personnel capable of providing medical care following disasters;
- 11 Disaster Mortuary Operational Response Teams (DMORTs), which consist of private citizens with specialized training and experience to help in the recovery, identification and processing of deceased victims;
- Four National Medical Response Teams, to deal with the medical consequences of incidents potentially involving chemical, biological or nuclear materials;
- National Pharmacy Response Teams and National Nurse Response Teams, which include pharmacists and nurses to assist in mass-dispensing of medications during disasters along with mass vaccination campaigns.
- Five Veterinary Medical Assistance Teams, clinical veterinarians, pathologists, animal health technicians, microbiologists and others who assist animal disaster victims and provide care to search dogs; and
- Three International Medical Surgical Response Teams, highly specialized teams, trained and equipped to establish free standing field surgical facilities anywhere in the world.[10]

Fully operational DMATs have the ability to triage and treat up to 250 patients per day for up to three days without resupply.[11] Within four hours of alert status, DMATs should be able to field a full 35-person roster. Within six hours after activation, DMATs should be deployment ready.[12]

Before Hurricane Katrina made landfall, NDMS only staged nine of its 45 DMATs in the Gulf coast region.[13] Three DMATs and a Management Support Team were pre-positioned in each of the following locations: Anniston, Alabama, Memphis, Tennessee, and Houston, Texas. According to FEMA officials, the Superdome in New Orleans was the first NDMS assignment because it was a designated special needs shelter.[14] DMAT Oklahoma 1 (OK-1 DMAT) was pre-staged in Houston, Texas on August 27 in anticipation of the storm. OK-1 DMAT efforts will be discussed more thoroughly in a later section of this chapter. In addition to OK-1 DMAT, other teams at the Superdome included NM-1, CA-6, and RI-1.

WA-1 DMAT from Washington was one of the few teams activated and deployed prior to landfall. It was staged in Houston and was poised to move to its mission assignment post-landfall, which ended up being Louis Armstrong International Airport in New Orleans (New Orleans Airport).[15]

FEMA activated OR-2 DMAT from Oregon on August 30 and immediately began treating patients when the team arrived at the New Orleans Airport on the afternoon of September 1.[16] As previously mentioned, every DMAT includes a large cache of medical supplies and equipment. It is much easier to move personnel than supplies. Although the OR-2 DMAT's cache left Portland on August 31, it took almost five days for the three trucks of supplies to reach the airport.

By August 31, three DMATs, WA-1, CA-4, and TX-4, had arrived at the New Orleans Airport, where evacuated patients were being received.[17] Eventually, eight DMATs would be stationed there to help provide medical care during the patient movement operations in New Orleans.[18] The medical treatment provided and specific actions taken by the DMATs operating at the airport will be discussed in a later section of this chapter.

FEMA

With Mississippi's hospital infrastructure decimated after Hurricane Katrina, nine DMATs and seven DMAT Strike Teams were sent to the state to provide medical care and augment the remaining functioning hospitals.[19] Mississippi's State Health Officer, Dr. Brian W. Amy, testified that, "through coordination with the National Disaster Medical System, we positioned DMAT teams at every affected hospital and Strike teams at overflow hospitals in the affected areas. Of the 17,649 reported injuries, DMAT teams treated 15,500 patients in the initial days after landfall."[20]

FEMA

In general, at most locations DMATs were deployed, the teams were met with overwhelming demand for patient assessment and treatment. Many of the teams operated under extreme fatigue with limited medical supplies, inadequate amounts of food and water, intermittent electricity, and no air-conditioning.

DMORTs, teams of private citizens with specialized training and experience to help in the recovery, identification and processing of deceased victims, were sent to the Gulf coast to assist in the recovery process of dead bodies. A standard DMORT team is comprised of 31 medical and forensic volunteer personnel with specific training in victim identification, mortuary services, and forensic pathology and anthropology methods. DMORTs include a combination of medical examiners, coroners, pathologists, forensic anthropologists, medical records, fingerprint technicians, forensic odentologists, dental assistants, radiologists, funeral directors, mental health professionals, and support personnel.[21] Fully operational DMORTs should be able to deploy within 24 hours of notification.

With only two Portable Morgue Units (PMU) in NDMS, one was sent to Louisiana and the other to Mississippi. PMUs are equipped to support DMORT services when no local morgue facilities are available. Each is manned by four DMORTs. FEMA did not have enough DMORTs and was forced to contract for additional personnel. HHS worked closely with DMORTs and FEMA by embedding Public Health Service (PHS) personnel in each team. A PHS senior officer and mental health officer were assigned to assist each DMORT.[22]

On Thursday, September 1, 27 Region II DMORTs prepared to leave for Anniston, Alabama, a site designated as the eastern staging point for the DMORT response.[23] On Monday, September 5, one week after landfall, HHS Assistant Secretary for Public Health Emergency Preparedness Stewart Simonson requested "ample mobile mortuary services throughout the affected region."[24] An order for 200 mobile mortuary trucks was issued, with 130 designated to Louisiana and 70 to be delivered to Mississippi.[25] By the next day, mortuary services were being established in St. Gabriel, Louisiana with 96 personnel.[26] FEMA and Louisiana collaborated on drafting a body recovery plan which required the approval of then FEMA Director Michael Brown and Louisiana's newly appointed state medical examiner.[27] In Mississippi, mortuary services were established at the Naval Air Station in Gulfport. By September 6, one DMORT had set up facilities there.

AP PHOTO/PAUL SANCYA

U.S. Public Health Service Commissioned Corps

The U.S. Public Health Service Commissioned Corps, one of the seven uniformed services of the United States, is comprised of highly-trained and mobile health professionals who carry out programs to promote good health, understand and prevent disease and injury, assure safe and effective drugs and medical devices, deliver health services to federal beneficiaries, and supply health expertise in time of war or other national or international emergencies.

1,000 PHS Commissioned Corps Officers had been deployed to the region in support of the Hurricane Katrina medical response, making it the largest response in Corps history.

All Corps officers on deployment rosters were notified by the U.S. Surgeon General's office via e-mail on Saturday, August 27 that Hurricane Katrina could be a catastrophic event creating the need for medical assistance in the Gulf coast after landfall.[28] At the time of the e-mail, there was "no assessment of what will be needed at this point, but they will potentially ask the feds for medical, mental health, and pharmaceutical support, as well as EHOs, environmental and civil engineers to support the obvious needs for water, waste water and sewer, as well as infrastructure problems."[29] Commissioned Corps officers were asked to stand by and prepare for deployment as public health needs became apparent.

According to a briefing with U.S. Surgeon General, Vice Admiral Richard H. Carmona, PHS had pre-positioned 38 officers on Sunday, August 28 in Baton Rouge, Louisiana and Biloxi, Mississippi.[30] It was originally planned for the PHS officers to be stationed in New Orleans, but they were unable to get there before Hurricane Katrina made landfall. PHS officers were on the ground in New Orleans by late Monday, August 29.

Carmona suggested coordination with PHS, FEMA, and NDMS was difficult. HHS had trouble with tracking DMAT mission assignments and with staffing and communication. Despite the assignment of a Commissioned Corps officer liaison to FEMA to coordinate medical activities, coordination between the two agencies was lacking.[31]

PHS helped reestablish a public health infrastructure for some communities in the Gulf coast region. For example, when New Orleans Mayor Ray Nagin laid-off a majority of the city's public health employees, PHS helped to fill the gaps. "Public health services were never federalized—PHS just provided a federal presence. But the federal presence was absolutely stabilizing," Carmona said.[32]

By September 9, more than 1,000 PHS Commissioned Corps officers had been deployed to the region in support of the Hurricane Katrina medical response, making it the largest response in Corps history. More officers were deployed in response to Katrina than after 9/11 and the anthrax postal incident in 2001.[33] Commissioned Corps officers supplemented several medical response assignments. They worked side-by-side with the DMATs at the New Orleans Airport; staffed the Federal Medical Shelters at several locations in the Gulf coast; assisted with CDC activities; accompanied SNS assets; and helped provide mental health services to the affected region. In general, PHS is a valuable operational asset to HHS and was a critical component to the medical response to Hurricane Katrina. However, despite having the capability to mobilize Commissioned Corps officers at anytime, PHS failed to deploy a significant number of officers to the region prior to landfall.

Centers for Disease Control and Prevention

The CDC is a component of HHS that assists in carrying out its responsibilities for protecting the health and safety of all Americans and for providing essential human services, especially for those people who are least able to help themselves.[34] CDC controls the SNS, large quantities of medicine and medical supplies to protect the American public if there is a health emergency severe enough to cause local supplies to run out.

Before Hurricane Katrina made landfall, CDC activated the Emergency Operations Center (EOC) on August 25.[35] CDC personnel were on the ground in Louisiana with a Technical Advisory Response Unit (TARU) which accompanies SNS supplies.[36] In anticipation of the need to provide emergency medical services, 27 pallets[37] of medical supplies were pre-positioned on the ground prior to landfall.[38] On Sunday, August 28, these items were pulled from SNS with the mission assignment for some supplies to be delivered to the Superdome in New Orleans.[39] CDC also staffed and readied 12 teams of 20 people each to be deployed once the request from states for help was received.

CDC was responsible for deploying personnel and SNS assets, assisting state and local public health authorities with communicating food and water safety information, conducting disease surveillance, providing immunizations to displaced residents, and helping reestablish public health services in affected areas. Immediately following the hurricane, CDC's biggest concern was the risk of food-borne and water-borne illnesses.[40] CDC worked with the Louisiana Office of Public Health to assess reports on an outbreak of cholera and partnered with

the Environmental Protection Agency and local health departments to assess environmental risks of toxins and chemicals in the water and air. CDC also worked with DOD to provide mosquito-control resources in most of the affected areas. Teams were deployed to both Louisiana and Mississippi on a mosquito spray mission.

CDC provided access to Influenza, Tetanus-Diptheria, Hepatitis A, and Hepatitis B vaccines to areas that were lacking them by coordinating the delivery, distribution, and administration of over three million doses of vaccine, with one million of the doses obtained from SNS.[41] When New Orleans lost its public health department due to layoffs, CDC sent over 100 medical personnel to help reestablish services, conduct surveillance, and improve communication.[42]

HHS Credentialed Volunteer Health Professionals

HHS designed a system that assists state and locals in verifying the credentials of volunteer healthcare workers. While stimulating the creation of over 900 medical teams, it also created confusion at the state level. Overall though, HHS was successful in mobilizing and credentialing medical professionals who volunteered in the Gulf coast following Hurricane Katrina. PHS set up a Katrina database to credential and verify medical professionals.

FEMA

With the help of private companies, such as Kaiser Permanente, over 3,400 volunteers were processed and over 1,000 volunteers were deployed.[43] The database was linked to state databases and a national databank, allowing PHS to use existing information to help verify credentials. HHS also established a website (https://volunteer.hhs.gov) and toll-free number (1-866-KATMEDI) to help identify health care professionals and relief personnel to assist in Katrina relief efforts.[44]

The Medical Reserve Corps has a medical volunteer database where medical volunteers are pre-credentialed and can be activated within 24 hours. Carmona oversees this database as well as the response of the volunteers HHS calls upon. HHS was able to link its database to state databases in order to confirm volunteer credentials. Both HHS and Carmona stressed the importance of volunteers linking up with pre-existing rescue teams rather than acting independently. The Surgeon General's office likewise had generated a separate database for people who wanted to volunteer supplies or equipment.

Setting up a mechanism to allow individual medical personnel to volunteer was a useful tool initiated by HHS. The database was such a success that by September 3, an internal e-mail from HHS indicated "VOLUNTEERS SHOULD NO LONGER BE REFERRED TO KATRINARECOVERY@HHS.GOV, they should be directed to the https://volunteer.ccrf.hhs.gov/ and instructed to complete a volunteer application."[45] These credentialed volunteers heavily supplemented medical services in the Gulf coast region and were an important part of the medical response.

Substance Abuse and Mental Health Services Administration

As part of the public health and medical response, the Substance Abuse and Mental Health Services Administration (SAMHSA) mobilized personnel to support state mental health program directors in their efforts to conduct needs assessments, provide services, support ongoing administrative operations, access financial assistance and prepare for long-term assistance.[46] SAMHSA deployed Disaster Technical Assistance Center teams to provide information and supplement state and local disaster response planning, review disaster plans, conduct literature reviews, and offer mental health support services.[47] On Wednesday, September 7, SAMHSA created a "Crisis Hotline" to provide victims with 24 hour access to counseling and mental health resources.[48] Additionally, on Tuesday, September 13, HHS Secretary Micheal O. Leavitt announced $600,000 in emergency grants to Louisiana, Alabama, Texas, and Mississippi to ensure mental health assessment and crisis counseling are available in areas affected by Hurricane Katrina.[49] The states have used the money to support clinical assessments and provide psychiatric and nursing services, medications, brief interventions, crisis case management, and short-term residential support.

Finding: Poor planning and pre-positioning of medical supplies and equipment led to delays and shortages

Equipment and supplies were in heavy demand immediately following the hurricane and could not be quickly replenished by state, local, and federal resources. As detailed in other sections of this report, most shelters, hospitals, and flooded areas were without electricity and adequate supplies of potable water and food for days after Katrina made landfall. With only nominal amounts of medical supplies pre-positioned by FEMA and HHS, a great deal of medical provisions had to be supplied after Katrina made landfall. In areas like New Orleans, it took days to respond to the catastrophe and deliver medical supplies to the Superdome and Convention Center.

The delays were a result of poor planning. Obviously, supplies should be protected during the storm and staged in safe and secure locations for easy access post-landfall. Despite being unable to predict the magnitude of devastation from the storm, more supplies and equipment should have been pre-positioned and accessible to state and local officials immediately following landfall. Below is a detailed assessment of the different medical supplies and equipment that were provided to the Gulf coast in response to Hurricane Katrina.

States were heavily dependent on CDC/SNS for medical supplies

SNS 12-Hour Push Packages

As previously stated, the SNS is a national repository of antibiotics, chemical antidotes, antitoxins, life-support medications, IV administration, airway maintenance supplies, and medical/surgical items.[50] The SNS has 12-hour Push Packages (Push Packs), caches of pharmaceuticals, antidotes, and medical supplies designed to provide response to a public health emergency within 12 hours. CDC estimates that each Push Pack costs $6 million, weighs almost 50 tons, and includes over 100 different kinds of supplies.[51] Push Packs are configured to be immediately loaded onto either trucks or commercial aircraft for the most rapid transportation. A Boeing 747 aircraft or seven tractor trailers are needed to move a single Push Pack. A TARU accompanies the Push Pack to coordinate with state and local officials and ensure SNS assets are efficiently received and distributed upon arrival at the site.[52] TARU is simply a team of technical advisors to supervise the transfer of Push Pack contents to the receiving state.

FEMA

Push Packs can be deployed at the request of a governor and independently of the NRP. Mississippi was the only state to request a Push Pack from CDC. The Push Pack arrived in Mississippi on Friday, September 2, four days after Katrina passed through the state.[53] As Amy testified, "within 12 hours of a call and my official request, eight tractor-trailers rolled into Mississippi loaded with medical supplies for affected Mississippi hospitals."[54] Push Packs were originally designed to respond to a bioterrorist attack, so they included items that were not relevant to treating the medical needs of Katrina evacuees. As a result, some of the Push Pack materials went unused. For this reason, CDC informed state and local officials they could request supplies and materials from SNS without requesting a full Push Pack.[55] Although Mississippi was the only state to request a Push Pack, other states still tapped resources and supplies from SNS. CDC figured out a way early on to prevent the waste of resources and ensure the most appropriate medical supplies were being allocated and delivered.

Also, CDC began to move towards more focused deliveries from existing inventories outside of SNS and acquired materials from private partners, as thousands of critical supplies were needed.[56] The Director for the Coordinating Office for Terrorism Preparedness and Emergency Response at CDC, Dr. Richard Besser, suggested creating Push Packs for major public health disruptions other than bioterrorism. This could ensure the

most appropriate medical supplies and equipment arrive to the affected area first and would also prevent the waste of supplies that are not relevant to certain public health emergencies.[57]

Temporary medical operations staging areas were assembled and utilized

Federal Medical Shelters

Federal Medical Shelters (FMS) were a new component to the HHS hurricane response introduced following Katrina's landfall. These are rapidly deployed, minimal care medical kits capable of housing, triaging, and holding displaced patients. Each FMS is a 250-bed emergency shelter with a pharmaceutical suite, designed to provide care to patients for three days before the need to re-supply and re-stock materials.[58] An FMS is usually set up in a large space like an airport hanger or gymnasium with some provisions supplied by the SNS. FMS facilities are not designed for comprehensive community care needs; they are designed to offer last-resort care and support during situations in which normal, day-to-day operations are disrupted. FMS were developed to both augment hospitals and serve as quarantine stations.

FEMA

Under the orders of Simonson, FMS began readying supplies and personnel on August 27, and one FMS was sent to Camp Beauregard, Louisiana on August 28.[59] From there, the FMS continued on to Louisiana State University (LSU) in Baton Rouge, and on the evening of Tuesday, August 30, the FMS at LSU began operations staffed by PHS commissioned Corps officers. FMS were also staged at Fort Polk Army Base in central Louisiana, Eglin Air Force Base near Pensacola, Florida, the Naval Air Station in Meridian, Mississippi, and the Mississippi Air National Guard Station in Jackson, Mississippi.[60] Additionally, the New Orleans Airport was the site of an FMS and helped provide acute medical care to evacuated patients from surrounding hospitals and the Superdome. The National Institutes of Health in Bethesda, Maryland set up a critical care facility for the sickest patients evacuated from the Gulf coast region.[61]

Essentially, these shelters were used to augment hospitals in the Gulf coast and help with the surge capacity of Katrina evacuees. Although Simonson thought the shelters were under-utilized in response to Katrina, he believed the exercise proved FMS are a valuable asset to be used in future public health emergencies. Despite this, only one was pre-positioned while most were readied and deployed in the days following landfall. Precious time was wasted because public health officials lacked initiative.

Prior to Katrina, FMS was only an idea on paper and had never been put into practice. The temporary medical shelters had never been tested in simulated drills or exercises, so it was initially unclear how FMS would perform and if their use would be effective.[62] Simonson said he believed HHS held two exercises to test FMS last year. He did not believe them to have been extensive or to have simulated disaster-like conditions.[63] The tests were held simply to time setup of facilities and processes. Despite the opportunity to truly test FMS at two federally mandated exercises, one in April 2005 and the other held in 2003, HHS did not seize the opportunity to assess and evaluate them.[64]

Expeditionary Medical Support Systems

The Air National Guard also supplied medical personnel and equipment to the Gulf coast region in response to Hurricane Katrina. Similar to FMS, Expeditionary Medical Support System's (EMEDS) mission is to provide front line, field hospital care in the event of a catastrophe or terrorist attack where local facilities are too overwhelmed to adequately treat patients.[65] EMEDS operate and function like brick and mortar hospitals and have operating rooms, dental, pharmacy and lab services, intensive care units, and other facilities and equipment. These mobile hospitals have a 25-bed capacity and can be set up and ready to receive patients within 24 hours.[66] Traditionally, EMEDS are primarily for military personnel but, in response to Katrina, EMEDS were utilized to provide medical treatment to thousands of civilian victims.

STATE OF LOUISIANA

On Thursday, September 1, the Air Force deployed an EMEDS to provide medical assistance at the New Orleans Airport. Upon arrival, the EMEDS team set up and began

assisting the DMATs who had already established a make-shift facility.[67] At the New Orleans Airport EMEDS teams helped other government agencies and civilian medical teams provide treatment and health care to those individuals transported to the airport. EMEDS teams also assisted with aeromedical evacuations. According to Colonel Richard Bachman, who directed the Air Force's medical assistance in the Gulf region, "the EMEDS is to set up rapidly, treat, stabilize, and then air evacuate people out. It's a 25-bed hospital, but we took care of 2,500 people in two days, so the number of beds is essentially irrelevant, because we weren't holding them and providing long-term treatment….We never practiced hospital care in an airport terminal without tents or [having] equipment being overwhelmed by thousands of patients in the dark without air conditioning."[68] Despite the unfavorable conditions, EMEDS and other medical personnel stationed at the airport completed an enormous patient movement operation in a very brief window of time.

The Air Guard set up an additional mobile military hospital at the Convention Center to take the place of Charity Hospital and provide medical services to military personnel while other facilities are out of commission.[69] The Mississippi Air National Guard established an EMEDS to augment services of the badly damaged Hancock County Medical Center [70] The EMEDS was set up in the parking lot of that medical center and treated 47 patients before it was demobilized in late September.

State Mobile Hospital Units

As one of the few self-contained mobile hospitals in the U.S., the Carolina MED-1 mobile hospital was federalized and deployed to Waveland, Mississippi. Carolina MED-1 has complete emergency room and operating room capabilities with 100 hospitals beds and functions exactly like a brick and mortar hospital.[71] It was staffed by a team of volunteers from the Carolina Medical Center, PHS officers, and other medical volunteers. Waveland was completely decimated by Katrina and was in desperate need of medical facilities and personnel to treat residents. In total, Carolina MED-1 treated almost 5,000 patients and is considered one of the success stories of the medical response to Hurricane Katrina. Amy described Carolina MED-1 as an "invaluable asset to Mississippi's most hard hit area in Hancock County."[72]

FEMA

On Friday, September 2, Simonson wrote an e-mail asking the state of Nevada to transport its mobile medical facility (NV-1) to the New Orleans Airport.[73] He intended NV-1 to serve as a federalized hospital facility to provide medical care. Upon arrival at the airport, though, NV-1 was told its assets were no longer needed and was eventually directed to Gulfport, Mississippi where it was set up with support staff from the Nevada Hospital Association, PHS officers, and volunteer health professionals.[74] When asked why he waited until September 2 to order NV-1 to New Orleans, Simonson recalled there was some confusion as to whether Mississippi had already requested use of NV-1.[75] Simonson said ultimately NV-1 was used in Mississippi and that it was difficult to initially assess where assets were needed most.[76] In total, NV-1 saw almost 500 patients by the end of September. Both of these mobile hospitals were considered extremely valuable assets to the public health response after Hurricane Katrina.

Finding: New Orleans was unprepared to provide evacuations and medical care for its special needs population and dialysis patients and Louisiana officials lacked a common definition of "special needs"

Defining "Special Needs"

New Orleans has the largest special needs population in Louisiana. But the Louisiana Medical Director and State Health Officer, Dr. Jimmy Guidry, and the Director of the New Orleans Health Department, Dr. Kevin Stephens, never offered a clear or consistent definition of "special needs." According to Guidry, special needs people are

FEMA

defined as not requiring hospital care, but not appropriate for a general population shelter either.[77] Stephens, on the other hand, indicated the state has a list outlining what criteria constitute a special needs patient. Among the most important, Stephens said, a patient with special needs is someone who requires intermittent electricity to sustain life.[78]

In fact, the list to which Stephens referred says the state of Louisiana has one set of criteria for classifying special needs persons, while Jefferson Parish has another.[79] The state defines Category I special needs persons as "patients who are acutely ill and need to be admitted to a hospital as a patient during an emergency evacuation of the area." Jefferson Parish classifies Category I special needs people as "patients who do not yet need to be admitted, but whose condition will probably deteriorate during an evacuation." These patients are to be taken to a trauma hospital. Aside from Jefferson Parish having a definition of Category I special needs that differs from the state's definition, confusion also arises in determining whether Jefferson Parish's criteria for Category II special needs people also applies to Louisiana. Category II is for "patients with limited needs and assistance who require special needs sheltering during an emergency evacuation of the area. These will be sent to non-trauma hospitals." Again, it is unclear whether this category is specific to Jefferson Parish or if it applies to the entire state.

Additionally, the Office of Emergency Preparedness (OEP) Director for Plaquemines Parish, Jesse St. Amant, was adamant that nursing home patients are considered "special needs patients."[80] Neither Guidry nor Stephens concurred, and nursing home patients are not listed within Louisiana or Jefferson Parish's special needs categories.[81]

Stephens stated New Orleans does not keep a list to identify special needs persons in advance of an emergency.[82] St. Amant, however, keeps a database of Plaquemines Parish's special needs patient population and interviews each patient about specific requirements for transportation, medications, and other special needs. He has pre-arranged contracts to address these needs and operates on an annual budget of approximately $300,000.[83] Stephens said New Orleans uses statistics from the health care community (such as the number of patients on dialysis) to reach its estimate that New Orleans has 1,000 special needs persons. Interestingly, a September 6 EOC Report indicated the state estimated *dialysis patients alone* were greater than this figure, saying the "State projects approximately 1,200 dialysis patients."[84] Additionally, the emergency coordinator in Jefferson Parish, which is an adjacent suburb of equivalent population to New Orleans, said they have a potential of 45,000 special needs patients—41,000 more patients than the estimate given by Stephens. [85]

Sheltering and Evacuating Special Needs Patients

State officials from the Governor's Office, the Department of Health and Hospitals (DHH), and the Department of Transportation and Development said all parishes, New Orleans included, were responsible for managing special needs evacuations.[86] New Orleans designated the Superdome as a special needs shelter, and Stephens said New Orleans' plan focuses on transporting special needs people from their homes to the Superdome. Special needs patients were to be collected throughout neighborhoods, using Rapid Transit Administration buses, and taken to the Superdome — despite the fact New Orleans does not keep a list of such patients.[87]

AP PHOTO/ERIC GAY

Guidry says the state bused 200 special needs people from the Superdome to LSU hospitals in Baton Rouge on Sunday before landfall.[88] According to state officials, the New Orleans plan never called for the use of school buses for evacuation, so in their opinion, criticisms about school buses lined up underwater and unused are unfair. Additionally, state officials say New Orleans never requested state assistance or buses to help with this effort (even though Guidry indicated the state did, in fact, assist in this manner).[89]

At the federal level, FEMA Deputy Federal Coordinating Officer Scott Wells said he interpreted special needs to be anyone needing assistance, whether they were impoverished or medically disabled.[90] To his knowledge, the state and the parishes made no significant attempts to evacuate special needs persons, although he indicated there may have been efforts to shelter them. The need to shelter special needs people in the Superdome showed the state and city had not taken steps (to which they had agreed during the Hurricane Pam exercise) to coordinate the movement and sheltering of these people farther north, away from the Gulf, Wells said.[91] The requirement for medical evacuations after the storm was an indication the pre-landfall evacuation was not successful.

Parish officials outside New Orleans also described their efforts to identify and evacuate special needs patients. According to the Plaquemines Parish sheriff, before the start of hurricane season, the parish solicits people to register if they have special needs for evacuation.[92] For Katrina, school buses were used to pick up and move these special needs registrants to a shelter in Belle Chasse, Louisiana. According to the Jefferson Parish emergency management director, their emergency operations plan also includes provisions for special needs people. The parish conducts a triage by telephone to determine which people with special needs require shelter within a parish hospital. Those who qualify are given a password for admittance. For Hurricane Katrina, there were 12,000 such people identified and sheltered.[93]

Dialysis Patients

Although dialysis patients were part of his definition of special needs persons, Stephens initially acknowledged the Superdome did not have the personnel, facilities, or supplies to provide dialysis.[94] Nor did it have food appropriate for diabetics. He said although dialysis patients were discouraged from going to the Superdome for this reason, several went anyway. Stephens further stated dialysis patients were among the first patients evacuated by helicopter.

In a subsequent meeting, however, Stephens gave completely different information. He said New Orleans has an evacuation plan specifically designed for dialysis patients so they know the medical facility to which they are assigned during an emergency.[95] He contradicted his early statement (dialysis patients *were* present in the Superdome) when he told the Select Committee the city's evacuation planning worked virtually perfectly, and no dialysis patients went to the Superdome. To his knowledge, Stephens said all dialysis patients were evacuated to their pre-assigned medical facilities. Of interest, the definition of Category II special needs persons, mentioned above for Jefferson Parish and possibly the entire state, includes "kidney dialysis" patients.[96]

The Superdome

Although Louisiana owns the Superdome, New Orleans runs it with assistance provided by the state, the Department of Health and Hospitals, and the Department of Social Services when needed.[97] The city is also responsible for drafting and implementing a plan for its use during an emergency.

AP PHOTO/BILL HABER

Since 1998, New Orleans has used the Superdome to shelter citizens with special needs during hurricanes.[98] For Hurricane Isadore in 2002, supplies were pre-staged, and the facility was staffed for 400 patients. Despite these preparations, though, only 27 special needs patients were identified and treated. During Hurricane Ivan, in September 2004, the Superdome was again opened as a special needs shelter and received just 32 patients.[99] The small number of special needs patients at the Superdome during these two hurricanes gave New Orleans officials a false indication of how many patients to expect for Hurricane Katrina. As a result, the city was ill-prepared.

The Superdome only contained enough personnel and supplies to care for approximately 1,000 people.

The city's plans call for the Superdome to house only special needs patients — not the general public.[100] For Hurricane Katrina, the special needs area was established in the southeast and southwest quadrant ballrooms, where some supplies were pre-positioned.[101] According to Superdome and Sports Arena General Manager Glen Menard, the Superdome's only "pre-positioned" supplies were goods leftover from a July event which the city requested remain in place.[102] Menard also said he placed two refrigerators and power generators in the southeast and southwest quadrants of the Superdome, which were designated as the medical care areas.

By the Sunday before landfall, over 400 special needs patients were evacuated to Baton Rouge using 10 para-transport vans and three city buses.[103] For the 8,000-10,000 people who remained in the Superdome, there were federal, state civilian, National Guard, and city medical personnel to provide care. But this contingent proved too small to provide care for the multitude of people who eventually sought refuge there. After the flooding, but before evacuation of the Superdome, it is estimated 23,000 people were sheltered there.[104]

As the crowd grew, it became increasingly difficult for the facility to care for special needs patients — the Superdome only contained enough personnel and supplies to care for approximately 1,000 people.[105] Section 132, next to the Superdome's First Aid Station, was used for evacuees in need of general medical attention.[106] With severe overcrowding of evacuees and flooding from roof leaks, the rest of the crowd was moved to elevated bleachers. Menard said eventually the special needs patients were further evacuated from the Superdome to the Sports Arena.

DMAT OK-1 departed from LSU to the Superdome on the evening of August 29.[107] Upon arrival, the National Guard told DMAT OK-1 it wasn't needed inside, redirecting the team to the Sports Arena, which is attached to the Superdome by two open-air walkways. DMAT OK-1 finally set up operations at the Sports Arena late that night and began receiving patients the morning of August 30. The establishment of this DMAT came 36 hours after FEMA reported serious medical problems in the Superdome, including 400 people with special needs, 45 to 50 patients in need of hospitalization, and the rapid depletion of supplies.[108]

Evacuations finally began on August 31, and medical workers prepared records for their patients. In the end, though, those records were lost in the confusion. Evacuation of the Superdome concluded on September 3. Six people died in the Superdome—five for medical reasons and one from suicide.

Convention Center

Similar to the Superdome, the Ernest N. Morial Convention Center (Convention Center) is the property of the state of Louisiana. However, the Convention Center was never intended to serve as a shelter of any kind — special needs or otherwise — so there were no medical capabilities in place prior to the storm.[109] When asked by the media about conditions at the Convention Center, Brown said, "(W)e learned about that (Thursday), so I have directed that we have all available resources to get that convention center to make sure that they have food and water and medical care that they need."[110] The Convention Center General Manager Warren Reuther, however, does not recall the provision of any medical assistance for the evacuees at his facility.[111]

AP PHOTO/ERIC GAY

Reuther is an appointee of Governor Kathleen Babineaux Blanco and says his responsibilities are to oversee the Convention Center and protect its assets.[112] Despite the fact the Convention Center was not intended as a shelter, evacuees seeking dry land arrived there, and upon finding the glass entry doors locked, broke in. Reuther estimates between 18,000 and 25,000, perhaps even 30,000 people, eventually gathered at the center.

During the storm, Reuther and approximately half a dozen of his public safety staff remained in place, attempting in vain to maintain order as evacuees filled almost every area of the building.[113] The Convention Center was quickly overwhelmed, running on reduced emergency power until all power was lost when fuel ran out on the night of August 30. Public bathrooms became overloaded, and problems were compounded by loss of water pressure. Hallways became the de-facto toilets. Walk-in refrigerators were emptied on the floor, and many evacuees began bringing their own food and alcohol into the building. Almost 32,000 chairs were broken or lost, 90,000 square yards of carpeting were destroyed, and the facility's infrastructure was damaged. Gunshots were reportedly heard, and Reuther and his staff were forced to hide from the crowds.

Evacuations at the Convention Center began Friday, September 2 and continued until Sunday, September 4. Despite Reuther's assertion medical assistance never arrived, a DOD e-mail indicated medical teams were established and operating at the Convention Center on Saturday, September 3.[114] Medical needs were unclear because of poor communication and situational awareness. The number of evacuees continued to increase at the Convention Center as evacuations at the Superdome concluded. People left at the Superdome were directed to the Convention Center, where they would later be evacuated. Throughout the ordeal, Reuther saw no deliveries of food, water, or other supplies. At one point, he called Blanco but received no answer. He also never saw Nagin throughout the ordeal.[115]

AP PHOTO/ERIC GAY

A Doctor's First-hand Account

Dr. Gregory Henderson is a Tulane University and Vanderbilt University School of Medicine graduate. He lives in New Orleans and is the Associate Chairman of the Ochsner Clinic Foundation Department of Pathology and Laboratory Medicine. He was set to begin his new job at Ochsner on September 1.[116]

Henderson happened to be attending a physician leader retreat for Ochsner staff on Friday, August 26 and Saturday, August 27, at the Ritz-Carlton hotel on Canal Street when the meeting was cut short because of the impending landfall of Hurricane Katrina.[117] He evacuated his family to Jackson, Mississippi and chose to stay at the hotel so he could remain close to their home.

By the morning of Tuesday, August 30, the Ritz-Carlton was surrounded by three to five feet of water and Canal Street was flooding.[118] There was a hotel announcement that anyone who needed medical care should report to the hotel's French Quarter Bar. Fortunately there was another medical conference involving medical specialists (seven physicians, a physician's assistant, and pharmacists) taking place at the hotel. The impromptu medical team had already started to organize a list of medicines and supplies they might need. Looking outside and talking to the police, he realized looting was occurring outside the hotel, and it appeared the looters were armed. Henderson, along with a family practice physician, pharmacist, and two officers from the New Orleans Police Department (NOPD), waded across Canal Street through waist-high water to the Walgreens pharmacy across the street. They were able to break into the pharmacy and began stuffing insulin, drugs, and medical supplies into plastic garbage bags. There was a confrontation with the looters, who were held back at gunpoint by the officers. Henderson was able to carry three bags of supplies back to the hotel.

He set up a make-shift clinic at the hotel for the next 24 hours. The majority of the patients were seeking prescription refills, a lot of which he did not have.[119] He subsequently opened another "clinic" when NOPD moved their operational headquarters and command and control center from the Ritz-Carlton to the Sheraton hotel across the street.

He was told by NOPD that Tulane, University, and Charity Hospitals were taking on water and basically inoperable and was asked by an NOPD captain if he could stay and take care of several hundred police officers who had set up camp at the Sheraton.[120] Henderson was dispatched with a team of armed officers and took additional supplies, including insulin, from a second Walgreens pharmacy. Many patients Henderson treated had "generalized anxiety disorders, not unexpected as most of the police had lost homes and some had lost family members and yet still were on the job." There

were also many cases of hypertension and diabetes. "I remember thinking it seems like the majority of the NOPD were hypertensive and type II diabetic. I took a lot of blood pressures, listened to a lot of hearts, and refilled a lot of beta-blocker, calcium channel blocker, and diuretic prescriptions. I cleaned and dressed a lot of superficial wounds. I gave a lot of insulin shots," he said.

Henderson had forgotten to take rubbing alcohol and used Wild Turkey bourbon to sterilize the injection sites.[121] He also distributed the antibiotic, Cipro, and treated several skin rashes which were so severe some police officers had to walk around in underwear. He believed the severe contact dermatitis may have resulted from exposure to toxins in the water. Katrina Rash, they began calling it.

In the meantime, police officers told him stories of rapes and murders at the Convention Center, but because of the lack of communications, they were essentially unable to do anything about it or even confirm the rumors.[122] On September 1, under NOPD escort, Henderson went to his new office at the Ochsner Clinic to collect additional medical supplies.

AP PHOTO/ERIC GAY

On the way back to the Sheraton, he asked an NOPD captain to drive by the Convention Center.[123] There, he saw "thousands upon thousands of people collected on the boulevard in front of the convention center. There were the infants to the elderly in wheelchairs. There were many elderly lying on sheets and blankets on the median. There were screaming men, women, and children and dazed quiet and confused men, women, and children. Most were African-American, but many were white." The NOPD captain was minimally armed and refused to let Henderson get out of the car, but promised to bring him back with armed escort.

Henderson, accompanied by Officer Mark Mornay, returned to the Convention Center where he treated dehydrated infants, mothers, and "hundreds" of elderly confined to wheelchairs.[124] One woman in a wheelchair had deep epidermal ulcerations and two gangrenous toes, and there was nothing he could do for her. He saw three children have seizures because they ran out of medication. He saw and treated a severe asthma attack by only coaching the child's breathing. He saw diabetics who had been without insulin, oral hypo-glycemics, and dialysis for days. Mornay told Henderson he could not be responsible for his safety after dark, so they returned to the Sheraton.

Finding: Most hospital and VAMC Emergency Plans did not offer concrete guidance about if or when evacuations should take place

The South Central VA Health Care Network (VISN 16) outlines preparedness and response procedures in the event of a hurricane in its Emergency Management Program Standard Operating Procedure NO. 10N16-1.[125] This section provides the Network Director's Office, as well as the Emergency Operating Centers, with much leeway regarding the assignment of specific responsibility to personnel. Facilities threatened by a hurricane are instructed to "contact their home healthcare patients, especially those that are oxygen or ventilator dependent, and PBHC to determine if they intend to evacuate of (sic) come to the facility." Additionally, "Threaten (sic) HCSs/VAMCs will be required to evaluate all patients and determine patients that can be moved to other facilities along with special needs (oxygen/suction/ventilator/IV/ etc.) requirements by either ground or air transportation."

A VAMC is instructed to have made final evacuation decisions within 36 to 48 hours prior to landfall.[126] The number of patients evacuated should depend on how much threat the hurricane poses to the facility. If the VAMC does decide to evacuate patients, the evacuations should be completed 24-hours prior to a hurricane's landfall.

The VAMC Biloxi, Mississippi Emergency Plan addresses hurricane evacuation protocol more methodically but still gives confusing directions regarding if or when the facility should be evacuated in anticipation

of a hurricane's landfall. Also absent is specific information about evacuation transportation.

The plan begins by stating, "The basic planning tenet for hurricanes includes a total evacuation of the Gulfport Division."[127] The VA health care system is instructed to work in "close cooperation" with "Alabama and Mississippi to provide evacuation vehicles and facilities for use prior to storm strike."

When a hurricane enters the Gulf of Mexico and/or is 96 hours or less away from landfall, "the Gulfport Division will be evacuated entirely."[128] When a hurricane is within 72 hours of making landfall, the facility is instructed to prepare for evacuations on short notice. When a "storm/hurricane enters the Gulfport (sic) of Mexico and is 48 hours or less away from landfall at Biloxi/Gulfport," the plan indicates the VAMC Director and the VISN 16 Director are to determine when evacuations will begin. The plan notes, however, "Evacuation may not be required and is not automatic." If the directors do choose to evacuate, all patients must be moved when the storm is "24 hours or less away from landfall at Biloxi/Gulfport."

Chapter I of the VAMC New Orleans Emergency Management Plan outlines procedures for total evacuation of patients and staff.[129] The plan indicates the evacuation procedures in this section "will be used for any situation requiring internal transfer of patients or total evacuation of patients from the Medical Center," so while not clearly stated, it appears this plan should be used in the event of a hurricane.

VAMC patients and staff are directed to evacuate to the ground level. While this plan is more detailed than the VAMC Biloxi plan, it does not account for potential flooding whereby the street exit and the ground floor of the parking garage would be inaccessible.[130] In terms of exactly *how* to evacuate, the plan states, "Exact evacuation procedures to be followed will be dictated by the nature of the disaster and the extent of damage to the Medical Center buildings."

If a full-scale evacuation is necessary, the plan says patients "may be transferred to the VA Medical Center, Alexandria, LA.[131] Transportation of patients to outside facilities will be accomplished by means of commercially owned buses, ambulance services, government lease vehicles or any other means available from outside sources (i.e., National Guard, City of New Orleans)." The plan does not include more detailed information on which services to call upon first or what, if any, transportation agreements have already been made. Likewise, there is no indication of which hospitals should be used in such an emergency if the hospitals in the immediate surrounding area are not operational.

Chapter III states when a Hurricane Watch is established, the VAMC Chief of Staff should coordinate the "relocation of specialty care patients to other facilities if necessary."[132] Beyond this call for initial coordination with "other facilities," there is no outline for when or specifically how to evacuate patients. Additionally, the plan calls for the evacuation plan from Chapter I be used in the event of flooding. Again, the five previously-described pages outlining evacuation procedures in Chapter I do not provide guidance on steps to take in the event of flooding.

The Emergency Management Manual for the Medical Center of Louisiana at New Orleans (MCLNO) covers both University and Charity Hospitals.[133] The manual says the Emergency Management Program Coordinator is responsible for developing, implementing, and monitoring all aspects of the emergency program. The manual provides summary information about evacuation procedures during an emergency, but like the VAMC plans, does not provide concrete information on whether facilities should evacuate in anticipation of a hurricane.

The MCLNO plan states if the CEO (or the designee) so decides, "patients shall be evacuated to an area of safety by whatever means are available. Formal agreements will be in place with ambulance services and neighboring facilities to transfer patients as necessary. All personnel will be trained in evacuation procedures."[134] The reader is then directed to reference the Emergency Management Evacuation Policy, Reference #1026, for LSU's ambulance contract, transfer, and vendor agreements. (The Select Committee was not provided with a copy of the Emergency Management Evacuation Policy.)

The plan devotes an entire section to evacuation procedures and provides step-by-step instructions to specific personnel.[135] For a total facility evacuation, it says, "Formal agreements will be made for the following…" and goes on to list ambulance contract agreements, transfer agreements, and vendor agreements for special needs. Decisions regarding the transfer of patients to other facilities may be made as early as 96 hours in advance of a potential hurricane. By 72 hours prior to potential landfall, the plan calls for decisions to be made regarding transfers.

People were trapped inside hospitals, with a banner hanging from Charity Hospital that read, "Stop the lying and get us the hell out of here."

Methodist Hospital uses the Hurricane Preparedness Plan established by the New Orleans Office of Emergency Preparedness.[136] This plan suggests hospitals may begin evacuation preparations when there is a slow-moving Category 3, a Category 4, or a Category 5 hurricane within 72 hours of landfall (and is predicted to make landfall within 100 miles of New Orleans). The CEO or his designee has the authority to call for evacuation. Actual evacuations may begin up to 60 hours in advance. At 60 hours, the plan says, "Make arrangements for at least two flat-bottom type boats in the event of severe flooding conditions" and to fuel vehicles to capacity. The announcement of total or partial evacuation is called, if applicable, no later than 24 hours in advance. The Director of Facility Services, 12 hours prior to landfall, is to "ensure emergency vehicles and boats are in position and ready for immediate use."

There is also a section of the overall Hurricane Preparedness Plan devoted entirely to evacuations (The Hurricane Evacuation Plan) which states, "…evacuation from the Hospital will be a 'last resort' measure and will be carried out only when a mandatory evacuation is directed by the appropriate authority, or when a situation arises which places patients and staff unquestionably in harm's way. The threat of a direct strike by a major hurricane certainly creates such a situation, and evacuation may be necessary to protect the safety of patients and attending staff."[137]

If evacuation takes place prior to a hurricane, Methodist has written transfer agreements with two hospitals outside the major hurricane danger zone.[138] This section provides the contact information for Lifeguard Transportation Service, Inc. and Acadian Ambulance and Air Med Services — the two companies with whom the hospital has written transportation agreements. If these services are overwhelmed, the plan instructs the hospital to call the New Orleans Office of Emergency Preparedness.

As illustrated by these plans, hospitals and VAMCs lacked sufficient guidance for if and when they should evacuate their patients in anticipation of a hurricane. They also did not follow the limited guidance they did have.

Finding: New Orleans hospitals, VAMC, and medical first responders were not adequately prepared for a full evacuation of medical facilities

After New Orleans flooded, city medical centers needed to be evacuated. On September 2, *Good Morning America* showed the desperation of people trapped inside hospitals, reporting on a banner hanging from Charity Hospital that read, "Stop the lying and get us the hell out of here."[139] Flood waters prevented hospitals from receiving supplies or personnel, and some private hospitals, such as Methodist, say medical supplies and fuel tanks being airlifted to them by their corporate headquarters were being intercepted by FEMA.[140] Many hospital emergency power generators were located at ground level or lower (often below sea level) and were subject to flooding. To make matters worse, fuel pumps were often placed at ground level, and fuel storage tanks (with limited fuel capacity) were frequently below ground level.[141] Three acute care hospitals in the New Orleans area remained operational, four maintained some limited function, and 21 were not operational, closed, or evacuated. In hospitals that lost power like Methodist, pulmonary ventilator systems and other medical equipment requiring electricity became inoperable. Patients requiring ventilators were sustained by hand pumps.[142]

AP PHOTO/BILL HABER

State and FEMA urban search and rescue teams were sent to help the hospitals evacuate, but they were intercepted by people trapped in the floodwaters and on rooftops.[143] While Guidry said hospital evacuations were a huge logistical success

— they evacuated 12,000 patients by Saturday, September 3 — they did not seem like a huge success to the many patients awaiting rescue.

Hospital and VAMC Evacuation: Their Stories and Timelines of Events

Evacuations from VAMCs for Hurricane Katrina have received mostly favorable attention, particularly in comparison to the evacuation difficulties encountered by other New Orleans hospitals and shelters. "We had people on ventilators, we had liver patients, ambulatory patients, and every patient that we evacuated from every one of our facilities made it through this evacuation," VA Secretary R. James Nicholson said.[144]

On Monday, August 29, the VAMC Biloxi domiciliary patients and nine members of the medical staff were evacuated to VAMC Tuscaloosa, leaving 904 patients, staff, and family members sheltered in VAMC Biloxi.[145]

FEMA

VAMC Gulfport patients were transferred to other facilities before the storm made landfall. VAMC New Orleans did not mass evacuate prior to the storm, and during the two days that followed, August 30 and 31, its evacuation plans were activated. Five five-ton trucks were used in cooperation with DOD's air transport staff and HHS to evacuate 98 patients to the New Orleans Airport on September 1. From there, the patients were flown to the Houston, Jackson, and Alexandria VAMCs. At this time, efforts were also underway to evacuate the remaining 94 patients and 367 staff and family members at VAMC New Orleans. By Friday, September 2, all patients, staff, and family members were evacuated from VAMC New Orleans.

Donald Smithburg, CEO of LSU Health Sciences Center/Health Care Services Division, and approximately 20 members of his staff provided a detailed account of the evacuation of their facilities, Charity Hospital (Charity) and University Hospital (University).[146] Smithburg went to Baton Rouge to staff the state EOC on the Saturday before the storm, and on Sunday at 7:00 a.m., he activated Code Grey but decided against calling for evacuation.

At 5:30 a.m. on Monday morning, University lost electrical power. Charity followed, losing power at 8:00 a.m.[147] Both hospitals began using their emergency generators just two to three minutes after the power failures. Charity's generators and electrical equipment were located in the basement, and LSU officials said they knew Charity would probably lose emergency power if severe flooding occurred. The waters continued rising over the course of Monday, and late that night, Charity lost its emergency generators. Unlike Charity, University's emergency generator and electrical equipment were housed on the second floor, considered high enough to avoid flooding and low enough to avoid wind damage. University lost emergency power anyway, and both hospitals were left in darkness and without the means to care for their patients.

On Tuesday, August 30, Louisiana Wildlife and Fisheries evacuated nine of the 17 Intensive Care Unit (ICU) patients at University and four from the Charity campus.[148] Evacuation efforts were suspended, however, due to reports of gunfire and impending nightfall. On Wednesday, August 3, at 3:00 a.m., LSU received a request from the state OEP to prepare a patient roster. Officials were told patients should be triaged to red, yellow, and green status (red, critical; green, stable), and LSU staff gathered the necessary information manually. Later that morning, the state OEP notified them via the HEAR system to prepare for evacuation, but evacuation aid never arrived. At 11:00 a.m., Charity was notified its evacuation was to begin in 30 minutes, but by 4:00 p.m., they were still awaiting word from the National Guard regarding potential evacuation. That evening, the hospitals were notified the water level was too high for evacuation via the National Guard's five-ton trucks.

Further complications arose on Thursday, August 31 when LSU was told evacuation orders were on hold due to rumors of violence and potential harm to rescue workers.[149] An e-mail between HHS employees that morning confirms this: "Patient evacuation has been hampered by security issues on patient movement. It is unsafe for patient movement to continue without security provided."[150] LSU was told evacuations would resume after the arrival of federal troops. Smithburg said the Coast Guard and National Guard were evacuating people in the most immediate danger, so LSU was not a top priority.

FEMA

Evacuations for University and Charity patients and staff began on Friday, September 1 at 8:00 a.m. and noon, respectively. The U.S. Coast Guard arrived by helicopter. Patient evacuations were facilitated by the Coast Guard, Louisiana and Florida Wildlife and Fisheries, NOPD, and state police. HHS e-mails that morning also indicate, "today's priorities are Charity and University Hospitals."

A total of 167 patients were evacuated from University and approximately 200 from Charity.[151] LSU indicated that all of these patients were sent with paper records and three patients died due to the storm; two were ventilator patients who died on the roof of the hospital during evacuations.

Larry Graham, CEO for Pendleton Memorial Methodist Hospital (Methodist), monitored the storm on his own and stated he received no calls from the city or state government.[152] On Friday at 5:00 p.m., he believed the storm would miss New Orleans, but on Saturday, he realized there was going to be a problem. He began contacting all hospitals with which Methodist had transfer agreements, but none would admit patients due to concerns about how the storm might affect them. All of Methodist's agreements are with hospitals in Louisiana or Mississippi because all patient transport is handled via ground ambulance. He likewise indicated Methodist is a "for-profit" hospital, meaning it does not receive FEMA funding and is responsible for the costs of airlifting patients. Even with such funding, however, Graham is not sure evacuation measures are practical. In anticipation of Hurricane Ivan, Methodist evacuated over 30 ICU patients over a total of 45 hours. However by Saturday, August 27, Methodist did not have time for an evacuation of this scale.

Methodist housed a total of 750 people during Hurricane Katrina, including 130 patients.[153] Twenty-eight were ICU patients with 12 patients on ventilators, and 16 were dialysis patients. Chalmette Medical Center (Chalmette), Methodist's sister hospital located 12 miles away, evacuated its six ICU patients to Methodist. The remaining people at Methodist were staff, family, and people who had sought shelter in the hospital from the storm.

Like University and Charity, Methodist's emergency generators failed after the storm.[154] The generators were located on the roof, but the fuel pumps had flooded. Graham cut power in all areas that were deemed "not critical," and they hand-ventilated patients requiring oxygen. The next day, they began hand-carrying fuel to the generators. Chalmette's generators were located on ground level. At the time, however, Tim Coffey, the then CEO of Chalmette, believed the facility was sound.

On Sunday, August 28, ambulances were supposed to be en route to the hospital, but Graham said they were commandeered by government officials.[155] Methodist's parent company, Universal Health Services, Inc. (UHS), located in King of Prussia, Pennsylvania, was sending the hospital supplies, including fuel and water, via helicopter. The supplies never arrived because, as Methodist and UHS believe, FEMA intercepted the cargo. Army officers and FEMA officials arrived on Tuesday, and Graham informed them he needed assistance with evacuations. The officials assured him they would return but never did. Throughout the ordeal, Methodist had the assistance of 12 National Guardsmen as well as police forces that stayed for security reasons. Post-Katrina evacuations started taking place on Wednesday, August 31 because Methodist's corporate office contracted with private companies. The difficulties the hospital encountered were still enormous, though, as a September 2 e-mail from a Methodist doctor to HHS staff indicates:

> "Contrary to what has been reported on the news, Methodist Hospital, including Albert and Maxine Barrocas have not been evacuated, and the details are grisly. FEMA has been intercepting supplies sent to the hospital, and patient and staff evacuations have essentially ceased.
>
> If anyone can help bring attention to this problem, please help us. Below are some facts related to us by the staff at the hospital during one of the few occasions we have been able to talk to them.
>
> - 600 People in hospital
> - 13 patients on gurneys
> - Staff is dehydrating
> - FEMA is DIVERTING support being sent in by UHS (owners of hospital) away from the hospital

- Temperature is 110 degrees with humidity
- NO fuel left to operate th!!e hospital tower (sic)
- NO communication with National Guard to coordinate evacuation of patients
- Having to feed 500+ non-patient refugees — they are very close to rioting for the balance of food water and supplies
- NO power, NO communication
- Everything is manual — no xray — running out of supplies
- Patients are on the 2nd floor and 3rd floor — having to carry patients up the stairs and helicopters didn't come back
- Without power, the ventilator dependant patients are being manually bagged in 1 hour shifts by staff
- Refusing to take gurney patients
- FEMA is commandeering all supplies and all private efforts to get supplies including fuel, food, water
- Governor is misrepresenting what is going on
- Snakes in hospital
- Rashes on staff from water
- Losing nurses as result of dehydration
- Need FEMA to land on roof and prove what they are saying is correct
- No security—uprising for f!!ood, water and supplies (sic)
- Governor did not allow for the evacuation of hospitals and now won't help
- Uprising of refugees"[156]

Graham said the evacuations at Methodist were completed late on Friday, September 2.[157] He also stressed that mid-way through the evacuation, he learned patients who were triaged to the New Orleans Airport were not receiving adequate care. He began withholding patients who were supposed to be taken to the airport because Methodist was in a position to provide them with better care. He cited this as a primary "critical issue" — the evacuation of patients to locations unable to provide medical care. Coffey added that Chalmette doctors who went to the New Orleans Airport to offer their services were turned away by DMATs who said they were not credentialed in the NDMS physician database.

On September 20, an official from Tenet Healthcare (Tenet), Memorial Hospital's (Memorial) parent company, told CNN the National Guard evacuated some patients from Memorial before the flooding began on Tuesday, August 30.[158] The next morning, Wednesday, Tenet reported to CNN that it asked New Orleans local authorities for assistance in evacuating critically ill patients but was told it would have to hire private companies. Later that day, Tenet says local authorities and good samaritans provided limited assistance with evacuations by boat. On Thursday, helicopters hired by Tenet airlifted approximately 400 patients, employees, and evacuees from Memorial to another Tenet-owned hospital in Slidell, Louisiana. Tenet indicated flights were suspended overnight after reports of sniper fire, but evacuations resumed, and were completed, by the end of the day on Friday, September 2.

Louis Armstrong International Airport

The medical operation at the New Orleans Airport was chaotic due to lack of planning, preparedness, and resources

After patients were evacuated from medical facilities, most were taken to the New Orleans Airport, which served as a hospital for the sick, a refuge for thousands, and the hub of medical evacuations and airlifts.[159] There were two separate missions at the airport. The first was attending to the medial needs of evacuees and the second was processing evacuees not needing medical attention. According to OR-2 DMAT, evacuees who needed medical treatment were triaged, treated, and prepared for transports. People not requiring medical

AP PHOTO/RONHAVIV/VII

care were processed and prepared for transport to shelters in other states by commercial aircraft. In total, over 21,000 displaced persons not requiring medical care were evacuated.

"Overnight, we turned New Orleans' airport into the busiest helicopter base in the entire world. At any given time, there were at least eight to 10 helos off-loading on the tarmac, each filled with 10 to 40 survivors at a time, with 10 circling to land . . . It was a non-stop, never-ending, 24-hour-a-day operation," said Dr. Hemant Vankawala, a member of the Dallas DMAT deployed to the New Orleans Airport.[160]

FEMA

Medical patients arrived by truck, bus, ambulance, and helicopter with little or no information or records about their conditions. The medical personnel at the New Orleans Airport were challenged by the sheer number of patients and the lack of information about patient medical histories. By August 31, three DMATs had arrived at the airport.[161] Eventually, eight DMATs would be stationed at the New Orleans Airport to help provide care during patient movement operations in New Orleans.[162] The Air Force also deployed an EMEDS team, on Thursday, September 1, to augment the medical assistance operation in place at the airport.[163] These EMEDS teams also assisted with aeromedical evacuations.

An OR-2 DMAT after-action report described medical facilities established in the upper and lower levels of the west terminal of the airport.[164] These facilities were supplied and staffed by DMATs and PHS officers. The flow of patients was constant, and it is estimated the entire medical operation at the New Orleans Airport treated approximately 3,000 patients who were eventually evacuated by military aircraft to other facilities. Some DMATs believe the number was much greater — as high as 6,000 to 8,000 patients.[165]

Despite the treatment and evacuation of thousands, the medical operation at the New Orleans Airport was chaotic due to lack of planning, preparedness, and resources. FEMA officials did not conduct an adequate assessment of the situation before deploying DMATs. Upon arrival, many teams were confused about where to place assets and how to integrate into the existing operation. Many DMATs arrived before their cache of supplies, limiting their ability to do their work. According to Vankawala, medical personnel were operating with a limited amount of supplies and a generator with only partial power. "All we could do was provide the barest amount of comfort care. We watched many, many people die. We practiced medical triage at its most basic — black tagging the sickest people and culling them from the masses so that they could die in a separate area," Vankawala said.[166]

FEMA

"We practiced medical triage at its most basic — black tagging the sickest people and culling them from the masses so that they could die in a separate area," Vankawala said.

TX-1 and TX-4 DMATs, which were among the first to arrive, had equipment that was not updated and could not link together other critical equipment, such as ventilators.[167] Similarly, one team member from OR-2 DMAT observed "five different models/brands of glucose monitors, all using their own proprietary test strips that weren't interchangeable. The CA-4 cache, which was current, arrived later and supplemented these caches."[168]

OR-2 DMAT reached the conclusion that, "there didn't appear to be a clear plan for dealing with the approximately 25,000 evacuees who arrived at the airport.

There was insufficient food, water, and sanitation."[169] One team member said evacuees were being taken from a dehumanizing experience (flooding and rescue) and placed into an equally dehumanizing environment at the New Orleans Airport.

Finding: The Government did not effectively coordinate private air transport capabilities for the evacuation of medical patients

The Association of Air Medical Services (AAMS), comprised of 300 mostly private air transportation providers, represents 85 percent of all hospital transport capabilities.[170] In coordination with the Center for Transportation Injury Research, AAMS has a database called the Atlas and Database of Air Medical Services (ADAMS)— a web-based, interactive database listing these air medical services (rotary and fixed wing aircraft) and receiving hospitals. The database is updated annually, funded by the Federal Highway Administration, and receives technical support from the National Highway Traffic Safety Administration. In response to Hurricane Katrina, there was only one governmental request for access to ADAMS.[171]

Nevertheless, AAMS companies provided support for medical evacuations of both hospitals and nursing homes in Hurricane Katrina's aftermath. They were not used for pre-landfall evacuations and provided most of their resources without official contracts with hospitals.[172] Authorities were slow to establish a system for filtering evacuation requests. Confusion and indecision about evacuations led to delays.

AAMS said FEMA did not help their efforts.[173] On the morning of August 30, FEMA tasked Carla Brawley, a Department of Transportation contractor, to find and secure air medical resources.[174] Brawley contacted Acadian Air Ambulance (Acadian) flight coordinator, Mike Sonnier, to request resources. Acadian is the largest air ambulance provider in Louisiana. An AAMS after-action report stated,

> "According to Mr. Sonnier, sometime later that morning the National Guard Air Boss (name unknown) contacted Mr. Sonnier at Acadian and tasked him to serve as his civilian equivalent. Mr. Sonnier and Acadian air ambulance was then tasked with coordinating missions into and out of New Orleans airspace, coordinating requests for air evacuations from many of the New Orleans area hospitals, and also serving as the main contact between civilian providers and the lone FAA contracting officer that was tasked for this job by the Department of Transportation for FEMA."

AP PHOTO/UNIVERSITY OF ALABAMA AT BIRMINGHAM, STEVE WOOD

By the end of the day, approximately 50 medical helicopters and 13 fixed-wing aircraft were in New Orleans.[175] While the first air evacuation took five hours, coordinators were in place to expedite the process on Wednesday. Over the next 96 hours, approximately 2,000 air medical evacuations were coordinated through AAMS members.[176] Acadian estimates it was responsible for 800 of these evacuations.[177] AAMS members accomplished these evacuations despite difficulties in communication and coordination. Poor use of assets and lack of coordination prevented additional evacuations. AAMS estimates it could have been able to move up to 7,000 patients if a better system had been in place.[178] "The first 72 hours was chaos," said one AAMS member.[179]

The majority of requests came directly from hospitals, such as Tulane University Hospital and Charity Hospital, because they were not receiving help through the Emergency Management Assistance Compact (EMAC).[180] On August 29, Hospital Corporation of America Division President Dave Smith requested AirHeart Air Ambulance of Sacred Heart Health System help with evacuations of Tulane. Smith said fuel for the generators was running low and floodwaters were approaching the facility.[181]

The following morning, Tuesday, Tulane University Hospital requested assistance with transporting "two specialty pediatric patients" from New Orleans to Little

Rock, Arkansas.[182] The Arkansas Children's Hospital and its affiliate, Angel One Transport, responded along with other children's hospitals.[183] Fixed wing aircraft were provided by two hospitals in Texas: Texas Children's Hospital in Houston and Cook Children's Hospital in Fort Worth, and Mercy Children's Hospital in Kansas City, Missouri. Additionally, Miami Children's Hospital provided a helicopter to assist with the evacuation of "13 critically ill PICU (Pediatric Intensive Care Unit) patients and family members." Tulane also directly contacted Florida-based Air Methods Lifenet Division that same day for evacuation assistance. In addition to these requests, personal networking also proved valuable in the absence of formal agreements. On August 31, a doctor who lived in Hawaii and had attended Tulane University, contacted a colleague at Tulane University Hospital. Together, these two doctors coordinated the assistance of Hawaii Air Ambulance. AAMS donated helipad coordinators to aid in efficiency and were able to evacuate 200 patients by noon on Friday, September 2.[184]

Compared to New Orleans, AAMS involvement in Mississippi was markedly different. Air Methods Lifenet Division summarized their experience in Mississippi by saying, "During the entire Katrina experience in Mississippi, there was no federal command and control or coordination of resources across the whole area. Attempts to coordinate with FEMA rescue operation center in Jackson, Mississippi were rebuffed by federal officials there who stated clearly that all air evacuations in Mississippi, medical and USAR, had been federalized. And that no civilian medical aircraft were needed."[185]

John Dickerson, the FEMA EOC representative in Mississippi, declined offers from one AAMS agency to provide 25 helicopters to Mississippi. The Mississippi EOC had requested support, through EMAC, from Florida air transport agencies.[186] Johnny Delgado, program manager of Baptist Health South Florida, Baptist Health Air Transport, and a Board Member of AAMS, had a crew and was ready to fulfill the request. They were en route to Gulfport, the meeting point for air medical evacuation support agencies, but were turned back. Dickerson told them because the response was now federal, private agencies are not allowed to assist. However, a different AAMS company dealt with the Mississippi EOC directly and was able to provide support to the state.[187]

Finding: Hospital and VAMC Emergency Plans did not adequately prepare for communication needs

The Biloxi, Mississippi VAMC Emergency Plan states when a hurricane is in the Gulf of Mexico and is 24 hours or less away from landfall, the Facilities Management Services (FMS) "will distribute emergency communications equipment. The facility's HF/VHF radios will be ready to be set up in the Director's Conference Room."[188] This part of the emergency plan does not, however, indicate which FMS team member is responsible for the distribution, including what specific equipment is to be distributed and to whom. Instead, the plan says FMS should develop its own Service Supplemental Hurricane Plan (SSHP) to address these issues.

The SSHP lists communication preparations and available equipment.[189] In addition to providing emergency communications equipment, the FMS is responsible for ensuring there are adequate linens, the Recreation Hall is set up as an employee shelter, and evacuation services are in place. VAMC Biloxi says its FMS team typically includes four to six people (two or three craftsman and two or three housekeepers) to handle this wide range of operations.[190]

The plan also lists the VAMC's communications capabilities but does not mention satellite phones discussed previously in the SSHP. It relies "primarily upon the use of telephones" and focuses on a telephone system designed exclusively for internal communications.[191] Two-way radios are designated for specific personnel, but the plan recognizes limits to radio capabilities, stating, "The limited number of radios and single voice transmission, however, combine to impose several restrictions." The radios are intended as back-up to the inter-office telephone system. The VAMC plan relies on landline telephones and the Hospital Emergency Area Radio (HEAR) Network System to communicate with the Emergency Medical Services (EMS) and outside world.

The VAMC New Orleans Emergency Management Plan also depends on the HEAR Network System for communication with area hospitals and ambulances.[192] The Chief of Police Services is to maintain a "pool" of Motorola radios, the exact number of which is not specified but will be used upon activation of the

emergency plan. Radios should be distributed to 11 staff members, all of whom are designated in the plan. The plan also indicates radios will operate for about eight hours before needing to be charged and provides the frequency at which these radios operate. The failure response section does not mention potential power failures, and in turn, the inability to recharge the radios. Additionally, no section of the plan addresses when the two-way radios should be distributed in preparation for the storm. In fact, the Hurricane section of the plan fails to mention radios or refer the reader to the communications chapter.

The Veterans Health Information Systems and Technology Architecture (VISTA) Contingency Plan cites hurricanes as a "high probability" threat.[193] A telecommunications contingency plan included within the VISTA plan lists responsibilities and procedures for personnel in charge of communications during a telephone system failure. This plan indicates hand-held radios and/or cell phones will be used if landlines do not work and details who distributes the radios as well as who or what areas receives them. A total of 26 areas within VMAC New Orleans are to be provided with two-way radios (one radio per area), but there is no indication of how these radios should stay charged in the event power is lost. Additionally, "a cache of cellular phones are maintained by CIM Service Line Director . . . . " The exact number is not specified, but the plan states eight areas are "designated as first priority to receive cellular telephones." As with the two-way radios, there is no planning for how to keep these cellular phones charged in the event that power is lost.

Charity and University use the Emergency Management Manual for the Medical Center of Louisiana at New Orleans.[194] The hospitals depend on two-way radios, cell phones, HEAR Radio, HRSO Radio, 800MZ Radio, and HAM Radio links for internal and external communications backup.

Methodist's Disaster and Emergency Preparedness Plan charges the Hurricane Preparedness Control Center with establishing and maintaining emergency communications.[195] The control center is assigned special telephone extensions as well as backup telephone numbers in case landlines fail. HEAR radio equipment, including the backup system, should be tested when a storm is more than 72 hours away. At 72 hours, the director of Facility Services is to designate the radio operator's availability and "ensure operator adequately (sic) trained." At 60 hours before landfall, battery supplies are checked. When the storm is 24 hours from landfall, the director of Facility Services provides the maintenance supervisor with a two-way radio unit. When the storm is 12 hours away, the director of Facility Services should "position emergency equipment supplies and prepare for immediate operations" and conduct a "final check of the emergency power system." He or she is also supposed to ensure the radio operator is on duty and has contact on the HEAR system.

Methodist's plan takes into account the potential for flooding as a result of a Category 3, Category 4, or Category 5 hurricane stating, "Flooding conditions to some extent can almost certainly be expected to accompany a hurricane.[196] Several recent studies and surveys by hurricane forecasting experts indicate that the entire New Orleans area is extremely vulnerable to "catastrophic flooding" as a result of a major storm." If flooding is predicted or reported, the CEO is instructed to shut down telephone communications equipment and reassign communications attendants to the Control Center.[197] As such, all communications would obviously be lost.

These hospital and VAMC emergency plans lack a clear communications section, often leaving unanswered questions about what communications capabilities are in place, who is responsible for the equipment, and how to respond if power is lost. As a result, Gulf coast medical facilities were left without appropriate equipment or a proper understanding of how to implement an effective emergency communications plan.

Finding: Following Hurricane Katrina, the inability of VAMC New Orleans and hospitals to communicate impeded their ability to ask for help

Hospital executives said in Katrina's aftermath, hospital emergency area radio HEAR systems simply did not work.[198] Cell phones worked occasionally and allowed them to get in touch with the Louisiana Hospital Association, which in turn contacted the OEP on their behalf. The primary source of information was

Hospital executives said in Katrina's aftermath, hospital emergency area radio system (HEAR) simply did not work.

television.[199] In an interview with CNN on September 30, Dr. Albert Barrocas, a physician at Methodist, said, "We were trapped, communications was a big issue. The fact that we could not bring family and patients together, a lot of them were separated. The majority were separated. We did not even know where these people were going to."[200]

The Director of VA Veterans Integrated Service Network 16 (VISN 16), Robert Lynch, tells a similar story. "There was no plan in Biloxi and New Orleans. Hard-working people did a lot of workarounds with a lot of creativity. We're going to learn from that," he said.[201] VISN 16 lost communications through its telephone landlines, operated by Sprint, during the storm. Lynch indicated that satellite phones worked sporadically and only when outside. In Biloxi, reports indicate only one cellular tower remained, and cell phone users could only make calls — not receive them. The VA worked around the communication failures by establishing a schedule for employees to be outside with satellite phones.[202]

Smithburg said that on Sunday at 7:00 a.m., the hospital set up an incident command center in its board room for communications.[203] The following day, the hospital went to Code Grey, and HAM operators arrived at the hospital. LSU had a point of contact at the OEP, but after the storm, LSU couldn't receive information from the OEP or FEMA. On Monday, August 29, Smithburg reported that Nextel and cell phone service were temporarily lost on the University campus, and text messaging was "intermittent."

Smithburg cited inadequate Health Resources and Services Administration grant funding as the primary reason for communication failure and said the LHA receives the federal grant money and allots it to Louisiana hospitals.[204] While the grants were helpful for supplying Motorola phones and a HAM network, he believes the funding for LSU was disproportionately small in comparison to its needs and patient load.

In the days following Hurricane Katrina, Gulf coast hospitals and VAMCs were responsible for hundreds of patients, some of whom were in critical condition. Without necessary communications capabilities, these facilities were almost completely isolated from first responders and the outside world. Incapacitated and without supplies, many struggled to provide care and keep patients alive until help arrived.

Finding: Medical responders did not have adequate communications equipment or operability

Inadequate communications and situational awareness among and within federal agencies contributed to a diminished understanding of the health needs of affected populations

On October 20, Stephens told the *Associated Press*, "Anything that could go wrong in communications went wrong."[205] Interviews with health officials and countless e-mails from ESF-8 agency personnel support his statement. Immediately following Hurricane Katrina, cell phones and landlines were not working, blackberries were not dependable (and in some cases, unavailable), and satellite telephone capabilities were not sufficient.

In preparation for Hurricane Katrina, Stephens oversaw the placement of an incident command trailer inside the Superdome.[206] Immediately following the storm, he said landlines, the only mode of communication for his team, worked just five to 10 percent of the time. By Wednesday, cell phones began working intermittently but not enough to meet their communication needs, and despite his initial preparations, Stephens said these communication failures "weren't anticipated at all."

Colonel Kenneth K. Knight, Chief of the Air Force Medical Operations Center presented a timeline that showed similar difficulties — its communication systems were inoperable until September 1.[207] On this date, the Air Force medical response timeline says there were, "Few working landlines and cell phone success [was] spotty." It was not until four days after the storm, on September 2, the "cell phone network [was] improving."

Likewise, Colonel Falk, an Air National Guard Surgeon, cited communications as the number one area needing

improvement.[208] Both the Air National Guard and Army National Guard experienced almost a total failure in communications. The Army satellite system was not working, and personal cell phones (service provided by Verizon) were the only means of contact. Likewise, the National Guard Bureau's "After Action Review" indicates communication failures adversely affected situational awareness. It states, "Lack of situational awareness was caused largely by the loss of communications. The lack of communications and difficulties with interoperability of equipment between forces as well as between the military and civilian leadership also hampered the rapid generation of EMAC requests. Poor communications also resulted in a lack of visibility of available assets in nearby states."[209]

National Guard Bureau Chief Lieutenant General Steven Blum indicated many guardsmen were equipped with outdated radios, and it was impossible for them to communicate with the Army's 82nd Airborne Division and 1st Calvary Division. "You don't want two units operating in the same area, doing the same function, that can't coordinate their efforts because they don't have the communications equipment," Blum said.[210]

The Deputy Assistant Secretary of HHS, Office of Public Health Emergency Preparedness, Dr. Robert Blitzer, said communications were initially a big problem.[211] The command center used land lines and cell phones, and Blitzer also ordered a mobile communications center, which was deployed from Washington, D.C. to Atlanta and then to Baton Rouge. Blitzer had not needed to deploy the mobile communications center for the previous four hurricanes that hit Florida. HHS Principal Deputy Assistant Secretary for Public Health and Emergency Preparedness, Dr. Gerald Parker, knew of just one satellite phone, located on the command bus, and said all SERT leaders "probably" had one.[212] Simonson said he thought there were two satellite phones per SERT, but for every satellite phone call that was successful, there were probably six failed attempts.[213]

Communication failures also affected NDMS. NDMS Chief Jack Beall said not only did his staff not have enough equipment, the operability of the equipment they had was "in and out."[214] Satellite phones worked only when trucks containing the satellite equipment were pointing in the right direction. But as Beall said, "When you have people dying, there's no time to mess with satellite phones." Overall, his Nextel cell phone was his best option for communicating, but when he or his staff worked in the Superdome, it was "total blackout." Efforts to remedy this problem began on September 3, with NDMS working to reach agreements with private cellular companies for the provision of "communications on wheels."[215]

OR-2 DMAT also cited communications as a key obstacle — particularly the operability of cell phones and interoperability of radios inside the New Orleans Airport.[216] "There is an over reliance on cellular phones for communications. The cellular infrastructure was severely damaged during Katrina and cell phone service was initially unavailable . . . . ," OR-2 DMAT reported. Radios also proved insufficient — the JT-1000 radios provided for the team could not contact radios in distant areas of the airport. Similarly, the team had no communication with security personnel via radio until the Forest Service provided Bendex King radios.

The breakdowns in communication experienced by government officials are illustrated in ESF-8 agency personnel e-mails. These e-mails show correspondence was almost non-existent until August 31, and difficulties sending and receiving messages persisted well into the first week of September. On August 31, a SERT member e-mailed the EOC and said, "My BB doesn't work at all, any communications with me will have to be through cell."[217] In Mississippi, a September 3 e-mail from the Gulfport Field Command Center indicates, "No phones or power as of now. Cells sometimes, Nextel service best. T-mobile not good for BBs at this area but do work other locations."[218] On September 5, a week after the storm, e-mails indicate that communications had not significantly improved. A CDC employee wrote the EOC saying, "Our folks in the field only have access to blackberry now. (The phone lines are going in and out and faxes are very difficult to send)."[219]

Much attention has been paid to lack of operability and the inability of first responders to connect with each other through the equipment they had. Some responders, however, were having difficulties just getting the equipment itself. A SERT team member on her way to Baton Rouge e-mailed HHS officials on September 5 saying she needed a cell phone and blackberry. A response from an HHS official states, "We do not issue Blackberry's to individuals for deployments (and we don't have any anyway), we have also exhausted our total cache of phones, so we have absolutely nothing to issue. If things

change, I will advise you."[220] Likewise, the OR-2 DMAT report says there were an insufficient number of Motorola JF-1000 radios for their convoy, and other teams who did not have access to radios at all "encountered safety-related issues due to a lack of communications." The radios and satellite phones inside the FEMA trucks were also of no use to DMAT teams, as they had not been programmed.[221]

From lack of equipment, to inoperability, to failure to program satellite phones, communications proved to be one of the greatest obstacles to the Hurricane Katrina medical response. Critical time was wasted. And energy that should have been spent treating patients was instead spent on repeated, and often times unsuccessful, attempts to communicate.

Finding: Evacuation decisions for New Orleans nursing homes were subjective and, in one case, led to preventable deaths

"We see where there are gaping holes in our system. It has become clear that no one was evaluating these plans in any real sense. The system provides no check and balance."

—Louisiana State Representative Nita Hutter[222]

Like its hospitals, Louisiana's nursing homes (all privately owned, with the exception of two) are responsible for having their own evacuation plans.[223] These plans are required to be updated annually, and before the start of hurricane season each year, DHH sends a reminder letter. DHH also checks to ensure every Louisiana nursing home submits a plan; however, media reports indicate DHH cited only one nursing home in the past year for submitting an inadequate plan.[224]

Most plans encourage patients' families to help with evacuations, and several southeast Louisiana nursing homes have agreements with nursing homes in northern Louisiana for the transfer of residents after evacuations.[225] The statewide occupancy of Louisiana nursing homes is roughly 70 percent, which allows evacuated nursing homes to find bed space elsewhere. Before Hurricane Katrina's landfall, 19 nursing homes evacuated their residents. After the flooding in New Orleans, an additional

AP PHOTO/MARI DARR-WELCH

32 nursing homes evacuated. One nursing home, Saint Rita's, did not evacuate at all, and 35 residents died. Overall, it is estimated that 215 people died in New Orleans nursing homes and hospitals as a result of Katrina and failed evacuations.[226]

Three Louisiana Nursing Homes

Michael Ford is CEO and owner of three nursing homes in the New Orleans area — Riverbend Nursing and Rehabilitation Center (Riverbend), located in Plaquemines Parish, Metairie Health Care Center (Metairie), located in Jefferson Parish, and Waldon Health Care Center (Waldon), also located in Jefferson Parish.[227] Combined, these nursing homes house close to 360 patients. Ford is also the Vice President of the New Orleans region of the Louisiana Nursing Home Association (LNHA) and is a member of the Plaquemines OEP. According to Ford, all nursing homes' emergency plans must be approved by the state. Riverbend's emergency plan calls for the establishment of a pre-determined evacuation site, usually in a church gym in Kentwood, Louisiana, for both staff and patients. Ford has evacuated his nursing home patients once before, in anticipation of Hurricane Ivan, using an 18-wheel flat bed trailer equipped with air conditioning and a generator. The experience was trying, with the patients sitting "on a bus for eight hours to go one hundred miles," but he also says it gave him and his staff experience for Hurricane Katrina.

Ford received notice of the mandatory evacuation for Plaquemines Parish on the Saturday before Katrina made landfall. Jesse St. Amant, the OEP Director for Plaquemines Parish, declared the evacuation at 9:00 a.m. on August 27 and said, "If they don't leave, I tell 'em they're going to die in place."[228] Despite the difficulties moving patients for Hurricane Ivan, Ford listened to St. Amant and evacuated his nursing home in Plaquemines. Evacuation of Riverbend to the church in Kentwood was assisted by approximately 25 church volunteers, who

"If they don't leave, I tell 'em they're going to die in place."

moved patients by carrying them on mattresses. Ford eventually relocated all but 50 of his patients to a wing he rented at Kentwood Manor Nursing Home. The rest were taken to one of Ford's other two nursing homes in Jefferson Parish. It took almost six weeks to find accommodations and move everyone.[229]

Ford decided against evacuating Metairie, thinking it would withstand the storm. Subsequent flooding, however, forced him to evacuate 115 patients.[230] Using Wildlife and Fishery department boats and a Louisiana Army National Guard two and a half ton truck, patients were taken to higher ground on the interstate. Buses from the New Orleans' EOC collected some patients on the evening of August 29 and took them to a staging area in Baton Rouge, Louisiana. Ford had some pre-existing contracts for housing his patients elsewhere, but he moved them to the first available locations — all of which were in Louisiana. By mid November, patients from Metairie were moved to the Waldon facility (which was not evacuated for Katrina), where they remain today.

St. Rita's Nursing Home

The night before landfall, Ford had a phone conversation with Mabel Mangano, who co-owns St. Rita's Nursing Home with her husband. "I'm staying," she told him.[231] Media reports indicate the Manganos were so confident about the safety of St. Rita's, they invited staff, friends, and relatives to use it as a shelter.[232]

The Manganos and their 78 patients remained in the nursing home throughout the storm, and like many in New Orleans, thought they were safe after the hurricane passed.[233] But the floodwaters began to rise — eight to nine feet in 30 minutes — and the Mangano's grandson swam out and brought back a boat. They began putting patients on mattresses floating like rafts.

AP PHOTO/ROBERT F. BUKATY

On September 13, the Manganos were charged with 34 counts of negligent homicide.[234] Attorney General Charles Foti's September 14 press release stated the "charges stem from Mable Mangano and Salvador Mangano, Sr.'s alleged failure to evacuate St. Rita's Nursing Home, contrary to the facility's own evacuation plan and in violation of the St. Bernard Parish's mandatory evacuation. Additionally, subsequent to the mandatory evacuation order, authorities offered to send two buses and drivers to evacuate residents from the facility and the Manganos allegedly declined this offer."[235]

The News-Star, a Monroe, Louisiana newspaper, says despite these charges, "the Manganos did not abandon St. Rita's during the flooding. Nor did they seal the fate of their elderly residents by strapping them to their beds before leaving, as was widely reported. They worked alongside their staff and a few Good Samaritans during the frantic rescue effort . . . . "[236] Parish residents may soon be the judge.

Finding: Lack of electronic patient medical records contributed to difficulties and delays in medical treatment of evacuees

Although HHS partnered with the AMA to establish a website allowing physicians and pharmacists to electronically access the prescription records of patients affected by Katrina, few patients or health care providers had access to medical records or a common medical record system

As Hurricane Katrina tore through the Gulf coast region, it destroyed millions of pages of paper files and patient medical records in doctor offices, clinics and hospitals. Thousands of patients displaced from the region by the storm lacked medical records and were forced to depend on memory and knowledge of their medical history, allergies, and other important information.

AP PHOTO/DON RYAN

Kindred Hospital in New Orleans was one of the few facilities in the Gulf coast with electronic patient medical records. When Kindred evacuated 54 patients following Katrina, the hospital was able to send patients' medical records electronically to other Kindred operated facilities in Baton Rouge and Houston where the patients had been transferred.[237] Additionally, Kindred was able to print and mail hard copies of a patient's electronic medical history for those who were evacuated to non-Kindred facilities.[238]

Eighty pediatric cancer patients from the Gulf coast were evacuated to St. Jude Children's Research Hospital (St. Jude) in Memphis, Tennessee.[239] The hospital was tasked with tracking down oncologists who fled flooded New Orleans with treatment records to ensure appropriate treatment for the pediatric patients. Additionally, doctors at St. Jude were forced to rely heavily on parents' recollection and notes of their children's treatments. "I honestly feel quite comfortable that the worst-case scenario is we delayed treatment" for some children, Dr. Joseph Mirro said. But there was "a lot of flying by the seat of your pants to get it right."[240]

According to Stephens, all medical files and documentation made regarding the treatment and medical attention provided to evacuees in the Superdome were lost.[241] This contrasts sharply with how patients' medical information was handled at the Astrodome in Houston. Thousands of the evacuees at the Superdome and Convention Center were transferred to the Astrodome without any paper or medical files. Volunteers in Houston were tasked with documenting patient information and registering evacuees to create new electronic medical records. The Harris County Hospital District created a large clinic in the Astrodome, which included 80 computer terminals to aid in registering patients and recording their medical history and information.[242] By September 9, records had been created for approximately 8,000 Katrina evacuees.[243]

Additionally, the American Medical Association (AMA), National Community Pharmacists Association (NCPA), and several other organizations collaborated to launch the KatrinaHealth.org prescription medication network in September. The network is a secure online service to help physicians and authorized healthcare providers access medication and dosage information for Katrina evacuees.[244] The network allows and authorizes physicians and pharmacies to provide prescription refills, or prescribe new medications.[245] It facilitates coordinated care and helps to avoid potential medical errors by providing access to patient information. The AMA provides physician credentialing while NCPA provides authentification of pharmacists and pharmacies.[246]

Because the VA has developed an electronic patient record system for its facilities, electronic records for over 50,000 New Orleans VAMC patients were downloaded to tapes and transferred to the VAMC in Houston.[247] The Houston VAMC was able to reconfigure and restore them after the New Orleans VAMC evacuation. The records chief for the South-Central VA Healthcare Network said, "Every single thing on that computer was saved."[248]

Hurricane Katrina showed that physicians are often our "second" responders. They, too, need the support of sophisticated IT systems, enabling them to respond to a crisis quickly and retrieve and share critical records and

"I honestly feel quite comfortable that the worst-case scenario is we delayed treatment" for some children, Mirro said. But there was "a lot of flying by the seat of your pants to get it right."

information. The emerging public health threats of the 21st Century require the seamless flow of information at all levels of government. The need for better integration of IT into the healthcare industry was highlighted by thousands of Katrina evacuees with no medical patient records.

HHS has made recent efforts to support digital health recovery for the Gulf coast. In November, HHS announced partnerships with the Southern Governors' Association and DHH to accelerate electronic health records in Gulf states to create accessible, accurate medical records and medical information.[249] These partnerships will help physicians, medical practices, and hospitals rebuild medical records for their patients as they return to the region. However, National Coordinator for Health Information Technology, Dr. David Brailer, said, "Making patient data accessible to authorized physicians, whether it is following a hurricane or as part of routine care, remains a challenge that must be addressed."[250]

Finding: Top officials at HHS and NDMS do not share a common understanding of who controls NDMS under ESF-8

On a larger scale, the command structure between HHS and the NDMS was problematic. ESF-8 is implemented by the Assistant Secretary for Public Health Emergency Preparedness at HHS; however, NDMS is housed and operates under FEMA (DHS) authority. For Hurricane Katrina, NDMS was activated by FEMA on August 25.[251] According to the FEMA Office of General Counsel, activation of NDMS would certainly have "stood up" ESF-8.[252] However, there is no evidence of action under ESF-8 until August 27, when HHS first convened conference calls.[253] During a natural disaster or public health emergency, HHS and NDMS communication and coordination is essential for an effective response.

According to Simonson, coordinating the public health response under ESF-8 was "a strain without operational control and logistical support."[254] He says the relocation of NDMS left HHS with few operational assets. Despite HHS responsibility for coordinating the federal response to public health emergencies, HHS only has PHS Commissioned Corps, SNS, and other smaller functions under its command. Unlike NDMS, none of HHS remaining assets are configured for a quick response. Instead, HHS assets are meant to sustain existing medical services and infrastructures. Simonson also indicated that without direct control over NDMS assets, the efficiency and effectiveness of ESF-8 is crippled. With modest operational assets, Simonson noted HHS lacked situational awareness, saying, "HHS lost its field network to FEMA when NDMS was moved to DHS."[255]

As executor of ESF-8, Simonson attempted to coordinate the pre-positioning of medical assets prior to Katrina's landfall.[256] He spoke directly to Stephens on Saturday, August 27 and Sunday, August 28 to ask what supplies the Superdome needed. As a result of those conversations, Simonson called then Acting Director of the Response Division Edward G. Buikema at FEMA to "aggressively advocate" DMATs, water, ice, and MREs be positioned in the Superdome prior to landfall. Simonson believed it would have been much easier to task NDMS if those assets had been under his direct control. When asked about attempts at coordination between the two agencies, Simonson said NDMS participated in ESF-8 conference calls, but despite its participation, acted as an asset of FEMA without coordinating mission assignments with him.

An e-mail from a U.S. Army Corps of Engineers Liaison at DOD, Mark Roupas, to Assistant Secretary for Defense for Homeland Defense Paul McHale on August 29, however, suggests Simonson did have a say in NDMS' activation. Roupas says: " . . . . DHHS is trying to decide which health care approach is better: 1) activate NDMS and move the patients out of the state or 2) move medical beds and personnel into the affected area and treat there. DHHS medical planners are meeting with Mr. Simonson at 6pm to discuss and decide which course of action to accept. If the decision is to move the patients via NDMS, then DHHS will activate the NDMS system. If the decision is to treat intrastate, then we should expect a formal RFA for -500 beds and personnel support."[257] This e-mail begs the question: how was the primary coordinator of medical response unaware that FEMA had activated NDMS on August 25?

Simonson believes ESF-8 should be more "clearly articulated."[258] He also believes the relocation of NDMS to DHS in 2003 undermined NDMS effectiveness.

Since its transfer, funding for NDMS has been stagnant, with millions of dollars being siphoned off to support "unidentified services."[259] NDMS has lost two-thirds of its staff since 2003. "There is room for substantial improvement in coordination between NDMS and the rest of ESF-8. Either ESF-8 should be directly responsible for NDMS or ESF-8 should be moved to where NDMS is located," Simonson said.[260]

Beall disagreed and told a much different story about the coordination between NDMS and HHS.[261] He said HHS has the authority to move NDMS and its assets under ESF-8 and that, to his knowledge, NDMS did not deploy any assets, with the exception of pre-positioning, without a direct order from HHS. He said HHS and NDMS were in close coordination throughout the operation, and that any coordination issues were more likely a result of internal difficulties within HHS — not between HHS and NDMS. He believes NDMS relocation to FEMA allows the system to "lean forward" more than it could under HHS.

How these two senior officials view the coordination and authorities for HHS and NDMS speaks for itself. Without a clear understanding of who has functional jurisdiction over NDMS, coordination of the system and all of its assets was certain to result in failures.

The OR-2 DMAT report illustrates command structure confusion, and general coordination problems, between NDMS and the DMAT teams it managed at the New Orleans Airport. OR-2 DMAT members reported a number of command-related issues, including:

- ICS/NIMIS (or any form of an organized internal command and control structure) was not implemented by FEMA/NDMS at the airport. (Some attempts to use ICS were made by FEMA/NDMS following the arrival of a Forest Service overhead team, but were generally not that effective.)
- There was no formalized unified command established between the many participating agencies until late in the response.
- No safety officer was initially appointed at the command level (in a very unsafe environment).
- Roles, responsibilities, and reporting structure of the two MSTs (Baton Rouge and Airport) were never clearly articulated. It was unclear what role the PHS representative at the airport had.
- Liaisons with military and civilian entities participating in relief efforts at the airport were never established.
- There did not appear to be any initial interfacing at a management level with knowledgeable local medical providers, public health officials, and local emergency providers.
- There appeared to be a lack of communications between the Airport MST and Baton Rouge MST as well as NDMS headquarters.
- Information was not being effectively communicated to the DMATs from either of the MSTs.
- There was considerable friction between DMATs and the MSTs. An 'us and them' attitude was prevalent.
- Only one fulltime FEMA/NDMS employee was present at the airport MST (arriving after operations had started). All other Airport MST staff were taken from onsite DMATs, reducing the number of team personnel for patient treatment and operations support.
- Inexperienced leaders were placed in an overwhelming and chaotic environment that caused their effectiveness to rapidly deteriorate.
- Management decisions that were being made were not based on the best interests of the patients.
- There was inadequate equipment available to produce the copies and paperwork FEMA was requiring.[262]

The OR-2 DMAT report further states, "FEMA/NDMS operations at the airport were extremely disorganized compared to parallel military and Forest Service operations." Tensions between FEMA/NDMS and DMATs is an ongoing problem and "continues to compromise the efficiency of operations due to a lack of trust between both parties."[263]

Beall agreed there was tension and speculated DMAT members are accustomed to being in control of their environments and are not used to taking orders from federal officials.[264] He also said most of the FEMA NDMS officials deployed during Katrina and giving orders to DMATs were unseasoned and their inexperience contributed to the friction.

Historically, the mission of DMATs was to rapidly deploy and set up self-supporting field hospitals and provide medical care within the first 72 hours after a disaster before the arrival of other federal assets.[265] Alternatively, FEMA has historically operated under the assumption that state and local officials are the first line of defense during the initial 72 hours following a disaster until a federal response can

be coordinated. The NDMS response to Katrina suggests that FEMA was unable to support the historical rapid-deployment capability of NDMS.[266]

Finding: Lack of coordination led to delays in recovering dead bodies

The lack of coordination among agencies also contributed to delayed recovery of dead bodies in the Gulf coast region. According to ESF-8, HHS is responsible for victim identification and mortuary services. HHS has authority to ask DHS and DOD to assist in providing victim identification and mortuary services; establishing temporary morgue facilities; performing victim identification by fingerprint, forensic dental, and/or forensic pathology and anthropology methods; and processing, preparation, and disposition of remains.[267] The most experienced personnel in this area are a part of NDMS under the authority of FEMA and DHS. DOD also has significant expertise in mortuary affairs and mass fatality management.

Despite having this authority, HHS was slow to respond and coordinate efforts with DOD and DHS. On Sunday, September 4, DOD sent an e-mail to DHS recognizing the need to assist overwhelmed state and local authorities in victim identification. The e-mail provided a brief analysis of the situation in the Gulf coast region and said, "If this analysis is correct, it's not if, but when and how DOD will be asked to assist in the mortuary affairs response."[268] The e-mail further says DOD has developed "potential plans on what kind of requirements will be needed and how DOD can provide response support. Currently we have identified the potential missions of search and recovery, remains transport to establish human remains collection points, and assistance with DNA capture analysis."[269] The e-mail recommends a meeting between DHS, HHS, FEMA, and DMORT to discuss coordination among agencies and the commercial sector. It is unclear if and when this meeting took place. What is clear, however, is DOD essentially took the lead in coordinating an operational mortuary affairs plan, which was originally the responsibility of HHS.

Following the e-mail from DOD, HHS personnel recognized the need for an "integrated ESF-8 response" and devising a "coordinated way to collect and share information."[270] When asked why it took an e-mail from DOD six days after Katrina's landfall, Simonson responded, "HHS was not involved in discussions with actual body recovery. FEMA, DOD, and Kenyon International Emergency Services (Kenyon), a mortuary services contractor, were in discussions for recovery services and it was unclear who was in charge of the recovery effort."[271] ESF-8 is not responsible for recovering bodies but is responsible for mortuary services. As a result, HHS "had to wait for certain discussions to be made before going ahead with specific decisions. Everyone was frustrated with how slow the initial discussions were going."[272] Before HHS can coordinate victim identification and other mortuary services, FEMA, DOD, and state officials must have a recovery plan in place.

Body recovery was no less confused. For days, bodies went uncollected as state and federal officials remained indecisive on a body recovery plan. With state and local officials utterly overwhelmed by the disaster, they were initially more focused on rescuing Katrina's survivors than recovering dead bodies. By September 5, inaction was causing frustration. "Number 1 issue is body collection," Army Colonel John J. Jordan, military assistant to Brown at FEMA, wrote in an e-mail that day.[273] Jordan continued, "This issue must be addressed, and frankly, there is operations paralysis at this point. FEMA is pushing State to see what they want to do, and indications are that Governor is involved in some of the decisions, especially regarding interment." A week later, Blanco publicly blamed FEMA for the delay and its inability to sign a contract with Kenyon for body collection services.[274] Kenyon later signed a contract with the state.[275]

One week after landfall, on September 5, Simonson requested "ample mobile mortuary services throughout the affected region."[276] An order for 200 mobile mortuary trucks was issued with 130 designated to Louisiana and 70 to be delivered to Mississippi.[277] By the next day mortuary services were being established in St. Gabriel, Louisiana with 96 personnel.[278] FEMA and Louisiana collaborated on drafting a body recovery plan which required the approval of Brown, and the Louisiana "newly appointed" state medical examiner.[279] In Mississippi, mortuary services were established at the Naval Air Station in Gulfport. By September 6, one DMORT had set up facilities at the Naval Air Station. Body recovery was an enormous task that took several months to complete. Each home in the affected area was inspected twice for bodies. Mortuary services continue in the region as remains are identified and returned to families.

Finding: Deployment confusion, uncertainty about mission assigments, and government red tape delayed medical care

"Coordinating all of those agencies isn't a simple thing and [is] very difficult to practice. We sit down and do tabletop exercises where we go over who's going to do what, but a disaster of this magnitude is something that is very difficult to simulate or really practice. So, we rely on really well-trained, capable people that can adapt and adjust to whatever the situation is to get the job done."

— *Colonel Richard Bachmann, U.S. Air Force*[280]

In the wake of Katrina, first responders worked tirelessly — days and nights in miserable conditions — to provide medical care to thousands of hurricane victims. The coordination of these medical personnel, supplies, and equipment proved to be a daunting task. At one point, a frustrated member of the CDC Division of Emergency Operations wrote: "The approval process for a bottle of aspirin seems to be the same as for a 500 bed hospital."[281] From confusion about mission assignments and deployments, to broader misunderstandings about command structure, coordination was undoubtedly an obstacle to the Gulf coast medical response. Coordination efforts were impeded, and in turn, these impediments adversely affected the overall medical response.

Deployment Assignments

Hundreds of e-mails were sent from medical first responders to government officials expressing confusion and frustration over their deployment orders. On Friday, September 2, a PHS officer in Oregon sent an e-mail saying, "I've got supervisory approval and have had my bags packed and ready in the trunk of my car to leave at a moment's notice since Tuesday. Is there anything further you can tell me?"[282] On September 5, a Food and Drug Administration employee e-mailed the PHS coordinating officer saying,

> "I'm deploying tomorrow. I don't have any information about the mission and whether my role has changed from the original (FMCS MST 4 – there has been some issues with travel and just got my itinerary tonight so not sure if those issues were due to a change in assignment). I've gotten a phone call from a member of my team looking for direction and I don't know what to tell him. Please provide any information you can."[283]

Another PHS officer wrote, "Once again, sorry to bother you. However, what is the status of this mission? From the email I received earlier this week things were supposed to happen in 24-72hrs. At your earliest convenience, could I please get an update on this?"[284]

There was also confusion within government ranks regarding who had the authority to deploy officers and what officers had already been approved for deployment.[285] An internal PHS e-mail sent September 1 stated,

> "We are receiving reports from one Warden indicating that many of his staff are deployed. The problem is they are not on our Master list that we have been providing to OFRD. Can you provide me your latest deployed roster identifying the BOP officer/assets. I am thinking maybe these officers are on August or September rosters???"[286]

An August 30 e-mail from the chief of the Coast Guard medical division said,

> "I apologize for the confusion of the rosters with CG officers that were released earlier. It appears that all PHS officers were required to go to a website and register yesterday AM per the attached email. Many officers did this without knowing that registering automatically noted agency approval for a CCRF mission. I attempted to register without the agency approval box clicked in order to provide CG comments. The website only allowed submission with this box clicked positive . . . kind of a Catch-22."[287] A member of OFRD wrote FEMA saying, "This officer is stationed in AR and is not on our list of officers deployed. Who deployed him?"[288]

There was also limited visibility between agencies. An e-mail from a CDC employee to HHS/OS staff and CDC staff on September 9 stated, "Since OSHA is Labor Dept we have no visibility on their deployments at this time…could be they will link up with NIOSH team when

they all arrive, but we may well not know anything."[289] This correspondence reflects the absence of updated and accurate lists of who was available for deployment, who was not available, and who had already been deployed.

Mission Assignments

As late as September 22, evidence of confusion remained about who was in charge of what aspects of the response. An HHS incident manager wrote, ". . . . it appears that the POC for the 250 ambulances is no longer the State EMS Director Terry Bavousett, but has changed to the three names below. Please get your representative at the JFO to address this ASAP or the ambulances will end up at Reliant Park instead of the locations that Terry Bavousett has requested."[290] The FEMA liaison to CDC wrote, "I might be the only one — I doubt it — but I'm really confused with the structure within CDC/DEOC for this operation. Can you send out a team structure list of team leads as well as their DEOC schedule?"[291]

Clarity about missions was also lacking in the medical response to Hurricane Katrina—as evidenced by the lack of planning for the United States Navy Ship (USNS) Comfort. The USNS Comfort is a medical treatment facility with a primary mission of supporting medical needs for the military and serve as hospital facilities as part of a humanitarian effort.[292] It has a 1,000 bed capacity with 80 beds designated for an intensive care unit and 12 operating rooms. The Select Committee received varying cost estimates for operating costs for the USNS Comfort. According to the U.S. Northern Command, operating costs for the USNS Comfort are roughly $82,910 per day underway and $29,155 a day pier side.[293] However, a *Philadelphia Inquirer* article states, "When on full operational status, the daily costs exceeds $700,000 a day, according to the Navy."[294]

Originally destined for New Orleans to provide medical care to storm victims, the Comfort was redirected on September 9. "The Comfort is now headed for Pascagoula, Miss due to the lack of a medical mission in NO. Do not have anticipated arrival at that site, but SOC will advise when they get the information. Decision has been made that two cruise ships will now be used to house state workers."[295] That same night, clarification about a mission assignment was never received. An e-mail exchange between HHS employees states, "USNS comfort

FEMA

docked today in Pascagoula. I listened in to most of the conference call and nobody could seem to think of a mission for them. State Health Dpt was clear that they had nothing at this time."[296]

Additionally, the redirection of 250 ambulances required a significant number of approvals. An HHS incident manager wrote, "I have just been informed by FEMA HQ that Jack Colley or Dr. Sanchez the originators of the request will need to approve the change in the location of the delivery of the ambulances. Would you please contact your representatives at the JFO and ask that they confirm the location change with Reliant Stadium to the two staging areas noted in your e-mail with either the ESF# 7&8 representatives. GSA will then confirm back to you the delivery locations and times."[297]

Government Red Tape

Bureaucratic red tape also stood in the way of the medical response. The OR-2 DMAT report states, "The team was activated on the afternoon of Tuesday, August 30, and given instructions to be in Houston the next day, August 31. Because of the policy of making individual travel arrangements (see below), the last team member arrived in Houston shortly after midnight on September 1. The team departed for Baton Rouge in rental SUVs and vans at 5:00 a.m. on September 1. During the drive, team commanders had several phone conversations with other teams at the New Orleans Airport who stated the team was urgently needed due to the large number of patients. Instead of heading directly to the airport, the team was requested to first stage at LSU. After staging for nearly two hours, the team received an escort to the New Orleans Airport, arriving at approximately 3:30 p.m. Roughly 48 hours had elapsed since the activation order and the team arriving at the incident."[298] The report further says that because team members were deployed individually, their medical response was delayed.

On September 2, the Special Assistant to the Assistant Secretary of Defense for International Security Affairs, Jon G. Ferko, wrote McHale saying Blanco was withholding medical supplies until she received President Bush's word Louisiana would be reimbursed. The e-mail to McHale says:

> Sir,
> Some information that I thought you should know:
>
> My brother is on the ground at the health and human services command center in Baton Rouge. He says the situation is 'grave' — he and his team are working desparately to save lives without medical supplies – he said he doesn't even have a bandaid.
>
> His team spoke with the Governor of LA and she refuses to release ANY amount of funds for supplies until POTUS assures her of reimbursement. The team down there does not know who to work through to release funds – and this is the federal command team.
>
> I felt that you should have this info – my brother actually called home in tears because they can't do anything to stop the loss of life….[299]

Conclusion

The numbers do not lie. Thousands of lives were saved, a tribute to the medical professionals and volunteers who worked around the clock under enormously grueling conditions. Yet, there is another, more sobering realization that can't be ignored either. Those numbers could — should — have been even greater. It wasn't a lack of effort that hindered their success. It was a lack of planning, lack of initiative, and lack of response.

There were not, for example, nearly enough medical personnel teams in position prior to landfall, which led to unnecessary delays in getting the right equipment and supplies to the right people. FEMA and HHS needed to plan for the worst. Instead, they scrambled for supplies in an effort that was often times uncoordinated. In too many cases, it was too late. Clearly New Orleans residents with "special needs" paid a disproportionate price. Neither the Louisiana Medical Director and State Health Officer, nor the Director of the New Orleans Health Department,

AP PHOTO/BILL HABER

could clearly define the "special needs" population, much less adequately provide for it.

From the storm's impending landfall through the flooding of New Orleans, confusion grew over if, and when, hospital, VAMC, and nursing home evacuations should occur. Time was rushing by, lives were in jeopardy, and even when evacuations were finally deemed necessary, these institutions were not prepared to do it efficiently. One possible solution would have been better utilization of private firms to aid in evacuations. It was the answer in a few instances, but it could have been the answer in so many more. In all, an estimated 215 people died in New Orleans nursing homes and hospitals as a result of Katrina and failed evacuations.

Compounding problems for medical responders was poor communication and coordination. So poor, in fact, that at times, the only way to receive information was through television. And the lack of access to medical records, or a common, electronic medical record system, led to delays in treating evacuees. Suffering was also prolonged as attempts at coordination, within and between government agencies, proved frustrating and inadequate. Confusion arose over mission assignments and command structure. Medical officers and volunteers had little information about their deployment orders, many waiting for days with their bags packed and ready. And while some medical teams waited, without equipment or supplies to care for patients, state and federal officials squabbled over reimbursement.

Thousands of American men and women selflessly gave their time, money, and expertise to save lives. Unfortunately, lack of preparation, reticence to act, and confusion over coordination are all part of the story as well. Though there was the will, the medical response to Hurricane Katrina showed there wasn't always a way. The initiative of men like Mike Ford and Jesse St. Amant was the exception to the rule. ■

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[5] HHS: What We Do *at* http://www.hhs.gov/about/whatwedo.html/ (last visited Jan. 27, 2006).
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[24] E-mail correspondence from Keith Holtermann, Incident Manager ESF#8 7P-7A Watch, HHS, to EST-ESF08-A, et al. (Sept. 5, 2005) (9:46 p.m.).
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AP PHOTO/RON HAVIV/VII

"We were then lured to the so-called evacuation points. This was several days after the hurricane had struck. The city was flooded … They loaded us onto military trucks after they told us they would take us to shelters where our basic needs would be met."

"We were in a wide open space along the interstate and under the Highway 10 causeway. The overpass provided little shade, however … It was early September and still extremely hot. Our skin blistered. My mother's skin is still not fully healed."

Leah Hodges
New Orleans Citizen and Evacuee
Select Committee Hearing, December 6, 2005

Long-standing weaknesses and the magnitude of the disaster overwhelmed FEMA's ability to provide emergency shelter and temporary housing

"Scooter: Please see below. The trailer idea is worse than I originally thought. Per the data below, the last batch of the trailers that we are now purchasing will be coming off the production line in approximately 3.5 years."

E-mail from Neil S. Patel, Staff Secretary to the Vice President, to Charles P. Durkin, Personal Aide to the Vice President, (apparently destined for Chief of Staff J. Lewis "Scooter" Libby, Jr.), September 9, 2005

AP PHOTO/BILL HABER

Summary

Like food and water, shelter is a basic human need. Hurricane Katrina transformed thousands of people's lives into a battle for survival — and, for some, finding adequate shelter proved at least as difficult as finding something to eat or drink.

Katrina, of course, was a powerful storm that hit vulnerable areas, requiring more than traditional solutions for immediate shelter and, later, temporary housing. Louisiana and Mississippi immediately were faced with thousands and thousands of the suddenly homeless, without the ability to provide emergency shelter or longer-term housing for all of them. Within a month, 44 states had played a role in sheltering the evacuees from Hurricanes Katrina and Rita.

But it is clear state and local governments in the areas most affected by the hurricanes were not adequately prepared. They failed to learn important lessons from the Hurricane Pam exercise, and lacked the necessary information about temporary housing. Shelters of last resort, designed for people to take refuge in the immediate hours before and after landfall (such as the Superdome), were not of sufficient capacity. Instead, the Superdome, itself located in a floodplain, had to bear a burden for which it was not prepared. The New Orleans Convention Centre, never planned as a shelter, became one out of sheer necessity and improvisation.

There was no comprehensive database of available shelters, which only complicated relief efforts. There were also delays in getting people out of shelters and into temporary housing. And FEMA's strategy of ordering 200,000 trailers and mobile homes shortly after the storm was blind to the nation's manufacturing capacity of 6,000 units per month.

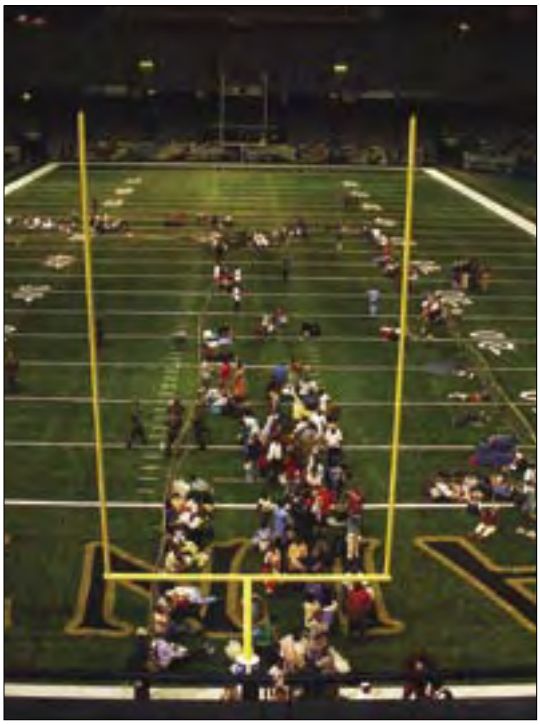
Housing issues remain a tremendous concern for residents of the Gulf coast affected by Hurricane Katrina. Local elected officials in both Louisiana and Mississippi remain disappointed in FEMA's pace in setting up temporary housing. Debate over how long rental assistance will continue rages on. The question of where to build, or re-build, in the Gulf coast is the subject of great debate, both locally and nationally, as is who will pay for it. However, the long-term housing challenges in the Gulf coast are beyond the scope of the Select Committee's inquiry and are not covered in this report. Our charge was to examine the immediate response, not the recovery. We are certain the longer-term issues will continue to be discussed by others in Congress.

Finding: Relocation plans did not adequately provide for shelter. Housing plans were haphazard and inadequate

Shelter needs overwhelmed state and local governments

Initially, Hurricane Katrina displaced more than a million Gulf coast residents. As in most natural disasters, some evacuees only needed short-term shelter and were able to return home after the immediate crisis passed. However, because of the magnitude of the storm, hundreds of thousands remained displaced — for days, weeks, even months. Many are homeless today.

For example, Louisiana had 563 American Red Cross or state emergency shelters with a peak population of 146,292 in the early days following Hurricane Katrina's landfall.[1] Additionally, Louisiana had 10 special needs shelters that housed 2,480 persons.[2] In Mississippi, initial damage estimates projected 120,000 individuals needing emergency temporary housing.[3] A month after the storm, 44 states and the District of Columbia have been given emergency declarations to cover expenses related to sheltering evacuees forced from their homes by Hurricanes Katrina and Rita.[4]


FEMA

In a catastrophic event like Katrina, many evacuees may be displaced for a longer than normal period of time or may permanently lose their housing. As FEMA and state officials learned from the Hurricane Pam exercise, temporary housing was an area of weakness.[5] Deputy FCO Scott Wells noted there were several follow-up items from the Hurricane Pam Exercise that state and local governments failed to execute, including developing more detailed concepts and plans on sheltering and temporary housing.[6] Similarly, Alabama state and local government plans lack information about temporary housing.[7]

Finding: State and local governments made inappropriate selections of shelters of last resort. The lack of a regional database of shelters contributed to an inefficient and ineffective evacuation and sheltering process

The evacuation of millions of people prior to Hurricane Katrina's landfall created an urgent need to identify, and direct people to, suitable shelters. Officials had worried about the high number of people who would ignore hurricane evacuation orders in coastal areas.[8] Indeed, thousands of people in New Orleans did not obey the mandatory evacuation order. Shelters of last resort — places for persons to be protected from the high winds, storm surge, and heavy rains, but with little or no water or food — were needed for those who did not or could not evacuate the area.

A shelter of last resort is intended to provide the best available survival protection for the duration of the hurricane only.[9] In Louisiana, emergency operations plans required shelters of last resort to be located outside of the floodplain, or have the ability to locate on floors elevated above flood potential, and have a hurricane wind resistant structure.[10] The Superdome was used as a shelter of last resort even though it was located in a floodplain. In addition, the Superdome roof suffered extensive wind damage, demonstrating that it was not a hurricane wind resistant structure.

Many residents who took refuge in the Superdome found conditions there unbearable. Some tried to leave, only to find themselves trapped by the floodwaters that surrounded the hulking structure. Cleo Fisher, an 86-year-old resident of Bywater, told a local newspaper that he left the dome to try to get some heart medications.[11] He didn't

Evacuees tend to go to the most convenient and familiar shelter they can find, even though it may be inadequate.

get far — and, in fact, had to be rescued after he fell into the nearby water — but he did not want to return inside, either.[12]

"It's worse than being in prison in there," he said. "They don't have nothing for me."

Even some of the police officers and military personnel charged with keeping order inside the dome became frustrated with the lack of organization.

"This plan," said one police officer, "was no plan."[13]

Although some local emergency plans call for the identification of local shelters, in a multi-state disaster, a compilation of available shelters in the region may be more appropriate. Government officials did not have a comprehensive database from which to identify suitable and available shelters; therefore, identification of alternate shelter locations was done on an ad hoc basis.[14] Because of the lack of a database of shelters, local, state, and federal officials have had a difficult time identifying the numbers and locations of displaced individuals.[15] This lack of information has complicated the relief effort, and led to the inefficient use of shelter resources.

The lack of a comprehensive means for tracking evacuees has exacerbated difficulties in reuniting family members and in determining accurate counts of people

FEMA

so as to more accurately provide for their needs [16] Out of human nature, evacuees tend to go to the most convenient and familiar shelter they can find, even though it may be inadequate. A database could be a helpful resource for planning and providing emergency public information. Similar initiatives have been proposed previously during the Cold War as part of civil defense, such as Crisis Relocation Planning.[17]

Finding: There was inappropriate delay in getting people out of shelters and into temporary housing — delays that officials should have foreseen due to manufacturing limitations

Dr. Gavin Smith told a congressional committee that "[w]ithout the rapid provision of temporary and permanent housing solutions, recovery will be slowed or fail to occur in a manner that meets the needs of disaster victims . . .."[18] Although temporary housing efforts in the wake of Katrina have far exceeded any previous effort, individuals remained in shelters for unacceptably long periods of time. Temporary housing efforts have fallen short of meeting demand. Federal, state, and local agencies failed to implement a successful program to shelter and place many evacuees in temporary housing.

FEMA established a Housing Area Command to oversee all temporary housing operations across Louisiana, Mississippi, and Alabama.[19] Although this group began identifying available land prior to landfall, temporary housing efforts suffered from delays. A Mississippi recovery official hailed FEMA for "the fastest deployment of temporary housing units to a disaster-stricken area since the program was established," but also noted the effort has not been good enough.[20] Specifically, he noted that operational and long-term planning and inter-organizational coordination remains unrealized, and the current approach is not sufficient to address the needs of communities and states following a catastrophic disaster like Hurricane Katrina.[21]

Due to the massive need for temporary housing, the federal government put together a plan that included a combination of old and new housing strategies, including housing people in trailers and on cruise ships.[22]

Housing still falls short of the overwhelming need. There are still delays in getting evacuees into trailers once they are delivered, due to among other things infrastructure, zoning and environmental issues.

Additionally, FEMA used hotels to serve as temporary emergency lodging, utilizing 85,000 rooms nationwide at the program's peak.[23] However, state and local officials complained of poor coordination by FEMA on these temporary housing solutions.[24] Immediately following the storm, FEMA contracted with cruise ships to provide transitional housing for hurricane victims close to the disaster area.[25] Many evacuees rejected this option, something that perhaps could have been avoided if there had been better coordination beforehand. Many individuals felt they needed to focus on finding jobs and obtaining permanent housing.[26]

Although FEMA began strategic housing planning before Katrina's landfall, and the private sector mobilized quickly to fill FEMA's manufactured housing demand, many issues also have plagued the relocation into this form of temporary housing. Mississippi Federal Coordinating Officer (FCO) William Carwile testified that over 24,000 travel trailers and mobile homes had been occupied in Mississippi.[27] FEMA logistics has reported that nine trains a week have been carrying approximately 90 trailers per train into the Gulf region. And, on January 11, 2006, FEMA announced that nearly 62,000 travel trailers and mobile homes were serving as temporary homes for Hurricane Katrina and Rita victims.[28] This number nearly tripled the number of units used following all of last year's Florida hurricanes and far outnumbered any housing mission in FEMA's history.[29]

Despite this commendable effort, housing still falls short of the overwhelming need. There are still delays in getting evacuees into trailers once they are delivered, due to among other things infrastructure, zoning, and environmental issues.[30] In Mississippi, the lack of working utilities for private sites and environmental and zoning issues with group sites have delayed the installation of travel trailers and mobile homes.[31]

FEMA's strategy of ordering 200,000 trailers and mobile homes shortly after the storm was blind to the nation's manufacturing capacity of 6,000 units per month. On Friday, September 9, staff to the Vice President and Office of Management and Budget (OMB) officials ratcheted up concerns about FEMA's decision to rely on trailers and mobile homes to house displaced residents.[32] Special Assistant to the Vice President Marie Fishpaw wrote in an e-mail to Patel:

> FEMA have (sic) set up arrangements to order 200,000 units of trailers (and mobile homes) and committed up to $500 million to do so. They want to get 30,000 units (79% of the existing market) soon. FEMA plans to order another 100,000 units. OMB and OVP staff remain skeptical about this strategy. The nation can produce 6,000 units per month. There is probably some capacity for expansion (possibly by about 10%) to meet increased demand, but we don't know how much. That means most of these units won't be available for months. Further, some states, including Louisiana, are balking at the idea of large (25,000 units, as proposed by FEMA) trailer parks. We got all this info from OMB career staff.[33]

That message was then forwarded, apparently intended for then Chief of Staff to the Vice President, "I Lewis Libby, Jr.: "Please see below. The trailer idea is worse than I originally thought. Per the data below, the last batch of the trailers that we are now purchasing will be coming off the production line in approximately 3.5 years."[34]

Finding: FEMA Failed to Take Advantage of HUD's Expertise in Large-scale Housing Challenges

FEMA has been working in partnership with the U.S. Department of Agriculture (USDA), the Department of Veterans Affairs (VA), and the Department of Housing and Urban Development (HUD) to meet the challenge of finding and securing sufficient rental assets to meet the huge demands created by mass evacuations. By early

STAFF PHOTO

to be eligible for additional rental assistance, use of a voucher system similar to the one administered by HUD could have prevented this mistake.

In this case, FEMA failed to take full advantage of HUD's expertise and perspective on large-scale housing challenges, such as the agency's experience with voucher programs. HUD and public housing authorities have the expertise and infrastructure to help non-HUD clients during disasters.

December 2005, 5,000 displaced families had been placed in federal housing of some sort.[35] USDA has offered units from their own inventory, placing 974 families from Louisiana alone.[36]

Additionally, FEMA has concluded an inter-agency agreement with the VA to rent unused VA housing units to evacuees, and FEMA is pursuing a similar arrangement with Fannie Mae.[37] On September 12, 2005, FEMA signed an Interagency Agreement with HUD.[38] This agreement identified and made available 5,600 HUD single-family homes.[39] Hundreds of disaster victims have made these homes their temporary residences, including 207 families in Texas.[40]

FEMA and HUD have also partnered on the Katrina Disaster Housing Assistance Program (KDHAP), a transitional housing assistance program funded by FEMA and administered by HUD and the network of public housing authorities. Through KDHAP, HUD is providing vouchers to evacuees previously receiving public housing assistance, as well as evacuees who were homeless prior to the hurricane.[41] By December 2005, nearly 15,000 families received rental assistance through KDHAP.[42]

In contrast, FEMA has used direct payments to evacuees to provide rental assistance to more than 500,000 applicants, totaling more than $1.2 billion.[43] Unfortunately, many displaced households received their initial rental assistance before receiving mailed guidance and did not use this assistance for housing, but instead used it to meet other disaster-related needs.[44] Although FEMA has shown flexibility by allowing those individuals

Conclusion

Despite this Herculean effort, state officials feel there has been a lack of coordination within the interagency community causing delay in relocating and housing people.[45] Although the federal government has shown some ingenuity in coming up with unique solutions such as lodging on cruise ships, and orchestrated the largest mobilization of temporary housing units in history, both of these solutions have proven inadequate.

Carwile, the Mississippi FCO, noted the need for taking a new look at housing solutions:

> In Mississippi, while temporary housing has been provided in numbers far exceeding any previous effort, this success is obscured by the overwhelming need and an exceptionally long period of time that people remain in shelters. New methodologies must be examined and implemented to take care of Americans in need of humane housing while in a catastrophic event.[46]

The devastation caused by Hurricane Katrina was heartbreaking enough for the people who lost their homes. Sadly, however, the days and weeks and months that followed provided little relief. The government plans for their shelter were far from adequate. ■

[1] *Hearing on Housing Options in the Aftermath of Hurricanes Katrina and Rita Before the Comm. on Financial Services Subcomm. on Housing and Community Opportunity*, 109th Cong. (Jan. 13-14, 2006) at 3 (written testimony of Scott Wells, Federal Coordinating Officer for LA, FEMA) [hereinafter *Jan. 13-14, 2006 Financial Services Comm. Hearing*].
[2] *Id*.
[3] *Id*. (written testimony of James N. Russo, Federal Coordinating Officer for MS, FEMA) at 3.
[4] FEMA, *2005 Federal Disaster Declarations*, http://www.fema.gov/news/disasters.fema?year=2005 (last visited Jan.12, 2006).
[5] Interviews by Select Comm. Staff with FEMA and Louisiana State officials in New Orleans, LA (Nov. 3-10, 2005).
[6] Interviews by Select Comm. Staff with FEMA officials in New Orleans, LA (Nov. 3-10, 2005).
[7] Alabama Emergency Management Agency, *State of AL Emergency Operations Plan*, Oct. 1, 2000.
[8] Timothy R. Brown, *Miss. Governor Declares State of Emergency as Katrina Nears*, LEDGER-ENQUIRER, Columbus, GA, Aug. 27, 2005.
[9] State of LA Emergency Operations Plan Supplement 1B, *Southwest LA Hurricane Evacuation and Sheltering Plan*, (July 2000) at VI-1.
[10] State of LA Emergency Operations Plan Supplement 1C: *Louisiana Shelter Operations Plan*, (July 2000).
[11] Gordon Russell, *Refuges Find Dome An Intolerable Refuge*, NEW ORLEANS TIMES-PICAYUNE, Sept. 1, 2005, 5.
[12] *Id*.
[13] *Id*.
[14] *DHS HSOC SPOT Report prepared by Matthew Thompson, NRCC* (Aug. 31, 2005).
[15] Jan Moller, *La. seeks help compiling evacuee shelter database*, NEW ORLEANS TIMES-PICAYUNE, Sept. 10, 2005, A-7.
[16] Shankar Vedantam and Dean Starkman, *Lack of Cohesion Bedevils Recovery*, WASHINGTON POST, Sept. 18, 2005, A01.
[17] B. Wayne Blanchard, FEMA, *American Civil Defense 1945-1984: The Evolution of Programs and Policies*, (National Emergency Center Monograph Series Vol. 2, No. 2, 1985) at 19-20.
[18] *Jan. 13-14, 2006 Financial Services Comm. Hearing* (written testimony of Dr. Gavin Smith, Director, Office of Recovery and Renewal, Office of Gov. Barbour) at 2.
[19] FEMA News Release, *FEMA Contracts to Provide Housing Relief for Displaced Hurricane Victims*, Sept. 8, 2005.
[20] *Jan. 13-14, 2006 Financial Services Comm. Hearing* (written testimony of Gavin Smith) at 1.
[21] *Id*.
[22] Rick Weiss, *Victims' Next Homes: Cruise Ships, Trailers*, WASHINGTON POST, Sept. 5, 2005, A15.
[23] *Jan. 13-14, 2006 Financial Services Comm. Hearing* (written testimony of Scott Wells) at 4.
[24] Audio recordings of Hurricane Katrina Conference Calls, LA State Emergency Operations Center (Aug. 26-28, 2005, Sept. 9, 2005).
[25] FEMA, News Release, *Temporary Housing for Hurricane Katrina Evacuees Includes Cruise Ships, FEMA Reports*, Sept. 4, 2005.
[26] Shankar Vedantam and Dean Starkman, *Lack of Cohesion Bedevils Recovery*, WASHINGTON POST, Sept. 18, 2005.
[27] *Hearing on Hurricane Katrina: Preparedness and Response by the State of Mississippi Before Select Comm.*, 109th Cong. (Dec. 7, 2005) at 8 (written testimony of William L. Carwile, III, former Federal Coordinating Officer, Hurricane Katrina Response and Initial Recovery Operations: MS).
[28] FEMA, *By the Numbers: FEMA Recovery Update for Hurricanes Katrina & Rita*, Jan. 11, 2006.
[29] *Id*.
[30] *Interview by Select Comm. Staff with Gary Moore, Director of Logistics, FEMA, in Washington, DC (Jan. 9, 2006)*.
[31] *Jan.13-14, 2006 Financial Services Comm. Hearing* (written testimony of James N. Russo) at 7.
[32] *See* Aimee Curl, *Federal-Local Conflicts Keep Victims Out of FEMA Trailers*, FEDERAL TIMES, Jan. 16, 2006.
[33] E-mail correspondence from Marie Fishpaw, Special Assistant to the Vice President, to Neil Patel, Staff Secretary to the Vice President, (Sept. 9, 2005) (1:41 p.m.).
[34] E-mail correspondence from Neil Patel to Charles Durkin, (Sept. 9, 2005) (1:49 p.m.)
[35] *Hearing on Housing Options in the Aftermath of Hurricanes Katrina and Rita Before the Comm. on Financial Services Subcomm. on Housing and Community Opportunity*, 109th Cong. (Dec. 8, 2005) at 12 (written testimony of David Garratt, Acting Director, Recovery Division, EMA) [hereinafter *Dec. 8, 2005 Financial Services Comm. Hearing*].
[36] *Id*. at 12.
[37] *Id*.
[38] *Id*. (written testimony of Brian Montgomery, Assistant Secretary for Office of Housing/Federal Housing Commissioner, HUD) at 4.
[39] *Id*.
[40] *Id*. (written testimony of David Garratt) at 13.
[41] *Id*. at 13-14.
[42] *Id*. (written testimony of Brian Montgomery) at 6.
[43] *Id*. (written testimony of David Garratt) at 6.
[44] *Id*. at 6-7.
[45] *Jan.13-14, 2006 Financial Services Comm. Hearing* (written testimony of Gavin Smith) at 1.
[46] *Hearing on Hurricane Katrina: Perspectives of FEMA's Operational Professionals, Before the Senate Committee on Homeland Security and Governmental Affairs,* 109th Cong. (Dec. 8, 2005) at 37 (testimony of William L. Carwile, III, former Federal Coordinating Officer, Hurricane Katrina Response and Initial Recovery Operations: MS).

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"[O]ne of the lessons that we need to learn from this catastrophic event is that we do need to get better about marshaling those assets and moving them around. I will tell you up front, FEMA has a logistics problem, we have a problem understanding all the time. I can point out where our stuff is and I can point out where it's supposed to go to; I can't always tell you that it actually got there."

Michael D. Brown
Former FEMA Director
Select Committee Hearing, September 27, 2005

FEMA logistics and contracting systems did not support a targeted, massive, and sustained provision of commodities

Katrina overwhelmed the Federal Emergency Management Agency (FEMA) management and overloaded its logistics system. Response and relief personnel had little visibility into available federal assets and resources. The process for requesting assistance could not support the volume of requests, and the technology supporting that process proved inadequate. Federal, state, and local officials requested assistance outside existing channels with little coordination and communication. "[M]anagement by crisis would be the best way I could put it," said Kip Holden, Mayor of East Baton Rouge Parish.[1]

By September 9, Congress had passed legislation providing over $63 billion to the Department of Homeland Security (DHS) for disaster relief.[2] The circumstances and urgent needs created by Hurricane Katrina provided significant opportunity for fraud and mismanagement, and the DHS Office of Inspector General (OIG) estimates the cost to recover from the storm and rebuild the affected areas could exceed $200 billion.[3]

As of November 30, 2005, $19.3 billion has been obligated to needs resulting from Hurricane Katrina.[4] The funds have been used to relieve the immediate suffering of individuals and families, clear debris, reimburse federal agencies for the costs of technical and direct assistance, and support federal operations such as search and rescue, and delivery of consumables. The $19 billion has been obligated as follows:

- $8 billion for human service needs including unemployment compensation, personal needs that are not met by insurance, and temporary housing (including vouchers for hotel/motel rooms and mobile homes);
- $2.2 billion for debris removal, public building repair and replacement, and damage inspections;
- $4.4 billion for technical and direct assistance provided by federal agencies;
- $14.7 million for inspections and hazard mitigation; and,
- $4.7 billion for administrative expenses, almost $3 billion of which has been obligated for mission assignment operations undertaken by other federal agencies at the direction of the federal officer responsible for coordinating response activities.[5]

Despite this outpouring of funds, procurement officials struggled to balance the competing and conflicting demands of local and elected officials. On October 21, New Orleans Mayor Ray Nagin complained about the time-consuming amount of federal oversight accompanying the federal dollars going to contracts and local governments. He said

> [t]he money is sitting in the doggone bank. . . . We can't use it, and as soon as they gave us the money, they sent a team of auditors and said, 'If you spend this money, we'll be watching you real close. . . .' So we're gun shy about how we use this money . . . .[6]

and

> [w]e just got these huge multinational companies that are using the shield of, 'We've got to work quick,' [rather than] trying to find local contractors.[7]

The Government Accountability Office (GAO) is undertaking a review of Katrina relief contracting

"[Hurricane Katrina] was beyond the capacity of the state and local governments, and it was beyond the capacity of FEMA. It was the largest natural disaster ever to strike the United States — 92,000 square miles. Logistics were falling apart."

FEMA

activities. GAO's review includes acquisition planning, communication of responsibilities between various entities, contract management, and the use of emergency acquisition authorities. GAO briefed the Select Commitee on their review efforts, which will complement the findings of this report.

Finding: FEMA management lacked situational awareness of existing requirements and of resources in the supply chain. An overwhelmed logistics system made it challenging to get supplies, equipment, and personnel where and when needed

When President Bush authorized a federal emergency declaration for Mississippi and Alabama on Sunday, August 28, in response to these states' requests, then-FEMA Director Michael Brown said he began to "predeploy all the assets [including] the medical teams, the urban search and rescue teams, the emergency response, the management teams, the rapid needs assessment teams, prepositioning the water, the Meals Ready to Eat, the ice, the tarps."[8] However, given that landfall occurred on Monday, August 29, this was too late to begin the pre-deployment process.

FEMA leadership acknowledged this lack of planning. "[Hurricane Katrina] was beyond the capacity of the state and local governments, and it was beyond the capacity of FEMA," said Brown. "It was the largest natural disaster ever to strike the United States — 92,000 square miles. Logistics were falling apart."[9] When FEMA did arrive, representatives sometimes were empty-handed. "[W]hen FEMA finally did show up, everybody was angry because that is all they had was a Web site and a flier. They didn't have any real resources that they could give," reported Senator Pryor following visits and conversations with victims.[10]

Brown's testimony outlined some of the resources FEMA had in place. Prior to landfall FEMA had 14 trailer loads of Meals Ready to Eat ("MREs") at Camp Beauregard, Louisiana, four trailers in Moffit, 42 in Forth Worth, 15 trailer loads in Fullersville, 75 at two locations in Atlanta, three in Cumberland, Maryland, 15 in Charlotte, North Carolina, six in Eastover, South Carolina, 46 in Palmetto, Georgia, 15 in Homestead, Florida, at the airbase, 10 in Meridian, and two at the Superdome.[11]

Some suggested these resources should have been more readily available. Rep. Chip Pickering said "[most MREs] were [prepositioned] across the region, only a few in Meridian and a few in New Orleans, and that should have been closer, I think, to the storm."[12] Rep. Gene Taylor pointed out the provisions were too far away from the FEMA team, questioning

> [w]hat part of the FEMA plan envisioned that the first responders in Hancock County and in much of the Mississippi Gulf Coast would have to loot the local grocery store and loot the local Wal-Mart in order to feed themselves, would have to loot the local Wal-Mart in order to have a change of clothes? What part of your plan was that?[13]

Brown, however, strongly rejected the contention of having relief items in the immediate impacted areas, saying expectations must be realistic:

> [T]he last thing I'm going to do is to put equipment or manpower in place where they themselves become victims and then cannot assist the people they are there to assist. You cannot, you cannot physically — I don't think you can do it statutorily or any other way — say to any victim in this country that the minute you come out of your

abode, your home, your shelter, whatever it is, that the Federal Government is going to be there with a meal ready to eat for you. That is an unreasonable expectation. So what we do is we preposition those supplies so that we can move them in and help them. And that's why the FEMA plan, that's why the basic emergency management system says you should, as an individual, take personal responsibility and be prepared to be on your own for perhaps up to 2 or 3 days. If Congress expects the Federal Government to be able to supply every individual food and water immediately following a catastrophe or a disaster, then this committee in Congress needs to have a serious public policy debate about what the role of FEMA and the Federal Government is in disasters.[14]

According to the Director of the Mississippi Emergency Management Agency (MEMA), Robert Latham, the federal logistics system failed in the days immediately following Hurricane Katrina, leaving state officials without adequate supplies of food, water, and ice for emergency shelters.[15] FEMA representatives working with MEMA requested 450 trucks of water and ice, and 50 trucks of MREs. When less than 15 percent of the requested supplies arrived, state emergency responders were forced to purchase the commodities on the commercial market or obtain supplies from neighboring states.[16]

Mississippi officials had to deal with shortages of commodities for the first nine to ten days after landfall.[17] Fortunately, Mississippi officials had purchased supplies for Hurricane Dennis (July 2005) that were not used. Similarly, Florida officials had pre-positioned considerable resources to be used in the Florida Panhandle,[18] which, until Friday, August 26, was where Katrina was projected to make landfall. Commodities were provided by Governor Bush to Mississippi Governor Haley Barbour under the Emergency Management Assistance Compact (EMAC) and offered some relief to the victims in Mississippi's coastal counties.[19]

FEMA

FEMA has a logistics problem, we have a problem understanding all the time. I can point out where our stuff is and I can point out where it's supposed to go to; I can't always tell you that it actually got there.

Federal Coordinating Officer (FCO) Bill Carwile speculated the shortages were the result of an overly centralized logistics system overwhelmed by the requirements of the three large disasters: Hurricanes Dennis, Katrina, and Rita. Mississippi officials asked permission to purchase (on their own) commodities from elsewhere to supplement those being provided by the centralized system. Carwile said he was authorized by FEMA Director Michael Brown to make these purchases.[20]

According to the Director of the Alabama Emergency Management Agency (AEMA), Bruce Baughman, a better contracting process for essentials and commodities is needed.[21] In the days before Katrina made landfall, when officials submitted commodity requirements for Alabama for items such as water, ice, MREs, these requests were unilaterally reduced by FEMA officials – often so reflexively that it appeared to be part of standard FEMA procedure. Baughman said their initial requests were carefully and precisely tailored to meet the actual needs of Alabama. Tim Payne, AEMA Branch Chief and Emergency Management Program Coordinator, said in advance of Katrina, their needs assessment concluded Alabama would require 100 trucks of water and 100 trucks of ice.[22] In response to this request, FEMA made available only 17 trucks of water and 16 trucks of ice.

Frequently during the Alabama response to Katrina, FEMA did not follow through with AEMA's requests for supplies and emergency support.[23] It appeared FEMA did not have the ability to track commodities within its own logistics system. To defend against commodity shortfalls in future emergencies, Alabama recently issued a Request for Proposals for key commodities and materials needed for an effective emergency response.[24] Baughman suggested having standing contracts in place and supplies

FEMA's logistics program is broken and needs to be fixed.

FEMA

at the ready so the states would not again fall victim to an inadequate FEMA response or supply shortages due to other market competitors in times of crisis.[25] Payne identified 12 categories of items that need to be on hand to effectively deal with an emergency.[26]

According to Brown, "one of the lessons that we need to learn from this catastrophic event is that we do need to get better about marshaling those assets and moving them around. I will tell you up front, FEMA has a logistics problem, we have a problem understanding all the time. I can point out where our stuff is and I can point out where it's supposed to go to; I can't always tell you that it actually got there."[27]

These problems are not new, however. FEMA's "bureaucratic slowness" in securing long-term housing and loans, removing debris, and getting basic assistance and reimbursement were "'huge problems that have been very frustrating," stated Florida Governor Jeb Bush before the House Homeland Security Committee.[28] Getting one truckload of ice from Atlanta to Florida in 2004 took a series of separate contracts that caused needless delays. "'FEMA's logistics program is broken and needs to be fixed. . . . I can say with certainty that federalizing emergency response to catastrophic events would be a disaster as bad as Hurricane Katrina," Governor Jeb Bush testified. "If you federalize, all the innovation, creativity and knowledge at the local level would subside.'"[29]

It should be noted FEMA used existing resources, procedures, and staff to organize and conduct a massive civil logistics operation beyond any this country has seen before. Over 11,000 trucks of water, ice, and meals were moved into the disaster region during the month after landfall. This is more than three times the number of trucks used during all hurricanes in 2004.[30] FEMA tried, but Katrina's magnitude exposed significant weakness and inefficiencies in the process.

Finding: Procedures for requesting federal assistance raised numerous concerns

Requests for federal assistance go through a standard process. Local government officials submit their requests to the state, and, if state officials cannot meet the request, they forward appropriate requests to federal officials.[31] In Louisiana, state and local emergency management officials manage requests for assistance during disasters using specially-designed commercial software called "E-Team."[32] E-Team is a web-based system and can be accessed from any computer with internet connectivity. According to Matt Farlow of Louisiana Office of Homeland Security and Emergency Preparedness (LOHSEP) Information Technology Division, Louisiana has used E-Team since 2000 and LOHSEP personnel are well-experienced in its use.[33] In addition to using E-Team to register and track parish requests, the Louisiana Emergency Operations Center (EOC) also uses it to send out e-mail alerts and notifications to parishes.

The parish-to-state process is much the same as the state-to-federal process. The parishes declare emergencies and request assistance from the state.[34] The parishes register their requests for assistance with the state directly via the internet with E-Team. However, according to state officials, not all parish officials know how to use E-Team well: "They don't know all the bells and whistles."[35] Parish officials can also register requests to the state by telephone or radio. If the parish communicates a request outside E-Team, by voice, e-mail, or fax communications, then the state EOC officials enter that request into E-Team.

The state receives the parish requests for assistance and determines whether the requests can be met from a nearby parish or with state resources.[36] If so, LOHSEP tasks that mission to another state agency. The state can also request assistance from nearby states through the EMAC.[37] When a state makes an EMAC request to another state, it is undertaking an obligation to pay that state for that assistance.[38] FEMA has a mechanism to later reimburse appropriate costs to the requesting state, which the state can use to repay the sending state. Finally, if the state cannot meet the request from its own or other state resources, the state can prioritize the various requests and pass them on to

FEMA officials. The state is supposed to make such requests after it has already reviewed its own capabilities.

FEMA officials determine whether to accept or reject the state request.[39] This determination is documented. A request might be rejected for a number of reasons, such as not being appropriate, a state getting the resources from elsewhere, or a state canceling a request while FEMA officials are considering it. In some cases, a state request might be made verbally to expedite assistance, but FEMA officials expect the paperwork to soon follow. The paperwork from the state certifies that the state will pay its share of the requested assistance.

Once FEMA accepts the request and agrees to meet it, officials use a system called NEMIS (National Emergency Management Information System).[40] FEMA does not use E-Team. NEMIS is used by FEMA officials to track the request within the federal government and all requests FEMA officials accept are entered into this system. FEMA can meet the request from its own resources and capabilities, from other federal agencies, or from private contractors. If FEMA officials task another federal agency with the request, that is known as a "Mission Assignment" (or MA), whereby the task is assigned to the other agency.

Mission Assignments to another federal agency could also be passed on to a private contractor. This is done because some agencies have more expertise and experience in contracting for certain types of items. For example, the U.S. Army Corps of Engineers (USACE) contracts for debris removal.[41] Some federal agencies, including FEMA, have pre-existing contracts that can be modified quickly to add additional items. NEMIS is used to track the request and completion of the mission, as well as to track spending and reimbursement later by FEMA officials.[42]

AP PHOTO/MORRY GESH

In Louisiana there was widespread confusion about the process for obtaining federal assistance. In addition, the catastrophic nature of the disaster overwhelmed the existing procedures and systems

Louisiana state and parish officials said degraded communications and the effective loss of parish E-Team software forced them to deviate from normal procedures for requesting federal assistance.[43] These problems also made it difficult for the state EOC to check on the status of specific tasks assigned to state agencies. State officials complained about FEMA's non-automated process that made tracking status difficult. State officials also noted they had included FEMA on their E-Team license, but during Katrina the FEMA staff assigned to the EOC were not familiar with the E-Team system. This had not been the case in earlier hurricanes, when FEMA staff assigned to the EOC knew how to use E-Team.[44] State officials also complained about weaknesses in tracking the transportation and estimating arrival of FEMA-contracted commodities. FEMA officials have acknowledged these weaknesses.[45] Further, state officials said the federal government contributed to the problem when other federal agencies tasked FEMA directly rather than having requests go from parish to state to FEMA and then onto appropriate federal agencies.[46] According to Governor Blanco's chief of staff, Andy Kopplin, the governor had to go beyond the normal LOHSEP and FEMA process because these processes were too bureaucratic and impracticable.[47]

Parish officials were universally critical of FEMA for providing relief commodities late.[48] There were clearly misunderstandings of what constituted an official request for assistance. The Jefferson Parish Emergency Manager, Walter Maestri, said he directly communicated his needs before landfall in a conference call to the EOC, where FEMA personnel were present.[49] In his view, this constituted a request for assistance. However, both the State Coordinating Officer (SCO) and the FCO said while the purpose of these conference calls was to share information, they were not considered valid ways for a parish to make a request.[50]

New Orleans Director of Homeland Security, Col. Terry Ebbert, also said the existing systems for requesting assistance does not work during a catastrophic disaster.[51] The system assumes the parish knows what it wants,

New Orleans Director of Homeland Security, Terry Ebbert, was "shocked" to hear FEMA Director Michael Brown say the local parishes never got FEMA commodities because they never asked for them. In his opinion, FEMA officials should have known what was needed from their own experience.

the state knows what it wants, and both have the communications capabilities to make requests of FEMA. Ebbert said the current system is a "pull" system in which parishes must make requests to pull an item from the state and federal government. However, the parishes were too overwhelmed and their communications were too degraded to allow this to work. In a catastrophic disaster, FEMA needs a "push" system in which FEMA officials anticipate needs (e.g., for food, water, medical supplies, ice, tarps, generators) and push the commodities to the parishes without receiving the request. Under such disaster circumstances, it would be better to have too much of something than too little; the excess items can always be shipped elsewhere or stored for the next disaster.[52]

As such, Ebbert was "shocked" to hear FEMA Director Michael Brown say the local parishes never got FEMA commodities because they never asked for them.[53] In his opinion, FEMA officials should have known what was needed from their own experience. Similarly, Governor Blanco's chief of staff, Andy Kopplin, said the state had to go beyond both LOHSEP's and FEMA's bureaucratic processes for requesting and providing assistance.[54]

However, parish officials also acknowledged their emergency managers were overwhelmed. Plaquemines Parish Sheriff Jiff Hingle said his parish emergency manager was completely overwhelmed and unable to cope with the situation.[55] Hingle found he and the parish president had to make all requests for assistance through other channels because the normal system was not functional.

FEMA officials Scott Wells and Tony Robinson put much of the blame on the state, saying the standard request for assistance process was not working because the state was incapable of analyzing and prioritizing requests.[56] Wells and Robinson said many of the requests from parishes came up through channels to the EOC, but state officials appeared "overwhelmed" and they "lost control." The EOC did not attempt to prioritize such requests, did not try to figure out if the requests could be met from state resources, and did not go through EMAC channels to see if other nearby states could provide the assistance. The EOC just passed the unfiltered requests on to FEMA officials. Wells said the FCO staff did a quick analysis of parish E-Team requests the EOC was passing on unfiltered to FEMA, and found many inappropriate items, such as writing tablets. According to Wells, these requests were inappropriate because the state should not be relying on FEMA for basic items that are otherwise easily obtainable.

Parishes were frustrated by the degraded communications and their desperate need for assistance. Robinson said while the parishes were still able to communicate requests to the EOC (via radio or other means), they were not able to use E-Team.[57] The EOC was not systematically entering the requests into E-Team, so the state could not track or check the status later, which led to many parishes becoming frustrated. The parishes probably blamed FEMA officials for any delays in getting assistance because they had communicated their requests and assumed the EOC had duly registered these requests and passed them on to FEMA officials. Many of the highly publicized parish requests for commodities such as for food and water assistance may have never even reached FEMA officials.

Some confusion arose because states and not the parishes are supposed to make requests to FEMA.[58] It was Louisiana's responsibility to take these parish requests, combine them with similar requests, determine whether the state could meet them, prioritize them, and, if appropriate, make requests to FEMA. That process, where the state enters the request into its E-Team system, allowing formal registry and tracking of status and completion, is the only way to provide an orderly processing of requests. Using verbal requests, without documenting them in a formal process, leads to chaos, particularly in a large disaster where there are hundreds

or thousands of local requests for assistance. If the parish is unable to use E-Team because of communications or power difficulties, the state EOC (which, in fact, retained power during the hurricane and its aftermath) could have still entered them into E-Team. Then the state should perform its review, and, if appropriate, pass the request on to FEMA. It was the state's job, not FEMA's, to take down any parish requests from conference calls and enter them into the system. FEMA officials saw these conference calls serving the function of information sharing and situational awareness, not substitutes for the parish-to-state and state-to-federal formal request process.

Interoperability between state and federal automated systems

FEMA FCO staff said there is no automatic or electronic interface between state systems (such as E-Team) and the FEMA system (NEMIS).[59] Both systems, if used correctly, have independent capabilities to track requests for assistance and determine their status. The two systems meet in the EOC, where the E-Team requests are converted into NEMIS. However, there is no way for the state EOC officials to use E-Team to track the status of their request in NEMIS, nor any way for the federal FCO officials to use NEMIS to check information on the E-Team requests originating at the local level.

According to FEMA officials involved in the response to Hurricane Katrina, the breakdown of a unified command structure at the state EOC level hampered FEMA's ability to meet state and local requests for commodities.[60] Without a unified command, some state and local officials began submitting commodity requests outside FEMA's normal logistics channels. FEMA, in turn, started fulfilling such requests on an "ad-hoc" basis before these requests were properly authorized or logged into its logistics system.[61] When supply requests and subsequent supply distributions were not logged, FEMA could not accurately keep track of the resources it staged at regional facilities.[62] As a result, supplies and equipment were delivered not according to specifications, delivered late, or not delivered at all, and priority needs were not met.

In his testimony before the Select Committee, Brown acknowledged these logistical problems and the need for a better tracking system. He said if

> [y]ou don't have a unified command, [you] kind of go into an ad hoc mode. So we hear that, for example, County X is requesting five truckloads of Meals Ready to Eat, so we will then figure out that, okay, we have got four available, so we are just going to ship four into that county . . . .[63]

Then, "[another county] may send in a legitimate request for five trailer loads [and] you think they are still there because no one has yet entered in the [trailers] that have gone out."[64]

FEMA

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Management lapse

According to Holden, lack of "knowledge and understanding by many agencies paralyzed the efforts" to provide an orderly and efficient response, and required paperwork also "hindered immediate action and deployment of people and materials to assist in rescue and recovery efforts."[65] Pre-positioned federal assets critical to the operations of hospitals were never received. Resources from the Strategic National Stockpile, despite requests, were never locally deployed due to bureaucratic red tape.[66]

According to Carwile, "[i]n any operation, particularly in a chaotic environment, there needs to be a balance between 'going outside the system' and following a plan and a procedure."[67] Carwile suggested "there needs to be a well-disciplined, systematic approach based on a solid plan that is sufficiently flexible for a variety of situations. Experienced personnel know where the pitfalls are and can make decisions where flexibility is required. Doctrine, policies, training, and exercises should be developed that meet the needs of a trained and ready workforce."[68]

FEMA

Even Brown experienced bureaucratic frustrations. Rather than have FEMA's food provision efforts oriented almost exclusively toward securing MREs, Brown sought to devise an arrangement in which distributors or retailers would deliver meals or groceries, like those that would ordinarily be conveyed to typical commercial outlets, directly to shelters. Brown testified he came to believe

> we were too focused on meals ready to eat. The issue was food, not the MREs. So we came up with what we thought was this brilliant idea that we would utilize Wal-Mart or some grocery distribution system because they are accustomed to going to these 7-Elevens, [and other] convenience stores, to replenish them all the time . . . .[69]

Brown said FEMA started "trying to do a contract to do that very thing [but] ran into a bureaucratic wall [so much that] I finally had to scream at some people on the phone, ['']just make it happen, I don't care, just do the contract and make it happen.['']"[70]

According to Carwile, over the past four years, there has been no operational doctrine developed by FEMA. He said, as a consequence

> [t]here is no clear understanding of the responsibilities of each level (Washington, the Regions, and deployed Emergency Response Teams) and how they are to interact. This lack of operational doctrine results in unacceptable levels of overlap, double and triple ordering of resources, and long video teleconferences and conference calls [which can] disrupt field operations."[71]

Carwile believes "well-understood and defined operational methodologies based on doctrine would minimize the need for lengthy conferences and would achieve other efficiencies."[72]

Alabama officials said FEMA officials lacked management skills.[73] Nobody with FEMA seemed to know what assets existed and how to marshal them, they said. FEMA does not have a robust lessons learned/after action program to assist in the refining and reorganizing of processes. Instead, FEMA seemed to move from one emergency to the next without incorporating any formal reviews.

Alabama officials recommended FEMA adapt its training requirements to allow states to use monies targeted for state training exercises for after-action reviews of actual emergency-related operations.[74] One official echoed the thoughts of many AEMA personnel when he said the state was better prepared for Katrina by virtue of its experiences with previous hurricanes within the last year, notably Dennis (July 2005) and Ivan (September 2004).[75]

Carwile suggested the logistics supply system was overly centralized and recommended allowing the state to contract with private entities to provide logistical support and commodities distribution services, with the federal share of costs reimbursed by FEMA.[76]

Select Committee Members stated and Brown agreed FEMA should develop a formal planning and logistics process similar to that developed by the Department of Defense (DOD).[77] Some officials have suggested the DOD simply assume a larger role in logistics, or even take control outright.[78] Although recognizing the value of DOD assistance, Brown indicated DOD involvement would not be appropriate for smaller events. "I think that the Army can help FEMA in that regard," Brown said. "I would rather see it remain within FEMA because logistics is something that you need in every disaster, the smallest one that FEMA might be involved in to the largest; and I don't want to see us utilize the military in all of those."[79]

However, According to Carwile

> [t]he factors contributing to the slow delivery of commodities should be examined and addressed for future disasters. Possible solutions [include] much better planning between State and Federal emergency management logisticians and operations personnel, the assistance and advice of DOD strategic logistics planners, and much more robust private sector partnerships, e.g., the US Army LOGCAP or USAF AFCAP programs. It is also possible for states to enter into their own contractual agreements with the private sector for procurement and delivery of response commodities. The federal share is reimbursable by FEMA and Florida routinely enters into such agreements.[80]

Rep. Bill Shuster pointed out the private sector provides the best relief model and, while government agencies such as the DOD are excellent with logistics, "[s]ome of our private companies . . . are even better and our military learns from [these companies because they] know exactly what's in a truck. They know exactly where it's moving."[81]

For their part, private sector firms expressed the need for a get-it-done-and-ask-questions-later mentality. The director of Business Continuity Global Security for Wal-Mart said "[f]lexibility in our plans, flexibility in our structure, and flexibility of our Associates is paramount to success."[82] Southern Company's plans provide "for flexible and decentralized authority to make decisions as close as possible to the disaster."[83] They demonstrated creativity in helping restore fuel service to Chevron pumps, in helping expand their communications system to assist other companies, and in the way they used their "family services plan" to provide emergency services to employees.[84]

Starwood hotels worked to engineer a way to pump water into the hotels, knowing the city's water system wouldn't be up and running for some time.[85] They also contracted at the last minute for security to protect their hotels from looting. IBM provided services to governmental and non-governmental organizations as needed on the ground.[86] These services ranged from temporary housing to websites and missing persons registries including the CNN Safe List, which it hosted.[87]

FEMA's Information Technology Systems are unable to support large-scale logistical challenges

The technology used to manage FEMA's logistics system may be partly to blame. FEMA's Logistics Information Management System III (LIMS III) is used to manage the agency's inventory of equipment and supplies.[88] A recent DHS OIG report found FEMA's computers were overwhelmed during the 2004 hurricane season, which hindered disaster-recovery efforts, delayed emergency supply shipments, and put emergency-response personnel at risk.[89] The report found during August and September 2004, when four hurricanes struck Florida, the IT system could not track essential commodities such as ice, water, and tents.[90]

According to the report, LIMS III is not integrated with other FEMA IT systems such as the database used to identify and deploy personnel to disaster sites.[91] Nor can it share information across federal, state, and local agencies. LIMS III was designed, however, to track "accountable property" such as bar-coded cellular phones and pagers, not "bulk commodities."[92] Although LIMS III contains information on the quantity and location of emergency supplies, it does not indicate when they will be shipped or when they should arrive.[93] In Florida, emergency personnel tracked items on spreadsheets and spent hours calling trucking companies to determine the status of goods in transit.[94]

Brown received this DHS report several weeks before Hurricane Katrina, but he and FEMA Chief Information Officer Barry West rejected the OIG's findings, calling the report's characterizations "inaccurate."[95] According to a FEMA spokesperson, "[FEMA's] [l]ogistics-support systems

have presented us with some concerns over the past 18 months, and we are addressing this."[96]

During Katrina relief efforts, FEMA tested a system using global-positioning technology to track trucks transporting commodities.[97] FEMA also is installing an intranet-based electronic document system to replace paper documents and improve data sharing among agency officials via an intranet.

The DHS Emergency Preparedness and Response Directorate, which FEMA was part of, established an enterprise architecture office in 2003 and hired a chief enterprise architect in 2004 to develop a system to tie in the directorate's system with the rest of DHS.[98] Of the Katrina federal aid package, $4.6 billion is designated for FEMA logistics, search and rescue, and emergency supplies.[99]

Private sector fills void

Several tractor-trailers were strategically located throughout the region by various officials and organizations to collect local contributions, which were then sent to a warehouse for collection and distribution.[100] When the first of 14 packed trailer loads arrived, volunteers unloaded the first two and quickly realized much more assistance was needed to efficiently process the donations and prepare them for distribution.[101] A clear plan for the organized collection, sorting, storing and distributing of such a large volume of goods was not in place, however.

FEMA

Local officials turned to the private sector. "Once we started seeing that we were going to have this enormous influx of material, we knew that there was no one better in the world for distribution and collection than Wal-Mart Corporation. So we made some calls. And they immediately sent down some folks. And they showed us how to arrange a warehouse and they made it spin like a top," according to the Mayor of Fayetteville, Arkansas, Dan Coody.[102]

Several companies had existing disaster plans which eased the challenges they faced. Southern Company has a separate plan for each category of hurricane, and each year they conduct a major disaster simulation.[103] Before the storm hit, Southern Company had already pre-positioned trailers, caterers, laundry facilities, and 11,000 people for their response. Starwood developed a crisis management plan which "structures preparedness and response at the Corporate, Division, and Hotel levels" and defines responsibilities for each level of employee.[104] Wal-Mart keeps an Emergency Operating Center up and running 24 hours a day, every day of the year.[105] As one IBM executive noted "[a]dvanced planning of people, tools, and technology . . . is vital and important."[106] IBM had its Crisis Response Team on the ground four days in advance of Katrina, which worked with FEMA, the states, and private entities, providing a list of the services they could provide.

Ad Hoc response

In Fayetteville, Arkansas, individuals who had traveled there to stay with family or friends began to stop by the distribution center "in search of financial aid, food, clothes and other assistance," recalled Coody.[107] Officials had not anticipated receiving evacuees at the distribution center and were not sure how to respond. They had heard stories of survivors being bounced from place to place or from town to town, so they took it upon themselves to find answers, information, and assistance for everyone who needed it.

Officials and volunteers pulled boxes off pallets and made food and clothes available to these displaced individuals.[108] They moved all relief agencies into the distribution center offices to make a one-stop location where evacuees could get various types of assistance and support, and set up a "store" where people could shop for what they needed, free of charge.[109]

In addition, relief supplies were shipped from the Fayetteville distribution facility to the Salvation Army staging warehouse in Corsicana, Texas.[110] It was eventually

destined to aid the stricken areas of Louisiana and Mississippi. Many of these shipments were sponsored by local businesses and churches and were arranged by making direct contact with community members in the affected areas. Fayetteville officials also learned many rural areas were not receiving adequate support and were still in desperate need of various items that were in stock. This spurred officials to focus their large-scale distribution efforts on rural Louisiana.

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Coody testified while Fayetteville had food, water, wheelchairs, baby supplies and many other items on pallets and ready to go, communicating and coordinating the movement of supplies to these areas was a challenge.[111] He said the distribution center had not received "any communications from the State or Federal level about the needs in these areas."[112]

Although Fayetteville officials wanted to send goods where they were needed, arranging transportation also proved to be a problem. Nonetheless, Coody recounted some success in arranging deliveries including that they

> asked J.B. Hunt and other trucking firms, ['c]an you please donate your time and some drivers to load up this trailer that we have . . . ready to go and take it to a particular town in Louisiana?['] " And they said, [']sure['], ...[113]

In another instance, Bogalusa, Mississippi had requested water and baby food from Fayetteville. Coincidentally, a truck arrived from Kansas City, and the driver announced, "I have got a load of baby food and water and I am [being] told to get off the road because I am overloaded."[114] The mayor said

> [as soon as] we saw what we had, we gave him a map and we said, ['t]his is where you need to go,['] and we sent [the items] on their way. As they pulled into Bogalusa and off-loaded food [—] baby food, adult food [—] and everything else, people started opening packages and eating food directly off the truck because they had not had any food in three days.[115]

Coody reported the realization that Fayetteville had the necessary supplies in stock previously but had "no knowledge" or "no real infrastructure to get it there" was disturbing, and "it broke our hearts."[116]

Finding: The failure at all levels to enter into advance contracts led to chaos and the potential for waste and fraud as acquisitions were made in haste

Concerns have been raised with respect to how FEMA awarded its contracts in the immediate aftermath of Hurricane Katrina and regarding the contract vehicles it had in place before landfall.[117] In the weeks following Katrina, more than 80 percent of FEMA's $1.5 billion in contracts were awarded on a sole-source basis or pursuant to limited competition.[118] Many of the contracts awarded were incomplete and included open-ended or vague terms. In addition, numerous news reports have questioned the terms of disaster relief agreements made in such haste. Questions have also been raised about USACE's awarding of contracts with limited competition for debris removal and clean up.[119]

In the face of the massive destruction caused by Katrina, acquisition personnel acted to meet pressing humanitarian needs, contacting firms in an effort to provide immediate relief to survivors and to protect life and property. Many of these firms were called into action on a sole-source basis under acquisition provisions that allow the government to acquire urgently needed goods and services in emergency situations. These firms provided emergency housing and shelter for victims and emergency personnel, to start debris cleanup, and to secure property from further damage.

AP PHOTO/CHRISTOPHER MORRIS/VII

The Shaw Group Inc., Bechtel National Inc., CH2M Hill, and Dewberry Technologies were engaged by FEMA to provide emergency housing and shelter for victims, to start the cleanup of hazardous waste, and begin restoration of the transportation infrastructure. Before Katrina struck, however, FEMA had only one contract in place relevant to the Katrina response for temporary housing. Immediately after the disaster, USACE competitively awarded contracts for debris removal to ACI/AshBritt, Inc., Environmental Chemical Corp., Central Environmental Services, and Phillips & Jordan, Inc. through an emergency competition, which resulted in the submission of 22 proposals.[120]

FEMA executed few, if any, written contracts during what officials called "the real nightmare emergency" (Aug. 29-Sept. 15).[121] The circumstances surrounding their contract awards made it difficult for FEMA to understand fully the contract specifics. FEMA simply instructed companies to begin work and submit vouchers for payment. FEMA used this method for the acquisition of food, ice, buses, and other supplies. This could raise issues of enforceability, which will need to be resolved when written contracts are issued.

FEMA's contracting practices were described by state and local officials as "problematic."[122] Louisiana officials cited lack of FEMA oversight and management in the awarding of contracts. Further, state officials suggested there were no performance-based standards under the contracts and suggested under "time and materials" contracts, the longer the contractor takes to perform the necessary service, the more money the firm stands to make.

Rep. Jefferson also conveyed complaints from Louisiana officials about FEMA's failure to contract out the mortuary and body recovery effort.[123] This was a particularly sensitive issue because New Orleans Mayor Ray Nagin was predicting thousands of casualties.[124] State officials reported FEMA implemented a contract with Kenyon International in the immediate aftermath of the hurricane. According to officials, Kenyon was not given the support it needed from FEMA to meet its objectives and ended up pulling out of the contract. Ultimately, Louisiana contracted with Kenyon directly.[125]

When asked whether FEMA had contracts in place for disaster-related supplies, including tarps, ice, generators, and temporary shelters, Brown equivocated, stating they had some contracts in place for provision of MREs, water, ice, temporary housing, and some of the trailers. In other cases, however, FEMA had to "start buying off the street to meet the demand."[126]

By the end of September, it was reported that 80 percent of the contracts — and half of the $3.2 billion spent — had been awarded without full and open competition.[127] The agency awarded 60 percent of its contracts without full competition in October 2005, 68 percent in November 2005, and 50 percent in the first half of December.[128]

The Select Committee heard testimony from representative companies that contracted with FEMA and USACE to provide immediate response and recovery requirements to the federal government. Carnival Cruise Lines provided temporary housing; The Shaw Group provided, among other services, "blue roof" emergency tarps to cover storm-damaged homes; Landstar System provided transportation support, including trucks for supplies and busses for evacuees; AshBritt provided debris removal services; Innotech provided emergency packaged meals.[129]

Typical contracting issues

The experiences of The Shaw Group are typical of the issues raised by contractors in the aftermath of Katrina. The company is a $3+ billion company with 20,000 employees worldwide. According to company officials, Shaw performed $800 million in federal work last year, and contracts for Hurricane Katrina and Rita relief have been the firm's biggest undertaking.[130] Shaw was originally awarded two separate $100 million contracts: the first by the USACE and the second by FEMA. Shaw

is participating in competitive procurements for FEMA requirements which, originally, were awarded on a sole-source basis. USACE contracts (including blue roof and rapid response contracts) were awarded on a non-competitive basis.[131] Overall, most of Shaw's business comes from USACE ($300 million), followed by DOD, DOE, and the EPA.

The Friday before the storm, the Shaw Group was asked by another firm to conduct damage assessments and inspections.[132] They were also contacted by FEMA and the USACE to begin work. They established a command center in Baton Rouge run by a retired general who served as the point of contact for all requests. FEMA placed a contract specialist within Shaw's operations to help with compliance and other issues. Officials were unsure if other companies were offered FEMA assistance as well but said they offered to provide Shaw personnel at FEMA.

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According to company officials, Shaw's existing blue roof contract uses the highest number of workers from the impacted areas of any firm project.[133] Last year, Shaw took Louisiana contractors to Florida, which made preparations and response for this event easier. Their rapid response contract has expanded over the years and was activated by the USACE. Shaw was not successful in a bid for a debris removal contract.

Shaw officials raised several concerns, which were typical of the issues raised by several contracting firms:[134]

- *Liability*—Shaw officials expressed concern that the federal government might hold them liable for environmental issues arising from pumping contaminated water out of the city.
- *Changing Requirements*—FEMA tasked Shaw with securing temporary housing, which the company began doing, before FEMA officials changed their minds. Although they did not lose money, the company did lose time and goodwill.
- *Contract Signing and Follow-through*—Shaw officials had problems getting contracts signed by the appropriate agency officials. Although all the contracts have since been signed, payments from FEMA remain slow. Because Shaw's subcontractors are generally small businesses with tight cash flow, they cannot wait long for payment. Shaw also had to turn down certain projects because it had no indication from FEMA that it would be paid. The Stafford Act requires that the federal government give preference, if practicable, to local businesses.[135] However, this was largely not done and, according to Shaw officials, some local companies have since gone out of business. For example, debris removal contracts were given to Minnesota, California, and Florida firms.
- *Conflicts of Interest*—Shaw officials continue to struggle with the propriety of working for FEMA and for the parishes. Officials indicated complications could arise if FEMA hires them to asses a situation, and then a parish hires them for rebuilding using FEMA money.
- *Bonding*—Shaw officials did not know what the bonding requirements were for Katrina recovery work. However, they noted few small subcontractors are bonded to levels necessary to enable them to perform major contracts.

Oversight and proposed reforms to address outstanding issues

Although some emergency awards were made on a sole-source basis, they do not constitute the majority of those awarded in support of the relief efforts. Nevertheless, FEMA recognized the need to revisit non-competitive contracts issued quickly immediately after the storm.[136]

Shortly after emergency needs arose, DHS's Chief Procurement Officer (CPO) requested the OIG to begin overseeing FEMA's acquisition process.[137] The DHS-IG assigned 60 auditors, investigators, and inspectors

and hired additional oversight personnel. DHS-IG staff reviewed the award and administration of all major contracts, including those awarded in the initial efforts, and the implementation of the expanded use of government purchase cards.[138] The staff are continuing to monitor all contracting activities as the government develops its requirements and as the selection and award process unfolds. In addition, 13 different agency OIGs have committed hundreds of professionals to the combined oversight effort, with a significant part of the oversight provided by DOD, the various service audit agencies, and criminal investigative organizations.[139]

To ensure that any payments made to contractors are proper and reasonable, FEMA has engaged the Defense Contract Audit Agency (DCAA) to help it monitor and oversee payments made and has pledged not to pay on any vouchers until each one is first audited and cleared.[140] In addition, DHS's CPO met with each of the large Katrina contractors to impress upon them the need to ensure all charges are contractually allowable, fair, and reasonable. Finally, the GAO has sent a team to the Gulf coast area to provide an overall accounting of funds across the government and evaluate what worked well and what went wrong at the federal, state and local levels.

FEMA has indicated it will revisit non-competitive arrangements made immediately after the storm.[141] In addition, on September 16, FEMA instituted its Phase II plan. Under this arrangement, competitive procurements for relief efforts will be reconstituted and revitalized.[142] DHS officials indicated FEMA would formalize the original emergency agreements to establish clearly the terms and prices and then review all the requirements and decide whether any particular contract needs to be completed in the short term. If there is a continuing need for the requirement, the initial contract will be left in place only long enough for a competition to be held. The competitively awarded contracts will then replace the original arrangement. FEMA officials plan to ensure as much of the work as possible goes to local small firms.[143]

Procurement officials acknowledged the initial contracting response was poor, with little planning and inadequate resources.[144] However, these same officials stated the procurement system had sufficient flexibility to meet the challenge posed by Katrina.

Finding: Before Katrina, FEMA suffered from a lack of sufficiently trained procurement professionals. DHS procurement continues to be decentralized and lacking a uniform approach, and its procurement office was understaffed given the volume and dollar value of work

FEMA's grossly understaffed acquisition unit was not ready for the Katrina disaster.[145] FEMA had 55 acquisition slots, and procurement officials think it should have had a minimum of 172.[146] Further, only 36 of the 55 slots were actually occupied. FEMA is one of the DHS agencies that are not under the control of the DHS chief procurement officer, thus the FEMA acquisition office reported to Michael Brown. As of the time of the interview, FEMA was relying upon staff from the central acquisition office, comprised of 60 acquisition personnel and led by a member of the Senior Executive Service. Regardless, the office was understaffed.[147]

Prior to Hurricane Katrina, the OIG had repeatedly cited as a major challenge the lack of consistent contract management for large, complex, high-cost procurement programs.[148] DHS procurement continues to be decentralized and lacking a uniform approach.[149] DHS has seven legacy procurement offices that continue to serve DHS components, including FEMA.[150] Notably, FEMA has not been reporting or tracking procurements undertaken by its disaster field offices, and its procurement office remains understaffed given the volume and dollar value of work. The CPO recently had established an eighth office called the Office of Procurement Operations to meet the procurement needs of the rest of DHS.[151]

FEMA had 55 acquisition slots, and procurement officials think it should have had a minimum of 172. Further, only 36 of the 55 slots were actually occupied.

Louisiana officials also noted a shift during the Katrina recovery of the personnel FEMA placed in charge of contracting and logistical decisions.[152] Instead of relying on FEMA's regional personnel, with whom the state is accustomed to working in the aftermath of a disaster, FEMA sent headquarters officials to the affected areas to make key contracting and logistical decisions, causing the process to become more bureaucratic. For example, adding individuals to FEMA's Individual Assistance Program has been problematic, according to local officials.[153]

In the past, the FCO from Region VI was able to add individuals in the field. With Katrina, however, state officials had to send the request to FEMA headquarters, which has become, some say, "gridlocked."[154] Further, as previously mentioned, Louisiana state and local officials also criticized FEMA contracting.[155] They said the focus seems to be shifting from the local FCO to FEMA headquarters and becoming more bureaucratic in the process.

Finding: Ambiguous statutory guidance regarding local contractor participation led to ongoing disputes over procuring debris removal and other services[156]

Under the Stafford Act,[157] federal contracts with private firms for debris clearance, distribution of supplies, reconstruction, and other activities must give preference, to the extent feasible and practicable, to organizations, firms, and individuals from the area affected by the disaster or emergency.[158] However, there is no statutory guarantee that, after a major disaster or emergency, recovery and reconstruction work will be awarded to businesses, organizations, and individuals, regardless of where they are from.

The award of federal contracts for disaster or emergency assistance activities are, in general, governed by the standard competitive bidding statutes that apply to all government contracting activities. The Stafford Act, however, contains a "local preference" provision, which can be implemented by the inclusion in a solicitation of a clause creating a price preference for local firms or by a set-aside that only permits local firm to compete.[159] The implementation is at the discretion of the contracting officer. Significantly, the Stafford Act local preference is not a guarantee that local firms will be awarded recovery contracts.[160]

Similarly, prime contractors are often required to give preference to local subcontractors.[161] USACE Acting Principal Assistant Responsible for Contracting, Colonel Norbert Doyle, suggested there is some uncertainty as to the geographical preferences allowed and required by the Stafford Act.[162] Another official testified that different laws are necessary,[163] and stated "[the Stafford Act is] like bringing a donkey to the Kentucky Derby."[164]

Numerous public officials have complained about the small number of local firms given relief contracts, particularly with regard to debris removal. AshBritt, the Florida-based prime contractor for debris removal in Mississippi, was awarded a contract in early September by USACE.[165] According to AshBritt official Randy Perkins, the company was one of 22 firms that bid for USACE debris removal contracts. AshBritt won the Louisiana and Mississippi debris removal contracts, making the firm the only contractor for that job in those states. AshBritt was notified of the award 72 hours after the RFP was advertised.

The debris removal contracts have a $150 million ceiling at $30 million per year, and were intended by USACE to get work underway as soon as possible, with the agency reassessing the requests later.[166] USACE's delay in issuing RFPs was understandable given the disaster, according to Perkins.[167] He stated, it costs "hundreds of thousands of dollars to keep pre-existing contracts in

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place, and firms receive no funding for this upkeep, which represents a free insurance policy for USACE," and few companies can secure the bond necessary to perform such a large-scale project.[168]

AshBritt official Perkins says he encountered political "fallout" from local officials because the company is not based in Mississippi or Louisiana.[169] The Select Committee was not able to substantiate his allegation, however. Perkins also discussed recieving mixed messages from local officials and "officials in D.C." While state officials told him "just get the debris out," he indicated officials in D.C. sent the message to "hire local workers." Although the company's contract with the government does not require it to hire local workers, Perkins says local contractors recieve 80 percent of AshBritt's payments to sub-contractors.[170] Although this percentage seems to differ from data provided in USACE progress reports, the Select Committee was not able to substantiate the actual level of debris removal work provided by the local sub-contracting community.

Brown suggested the scale of the disaster and the complexity of the response require a large firm's expertise:

> Debris is a huge issue. Debris is one of those issues that is fraught with local politics. It's fraught with fraud, waste and abuse [and] in cleaning up debris in a situation like Katrina, you really have to have experts overseeing that global perspective because you have hazardous waste. You have the whole issue of private property versus public property . . . . So I would caution us about going down a path that says we're going to have all locals do it. I know, in my subdivision, the local garbage folks are very adept at picking up my trash twice a week, and they're pretty good about hauling out debris after a storm or something. But in the kind of debris removal we're talking about in Mississippi, Alabama and Florida from last year and this year, you really need to have a substantial company overseeing that, to not only protect the taxpayers, but to make sure it's done right.[171]

Later Brown said, "in a small town that's hit by a tornado and you have to clean up 45 blocks, city blocks, that's one thing. Here, where you're cleaning up entire cities, it's a different issue. So I would just caution that we approach that systematically."[172]

Even if this point is conceded, it appears that, despite the Stafford Act's preference provision, only a fraction of the money being spent in Mississippi is going to subcontractors based there, according to press reports citing documents from FEMA and USACE: [173]

- Of approximately $3.1 billion FEMA had awarded by Nov. 4, only $52.4 million, or about 1.7 percent, had gone to Mississippi firms.
- Of the $476 million that has been spent by the Corps of Engineers in Mississippi as of Nov. 2, about 28.5 percent has gone to Mississippi companies through direct contracts and subcontracts.
- Of the $164 million AshBritt has been paid so far by the Corps, only about $30 million, about 18 percent, has made it to Mississippi subcontractors.

However, Perkins said AshBritt has far exceeded its contractual requirements for hiring local, small, and minority-owned businesses.[174] "People don't understand that the general administrative costs are very high. It takes a lot to manage one of these projects," according to Perkins. "We have a tremendous amount of quality control people and logistical support and we need to pay for their housing."[175] He said the data released by USACE do not reflect the involvement of Mississippi businesses because there are several major contractors from the state that he called "team members," who are helping the company administer the overall contract. He said AshBritt also has provided "hundreds" of administrative jobs to Mississippians.

Use of local firms

Some have suggested FEMA's policies need to be changed to have local contractors in Gulf states ready to begin recovery work well before hurricane season.[176] For instance, instead of hiring the USACE to manage debris removal, states susceptible to hurricanes could prepare lists of businesses who meet federal standards to remove debris or haul trailers, thereby enabling local governments to award their own contracts. Local governments are more likely to go with local contractors and local governments have been able to get the job done more quickly and cheaply.[177]

As of December 2005, of the nearly $8 billion expended by all direct contracts with the federal government, only five cents of every dollar reached Mississippi prime contractors.[178] Expenditure rates show DHS (including FEMA) has spent $4,150,359,361, with 3.5 cents for every dollar contracted directly to Mississippi businesses. A January 23, 2006 USACE report reported USACE awarded over $2.3 billion in Katrina contracts with 3.54 percent of total contract dollars going to Mississippi businesses.

Rep. Pickering noted

> Congress wrote the Stafford Act to maximize the impact of federal dollars by giving preference to local contractors, strengthening the damaged economy and providing jobs to communities and victims of the disaster. . . . Mississippians have the ability, capacity and personal incentive to do this work. We want to rebuild and restore our home state, and these federal contracts will help our economy more through local contractors than sending the money to out-of-state corporations.[179]

Current federal policy discourages local governments from assuming responsibility for debris removal.[180] Local officials are responsible for a cost share of 10 to 25 percent (depending on the magnitude of the disaster) if they use their own contracts. However, if USACE contractors are used, the reimbursement for the life of the debris removal effort is 100 percent with no cost share. Communities removing their own debris have been notified they will incur a 10 percent cost share beginning March 16, 2006.[181]

Additionally, the specter of a federal audit can be very intimidating for local officials, especially for rural communities and those that have incurred major damage. Risk can be avoided by simply signing on with USACE, even if it is more costly and offers less control. For example, USACE is removing debris in Waveland, Mississippi and other locations at a reported cost of approximately $23 per cubic yard.[182] Nearby Gulfport hired its own contractor at $14.95 per cubic yard[183] and appears to be making faster progress.[184] Gulfport's action is particularly bold given their significant loss of ad valorem tax base. Finally, the $8.05 per cubic yard margin is particularly substantial given the 40 million cubic yard debris removal requirement in Mississippi alone.

Ambiguities regarding the implementation of local contractor preference under the Stafford Act should be resolved. In addition, clear, unambiguous remedies and penalties for failure to meet such statutorily mandated preferences may need to be considered.

FEMA response to local participation issue

In response to these concerns, FEMA plans a two-pronged approach.[185] First, FEMA will competitively award multiple five-year technical assistance contracts to small disadvantaged businesses for recovery work in the Gulf states, with evaluation preferences keyed to the location of both the prime contractor and subcontractors in the affected areas. Second, FEMA plans a full and open competition for multiple five-year contracts to provide technical assistance support on a national basis for disaster response and recovery. Under this competition, FEMA will require that these prime contractors meet significant small business subcontracting goals, including the preference for local businesses as provided under the Stafford Act.

Through this strategy, FEMA hopes to provide a diverse group of companies the opportunity to contract with FEMA for the Gulf coast hurricane recovery by adding prime contracting opportunities for small disadvantaged businesses with a geographic preference for those located in the Gulf states.[186] The national competition approach is intended to preserve subcontracting goals and opportunities for small and disadvantaged businesses as part of all prime contracts for future disasters. Both strategies will emphasize the importance of using local businesses, a critical piece of a successful economic recovery in a disaster-ravaged area. Select Committee staff did not receive detailed information on what efforts, if any, USACE is planning for its long-term Katrina-related acquisitions.

In addition, DHS representative Larry Orluskie said FEMA is changing some of its policies.[187] Recently, FEMA announced it will set aside $1.5 billion under 15 contracts worth up to $100 million apiece.[188] Acting FEMA Director David Paulison stated that priority would be given to local contractors on the five-year contracts for trailer maintenance.[189] Orluskie also cited the rebidding of several large, prime contracts as evidence that the agency is trying to be as transparent as possible in its contracting

process.[190] Regarding the $100 million contracts held by Bechtel, Fluor, Shaw, and CH2M Hill, agency officials said the requests have been completed and will be awarded again in February 2006.[191]

Nevertheless, Carwile testified "[t]he Public Assistance program provided under Section 406 of the Stafford Act is far too cumbersome and time consuming in terms of getting funds through the states down to the impacted communities" and "could be totally revamped . . . ." He said "[t]he program is one of the most difficult and contentious aspects of disaster recovery," and "the entire issue of Federal reimbursement for debris removal should be addressed in a comprehensive manner."[192]

Finding: Attracting emergency contractors and corporate support could prove challenging given the scrutiny that companies have endured

When federal agency resources were overwhelmed and existing contractors unable to meet the huge demands created by the storm, federal officials turned to the private sector for assistance. In an effort to meet pressing needs by any means possible, federal officials looked to alternative sources for food, transportation, and housing. Many of the firms approached by agency officials had never contracted previously with the federal government. Housing was one resource in short supply. Officials considered a variety of options to shelter victims and first responders, and approached a number of cruise ship operators.

According to Carnival Cruise Lines representatives, on Wednesday, August 24, federal officials contacted the company regarding chartering ships.[193] Carnival found this unusual given that the firm had never served as a federal contractor. "[W]e were watching just the total devastation, and we felt very strongly that it was a situation where we were in a position to help, and we very much wanted to help," stated Terry Thorton, a Carnival Vice President.[194]

The Military Sealift Command informed Carnival the RFP was being issued. Carnival indicated it wanted to "help" and responded to the RFP.[195] Thirteen ships were potentially available from Carnival and others. Four ships ultimately met the RFP requirements (which included a requirement for medical and pharmaceutical facilities), three belonging to Carnival. Carnival received the RFP at 9 a.m. Friday, and the initial response was due two hours later at 11 a.m. Carnival offered three ships, and negotiated all day with "best and final" offers provided at 9 p.m.

Carnival based its bid on projected cruise revenue for six months out, and agreed it would reduce the final bill and provide a refund if, after an internal audit by an independent accounting firm, it was found Carnival earned more than it would have in the cruise market.[196] To make the ships available, Carnival canceled approximately 100,000 existing reservations for which travel agent fees still had to be paid. Carnival makes its profit from ticket sales and "add-ons" (drinks, shore excursions, etc.) and not in the "time charter" business, which is a comprehensive package of food, beverages, and activities. In addition, it incorporated taxes into its offer,

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which will be refunded if it is determined it does not owe taxes under U.S. law.[197]

Despite these provisions, numerous public officials and press reports have criticized the arrangement. Attention focused on the ships when FEMA revealed it intended to use them to house first responders. At the time, housing for first responders was in short supply, and FEMA sought out a variety of options. "I'm not sure that everyone on this panel would have made the same choice that FEMA made, but this was FEMA's choice as to how they wanted to house people . . . . And you've simply said, [']if you want us to do this, here's what the circumstances are,['] and FEMA said, [']that's okay with us,['] and we accept that," stated Rep. Jefferson.[198] When appreciation was expressed by Select Committee Members for Carnival's assistance, Carnival officials replied, "[t]hank you. Because honestly, that's one of the few times that we've really been thanked for the effort . . . ."[199]

The intense public scrutiny could limit the willingness of private sector companies to offer assistance during future disasters. Several firms expressed the view that the challenges associated with emergency contracting may not be worth the trouble. Finally, unfounded negative publicity harms company reputations. Public sector missions divert company assets from primary missions and could raise questions about whether a company was meeting its fiduciary duty to shareholders. Given the important role the private sector played in all aspects of the response and recovery, any loss of private sector involvement could be critical. ■

[1] *Hearing on Recovering from Hurricane Katrina: Responding to the Immediate Needs of Its Victims Before Senate Comm. on Homeland Security and Gov't Affairs*, 109th Cong. (Sept. 28, 2005) at 58 (statement of Melvin Holden) [hereinafter *Sept. 28, 2005 Senate Comm. Hearing*].
[2] Dep't of Homeland Sec., *Major Mgm't Challenges Facing the Dep't of Homeland Sec.*, Rpt. of the Inspector Gen., DHS FY 2005 Performance and Accountability Rpt. (Dec. 2005) at 110, *available at*, http://www.dhs.gov/interweb/assetlibrary/OIG_06-14_Dec05.pdf (last visited Jan. 28, 2006) [hereinafter *DHS IG Rpt.*].
[3] *DHS IG Rpt*. at 111.
[4] Amy Belasco, Cong. Research Service (CRS), *Reallocation of Hurricane Katrina Emer. Approps.: Defense and Other Issues* (Dec. 15, 2005) at CRS-3 [hereinafter *CRS Approps Rpt.*].
[5] *Id.* at CRS-3-CRS-4.
[6] Frank Donze, *Nagin decries slow pace of relief*, TIMES-PIC. (New Orleans, LA) Oct. 21, 2005 at 1.
[7] James Varney, *Want answers? Don't ask FEMA*, TIMES-PIC. (New Orleans, LA) Oct. 22, 2005 at 1.
[8] *Hearing on Hurricane Katrina: The Role of the Fed. Emer. Mgm't Agency Before Select Comm.*, 109th Cong. (Sept. 27, 2005) at 100 (statement of Michael Brown, former Undersecretary of Emergency Preparedness and Response) [hereinafter *Sept. 27, 2005 Select Comm. Hearing*].
[9] Tom Gardner, *Former FEMA director shoulders greater share of blame for Katrina failures*, ASSOC. PRESS, Jan. 19, 2006.
[10] *Sept. 28, 2005 Senate Comm. Hearing* at 82 (statement of Sen. Mark Pryor).
[11] *Sept. 27, 2005 Select Comm. Hearing* at 65 (statement of Michael Brown). Note, each trailer contained 18,000 meals.
[12] *Id.* at 150 (statement of Rep. Chip Pickering).
[13] *Id.* at 65 (statement of Rep. Gene Taylor).
[14] *Id.* at 66 (statement of Michael Brown).
[15] Interview by Select Comm. Staff with Robert Latham, Director, Mississippi Emergency Management Agency, in Jackson, MS (Oct. 14, 2005) [hereinafter Latham Interview].
[16] *Id.*
[17] *Hearing on Hurricane Katrina: Perspectives of FEMA's Operations Professionals Before Senate Comm. on Homeland Security and Gov't Affairs*, 109th Cong. (Dec. 8, 2005) at 6 (written statement of William L. Carwile) [hereinafter *Dec. 8, 2005 Senate Hearing*].
[18] *Id.*
[19] *Id.*
[20] *Id.*
[21] Interview by Select Comm. Staff with Bruce Baughman, Director, Alabama Emergency Management Agency, in Clancy, AL (Oct. 11, 2005) [hereinafter Baughman Interview].
[22] Interview by Select Comm. Staff with Tim Payne, Branch Chief and Emergency Management Program Coordinator, Alabama, in Clanton, AL (Oct. 11, 2005) [hereinafter Payne Interview].
[23] Baughman Interview.
[24] *Id.*
[25] *Id.*
[26] Payne Interview. These items included transportation, water, ice, materials handling equipment, cots plus bedding supplies, sandbags, meals, fuel, tarps, project management and logistics services, special needs beds, headquarters / office coordination capabilities.
[27] *Sept. 27, 2005 Select Comm. Hearing* at 73 (statement of Michael Brown).
[28] Frank Davies, *Gov. Bush: Keep Disaster Response Local*, HERALD (Miami), Oct. 20, 2005, at A-26 [hereinafter *Herald Article*].
[29] *Id.*
[30] Briefing for Select Comm. Staff by Gary Moore, Director of Logistics, FEMA (Jan. 9, 2006).
[31] *See* Interview by Select Comm. Staff with Scott Wells, Deputy FEMA Federal Coordinating Officer, in Baton Rouge, LA (Nov. 9, 2005), [hereinafter Wells Interview]; *see also* Interview by Select Comm. Staff with Tony Robinson, FEMA Operations Officer, in Baton Rouge, LA (Nov. 10, 2005) [hereinafter Robinson Interview].
[32] Interview by Select Comm. Staff with Matt Farlow, Chief Information Technology Division (LOHSEP), in Baton Rouge, LA (Nov. 4, 2005) [hereinafter Farlow Interview].
[33] *Id.*
[34] *Id.*
[35] *Id.*
[36] *See* Interview by Select Comm. Staff with LTC William Doran, Chief, Operations Division, Louisiana Office of Homeland Security and Emergency Preparedness (LOHSEP), in Baton Rouge, LA (Nov. 7, 2005) [hereinafter Doran Interview]; *see also* Interview by Select Comm. Staff with Jim Ballou, Operations Division, Louisiana Office of Homeland Security and Emergency Preparedness (LOHSEP), in Baton Rouge, LA (Nov. 7, 2005) [hereinafter Ballou Interview].
[37] *See* Doran Interview; *see also* Ballou Interview.
[38] *See* Wells Interview; *see also* Robinson Interview.
[39] Robinson Interview.
[40] *Id.*
[41] *Id.*
[42] *Id.*
[43] *See* Doran Interview; *see also* Ballou Interview; *see also* Interview by Select Comm. Staff with Dr. Walter Maestri, Emergency Manager for Jefferson Parish, in New Orleans, LA (Nov. 8, 2005) [hereinafter Maestri Interview]; Interview by Select Comm. Staff with Jiff Hingle, Plaquemines Parish Sherriff, in New Orleans, LA (Nov. 8, 2005) [hereinafter Hingle Interview]; *see also* Interview by Select Comm. Staff with Terry Ebbert, Director of Homeland Security for the City of New Orleans, in New Orleans, LA (Nov. 9, 2005) [hereinafter Ebbert Interview].
[44] Farlow Interview.

[45] *Sept. 27, 2005 Select Comm. Hearing* at 110 (statement by Michael Brown); *see also* Interview by Select Comm. Staff with Bill Lokey, FEMA Federal Coordinating Officer, in Washington, DC (Dec. 2, 2005) [hereinafter Lokey Interview].
[46] *See* Doran Interview; *see also* Ballow Interview; *see also* Lokey Interview; *see also* Interview by Select Comm. Staff with Phil Parr, Dep. Fed. Coordinating Officer, FEMA, in Washington, DC (Dec. 8, 2005) [hereinafter Parr Interview].
[47] Interview by Select Comm. Staff with Andy Kopplin, Chief of Staff to Governor Blanco, in Baton Rouge, LA (Nov. 6, 2005) [hereinafter Kopplin Interview].
[48] *See* Maestri Interview; *see also* Hingle Interview; *see also* Ebbert Interview.
[49] Maestri Interview.
[50] *See,* Interview by Select Comm. Staff with Jeff Smith, Deputy Director, Louisiana Office of Homeland Security and Emergency Preparedness, in Baton Rouge, LA (Nov. 7, 2005) [hereinafter Smith Interview]; *see also* Lokey Interview; *see also* Wells Interview.
[51] Ebbert Interview.
[52] *Id.*
[53] *Id.*
[54] Kopplin Interview.
[55] Hingle Interview.
[56] *See* Wells Interview; *see also* Robinson Interview.
[57] *Id.*
[58] *Id.*
[59] Robinson Interview.
[60] *Sept. 27, 2005 Select Comm. Hearing*, at 106-107 (statement of Michael Brown).
[61] *Id.* at 108 (statement of Michael Brown).
[62] *Id.* at 110 (statement of Michael Brown).
[63] *Id.* at 108 (statement of Michael Brown).
[64] *Id.* at 110 (statement of Michael Brown).
[65] *Sept. 28, 2005 Senate Comm. Hearing* at 5-6 (written statement of Melvin Holden).
[66] *Id.* at 7 (written statement of Melvin Holden).
[67] *Dec. 8, 2005 Senate Comm. Hearing* at 9 (written statement of William Carwile).
[68] *Id.*
[69] *Sept. 27, 2005 Select Comm. Hearing* at 164 (statement of Michael Brown).
[70] *Id.* Note, Mr. Brown left FEMA shortly after this plan was devised. He testified that he was unaware of whether this proposal was ultimately implemented. *Sept. 27, 2005 Select Comm. Hearing* at 164 (statement of Michael Brown).
[71] *Sept. 28, 2005 Senate Comm. Hearing* at 9 (written statement of William Carwile).
[72] *Id.*
[73] Baughman Interview.
[74] Baughman Interview; *see also* Interview by Select Comm. Staff with David Tranter, General Counsel for Alabama Emergency Management Agency, in Clanton, AL (Oct. 11, 2005) [hereinafter Tranter Interview].
[75] Interview by Select Comm. Staff with Toby Roth, Chief of Staff to Governor Barbour, in Montgomery, AL (Oct. 12, 2005) [hereinafter Roth Interview].
[76] *Dec. 8, 2005 Senate Comm. Hearing* at 6 (written statement of William Carwile).
[77] *Sept. 27, 2005 Select Comm. Hearing* at 149-150 (statement of Rep. Chip Pickering); *see also Sept. 27, 2005 Select Comm. Hearing* at 146 (statement of Michael Brown.).
[78] *Sept. 27, 2005 Select Comm. Hearing* at 150 (statement of Rep. Chip Pickering).
[79] *Id.* at 149-150 (statement of Michael Brown).
[80] *Dec. 8, 2005 Senate Comm. Hearing* at 6 (written statement of William Carwile).
[81] *Id.* at 163 (written statement of William Carwile).
[82] *Hearing on Hurricane Katrina: What Can Government Learn from the Private Sector's Response Before the Senate Comm. on Homeland Security and Gov't Affairs,* 109th Cong. (Nov. 16, 2005) at 6 (written statement of Jason Jackson) [hereinafter *Nov. 16, 2005 Senate Comm. Hearing*].
[83] *Id.* at 2 (written statement of David. M. Ratcliffe).
[84] *Id.* at 5 (written statement of David. M. Ratcliffe).
[85] *Id.* at 7-8 (written statement of Kevin T. Regan).
[86] *Id.* at 3 (written statement of Stanley S. Litow).
[87] *Id.*
[88] Office of Inspector General, Dep't of Homeland Security, *Emergency Preparedness and Response Could Better Integrate Information Technology with Incident Response and Recovery* (Rpt. No. OIG-05-36), at 5 (Sept. 2005) [hereinafter *DHS IT Report*].
[89] *See generally, DHS IT Report; see also* Laurie Sullivan, *FEMA's Foul-up; Report says agency's computer systems failed to track supplies during last year's hurricane season*, INFOR. WEEK, Oct. 3, 2005 [hereinafter *FEMA Foul Up Article*].
[90] *FEMA Foul Up Article.*
[91] *DHS IT Report* at 21.
[92] *Id.* at 3.
[93] *Id.* at 27.
[94] *FEMA Foul Up Article.*
[95] *DHS IG Report* at 46.
[96] *FEMA Foul Up Article*.
[97] *Id.*
[98] *Id.*

[99] *Katrina Spending Highlights*, ASSOC. PRESS, Sept. 8, 2005.
[100] *Sept. 28, 2005 Senate Comm. Hearing* at 47 (statement of Dan Coody).
[101] *Id.*
[102] *Id.* at 79 (statement of Dan Coody). Mr. Coody further stated that Wal-Mart "immediately responded by sending two engineers to create a warehouse system for our facility, a distribution center supervisor and two additional employees to oversee the operation. During peak hours we had over 100 volunteers, city employees, Wal-Mart employees, and work release inmates working side by side to organize the donations. The trailers were unloaded by Saturday [September 10], and the donations were ready for shipment by September 15." *Sept. 28, 2005 Senate Comm. Hearing* at 2 (written statement of Dan Coody).
[103] *Nov. 16, 2005 Senate Comm. Hearing* at 2 (statement of David Ratcliffe).
[104] *Id.* at 2 (statement of Kevin T. Regan).
[105] *Id.* at 1-2 (statement of Jason Jackson).
[106] *Id.* at 22 (statement of Stanley S. Litow).
[107] *Sept. 28, 2005 Senate Comm. Hearing* at 48 (statement of Dan Coody).
[108] *Id.* at 2-3 (written statement of Dan Coody).
[109] *Id.* at 48 (statement of Dan Coody).
[110] *Id.*
[111] *Id.* at 49-50 (statement of Dan Coody).
[112] *Id.* at 80 (statement of Dan Coody).
[113] *Id.* at 80-81 (statement of Dan Coody).
[114] *Id.* at 81 (statement of Dan Coody).
[115] *Id.*
[116] *Id.*
[117] Renae Merle, *Lack of Contracts Hampered FEMA; Dealing With Disaster on the Fly Proved Costly*, WASH. POST, Oct. 10, 2005, at A01 [hereinafter *Contracts Article*].
[118] *Contracts Article.*
[119] *Nov. 2, 2005, Select Comm. Hearing* at 5 (statement of Chairman Tom Davis).
[120] Interview by Select Comm. Staff with Greg Rothwell, DHS Chief Procurement Officer, and Mui Erkum, Chief of Staff to Greg Rothwell, in Washington, D.C. (Sept. 19, 2005) [hereinafter Rothwell / Erkum Interview].
[121] *Id.*
[122] Smith Interview; *see also* Maestri Interview.
[123] Smith Interview.
[124] *Id.*
[125] *Id.*
[126] *Sept. 27, 2005 Select Comm. Hearing* at 100 (statement of Michael Brown).
[127] Chris Gosier, *Another Katrina casualty: Competition; No-bid Contracting Surges for Recovery Work*, FED. NEWS, Jan. 09, 2006, at 1 [hereinafter *No-bid Article*].
[128] *Id.*
[129] *See generally Nov. 2, 2005 Select Comm. Hearing.*
[130] Interview by Select Comm. Staff with Stephen Marlo, Vice President and Manager of Washington Operations and George Bevan, The Shaw Group, in Washington, D.C. (Oct. 25, 2005) [hereinafter Marlo / Bevan Interview].
[131] The blue roof program involves teams of contract personnel professionally installing high quality plastic sheeting over damaged roofs. This was first used extensively following Hurricane Andrew and again in Hurricane Georges in Puerto Rico, and, in 2004, in Florida. It enables families to reoccupy their houses until more permanent repairs can be made.
[132] Marlo / Bevan Interview.
[133] *Id.*
[134] *Id.*
[135] Robert T. Stafford Disaster Relief and Emergency Assistance Act, 42 U.S.C. §§ 5121-5206 (2005) [hereinafter Stafford Act].
[136] Rothwell / Erkum Interview.
[137] *Id.*
[138] *Id.* Procurement officials indicated that the $250,000 card threshold increase was unnecessary and did not plan to use it.
[139] Rothwell / Erkum Interview.
[140] *Id.*
[141] *Id.*
[142] *Id.*
[143] *Id.*
[144] *Id.*
[145] *Id.*
[146] *Id.*
[147] *Id.*
[148] *Id.*
[149] *See generally* Rothwell / Erkum Interview.
[150] Rothwell / Erkum Interview.
[151] Gov't Accountability Office, *Successes and Challenges in DHS' Efforts to Create an Effective Acquisition Organization* (GAO-05-179) (Mar. 2005) at 5.
[152] Smith Interview.

[153] *Id.*
[154] *Id.*
[155] *See* Smith Interview; *see also* Maestri Interview.
[156] During the Nov. 2, 2005 Select Comm. Hearing on contracting, Members posed questions that witnesses from DHS and FEMA were unable to answer. Although they committed to providing answers to these questions as well as additional information, agency personnel failed to do so despite repeated inquiries. *See generally, Nov. 2, 2005 Select Comm. Hearing.*
[157] Stafford Act. Note, the Stafford Act was first enacted in 1974.
[158] *See* Stafford Act, at § 5150; *see also* Fed. Acq. Reg. (FAR) §§ 26.200 – 26.201.
[159] *See* Stafford Act, at §§ 5121-5206, which directs that preference be given "to the extent feasible and practicable" to businesses and individuals from the affected areas.
[160] *See HAP Construction Inc.*, 98-2 CPD 76 (1998) (Gov't Accountability Office Decision No. B-280044.2) (Sept. 21, 1998).
[161] *See* Stafford Act, at §§ 5121-5206.
[162] *Nov. 2, 2005 Select Comm. Hearing* at 88-89 (statement of Norbert Doyle).
[163] *Dec. 8, 2005 Senate Hearing* (statement of Scott Wells, Deputy Federal Coordination Officer, FEMA (citing press reports)
[164] Greta Wodele, *FEMA officials: Military delayed Superdome evacuation*, GOVEXEC.COM, Dec. 8, 2005.
[165] Interview by Select Comm. Staff of Randy Perkins, Managing Vice President of AshBritt Environmental, Inc., in Washington, D.C. (Nov. 14, 2005) [hereinafter Perkins Interview].
[166] *Id.*
[167] *Id.*
[168] *Id.*
[169] *Id.*
[170] *Id.*
[171] *Sept. 27, 2005 Select Comm. Hearing* at 150-151 (statement of Michael Brown).
[172] *Id.* at 153 (statement of Michael Brown).
[173] Joshua Cogswell, *Doling of storm funds rapped*, CLARION-LEDGER (Jackson, Mississippi) Nov. 13, 2005, at 1A [hereinafter *Storm Funds Article*].
[174] *Id.*
[175] *Id.*
[176] *See generally, Nov. 2, 2005, Select Comm. Hearing; see also Dec. 8, 2005 Senate Comm. Hearing.*
[177] *Id.; see also* Press Release, Rep. Chip Pickering, regarding Contracting (Nov. 3, 2005).
[178] Dep't of Homeland Security, *Report of U.S. Gov't Direct Contracts, including FEMA, as provided by the HCIC, as of December 12, 2005.*
[179] Press Release, Rep. Chip Pickering, regarding Contracting and the Stafford Act (Dec. 21, 2005).
[180] U.S. Army Corps of Engineers, *Small/Local Business Update* as of 1/23/06.
[181] *See, Mississippi; Major Disaster and Related Determinations* (FEMA-1604-DR, Amendment 12) (Aug. 29, 2005, as amended Dec. 21, 2005).
[182] Mike Brunker, *Dust flies over Katrina's Debris, MSNBC*, Jan. 29, 2006.
[183] Interview (Telephone) by Rep. Pickering Staff with Brent Warr, Mayor, Gulfport, MS from Washington, D.C. (Dec. 2005).
[184] Select Committee Members who toured the Gulf coast in January 2006 agreed with this assessment.
[185] *Storm Funds Article.*
[186] *Id.*
[187] *Id.*
[188] *Id.*
[189] *Id.*
[190] *Id.*
[191] *Id.*
[192] *Dec. 8, 2005 Senate Comm. Hearing* at 7-8 (written statement of William Carwile).
[193] Interview by Select Comm. Staff with Jon K. Waldron and T. Michael Dyer, outside counsel for Carnival Cruise Lines, in Washington, D.C. (Oct. 3, 2005) [hereinafter Carnival Counsel Interview].
[194] *Nov. 2, 2005 Select Comm. Hearing* at 170 (statement of Terry Thornton).
[195] Carnival Counsel Interview.
[196] *Id.*
[197] *Id.*
[198] *Nov. 2, 2005 Select Comm. Hearing* at 172 (statement of Rep. William Jefferson).
[199] *Id.* at 173-174 (statement of Terry Thornton).

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"While well intentioned, the volunteers never had a good grasp on security requirements for financial assistance distribution operations. On numerous instances, the ARC [American Red Cross] volunteers would simply find a vacant parking area and commence voucher distribution operations. Immediately, crowds would gather and would overwhelm the distribution site. The ARC would then call on the Guard for assistance.

"Repeated attempts were made to reinforce the need for prior coordination for site security. It was not until mid-September that the ARC started coordinating these operations."

Major General Harold A. Cross
The Adjutant General, State of Mississippi
In Response to Questions from Select Committee, November 22, 2005

CHARITABLE ORGANIZATIONS

Contributions by charitable organizations assisted many in need, but the American Red Cross and others faced challenges due to the size of the mission, inadequate logistics capacity, and a disorganized shelter process

Summary

Following Katrina's devastation, countless numbers of charities provided billions of dollars in relief to those in need. According to the Center on Philanthropy at Indiana University, as of January 9, 2006, private donations, including cash and in-kind gifts have reached $3.13 billion.[1] According to the Government Accountability Office (GAO), the efforts of charitable organizations in the Gulf coast represent the largest disaster response effort in United States history.[2]

Under the National Response Plan (NRP), the American Red Cross (Red Cross) is the primary agency responsible for Emergency Support Function (ESF) #6, Mass Care, Housing and Human Services. As the only nongovernmental organization with lead agency responsibilities under the NRP, the Red Cross plays the crucial role of helping to provide food and shelter to disaster victims.

Katrina, however, was too much for the Red Cross. The Red Cross was challenged to meet its responsibilities under the NRP, as its $2 billion relief operation was 20 times larger than any previous Red Cross mission. Like FEMA, the Red Cross did not have a logistics capacity sophisticated enough to deal with a catastrophe of Katrina's size. The Red Cross was dependent on FEMA and the Department of Defense (DOD) to provide critical commodities such as kitchen supplies, water, and food. The Red Cross was challenged by the sometimes disorganized manner in which shelters were established. Some shelters were unknown to the Red Cross until after they were already opened by local officials. The Red Cross was unable to staff some locally-operated shelters, including the Superdome, because charity officials were denied access.

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Challenges aside, as of January 12, 2006, the Red Cross reported it had raised $2 billion for Katrina relief, by far the largest amount of money raised by a charity.[3] The Salvation Army had raised the second-highest amount, $295 million.[4] The Bush-Clinton Katrina Fund and Catholic Charities were the next-largest fund raisers, raising $137 and $100 million respectively.[5] Other major U.S. charitable organizations, including the United Way, have also contributed meaningfully to the response and recovery effort. One feature of the United Way's response has been its focus on restoring the network of local social service agencies in the region.[6]

Many of the charities responding to Katrina worked with each other to coordinate the delivery of a multitude of services, including providing food, shelter, and medical assistance.[7] Charities have shared information through daily conference calls and through electronic databases that allow multiple organizations to obtain information about services provided to hurricane victims.[8]

As much as any organization, public or private, the Red Cross played a substantial role in the immediate response to Hurricane Katrina. In what became a $2 billion, 220,000-person enterprise, the relief efforts undertaken by the Red Cross include the provision of financial assistance to 1.2 million families, encompassing more than 3.7 million hurricane survivors.[9] As of January 9, 2006, the Red Cross reported that since Katrina made landfall, it had provided hurricane survivors with nearly

3.42 million overnight stays in nearly 1,100 shelters across 27 states and the District of Columbia.[10] In coordination with the Southern Baptist Convention,[11] the Red Cross has served more than 52 million meals or snacks to hurricane survivors.[12] The Katrina response is larger — 20 times so — than any other Red Cross mission in its 125-year history.[13]

Pre-landfall actions

The Red Cross' Gulf coast-area preparation was far along two days before Katrina made landfall. As of 2:00 p.m. on August 27, the Red Cross reported to the White House and the Department of Homeland Security, among other governmental organizations that it "has every resource at its disposal on alert/moving in anticipation of this event to include personnel, equipment, and materials."[14] Key aspects of this preparation included:

- Chapters across the region are opening shelters in support of evacuations in all states.[15]
- 275,000 HeaterMeals staged in Baton Rouge, Louisiana.
- 225,000 HeaterMeals staged in Montgomery, Alabama.
- 15 sites being identified to bring in big kitchens with support of Southern Baptists to provide 300,000 meals per day feeding capability.
- All 14 Disaster Field Supply Center warehouses loading supplies including 50,000 cots, 100,000 blankets, comfort and clean-up kits.
- All vehicles in the Red Cross fleet across the country are on alert for possible deployment and are being dispatched to staging areas.
- All 8 Emergency Communications Response Vehicles (ECRVs) deployed to staging areas.
- Red Cross staff deployed to NRCC, Region VI RRCC, Region IV RRCC, ERT-As and other ESF #6 posts.[16]

By August 28, the Red Cross started to understand the potential magnitude of Katrina. One of its Disaster Operations Reports noted, if Katrina makes landfall at its current pressure, "it will be the most intense storm to hit the U.S. mainland."[17] Also on the same day it was reported, "For the first time ever, an ESF6 coordination center will be set up tomorrow at American Red Cross national headquarters to coordinate the deliver [sic] mass care services with our governmental and non-governmental organization partners."[18]

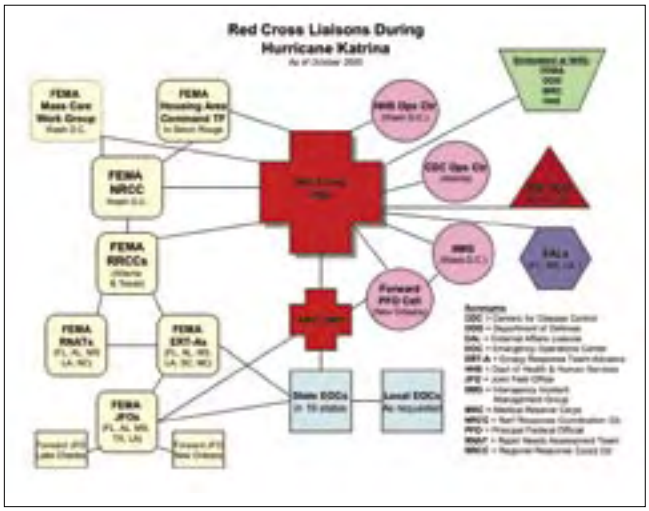
Sites for 25 kitchens for a total daily capacity of 500,000 people were identified and pre-staged.

Post-landfall actions

As Katrina made landfall on August 29, the Red Cross was fully staffing all of the relevant state and federal Emergency Operations Centers (EOCs), including Alabama, Louisiana, Florida, Mississippi, Georgia, South Carolina, Tennessee, Federal Emergency Management Agency (FEMA) Regions IV and VI's Regional Response Coordination Center (RRCC), FEMA's National Response Coordination Center (NRCC), as well as Emergency Response Advance Element Teams (ERT-A) teams in Florida, Alabama, Mississippi and Louisiana.[19] Sites for 25 kitchens for a total daily capacity of 500,000 people were identified and pre-staged.[20] The Red Cross was also aware of the increasing population at the Superdome, a shelter of last resort it did not support.[21] Figure 1 shows Red Cross interactions with these various operations centers.

Figure 1:

Red Cross Involvement at Emergency Operations Centers



RED CROSS

Montgomery, Alabama Regional Headquarters

The day-to-day paid operations staff of the service area coordinates the fundraising and communications and provides the institutional knowledge of the affected area.[22] Armed with the right data, and knowledge of the area, the information and resources management cell can provide essential services to those in need.[23]

The Red Cross' temporary, regional disaster headquarters in Montgomery, Alabama serves Alabama, Mississippi, Louisiana, and the Florida panhandle.[24] The facility serves, "triple functions:" (1) a volunteer and staff shelter; (2) a warehouse for food and supplies; and (3) a temporary regional corporate headquarters – basically a hub for all relief operations in the Gulf coast region.[25]

The facility has been under lease for over a year, and was used during the 2004 hurricane season as a base of response operations for Hurricanes Dennis and Ivan.[26] Following Hurricane Katrina, the facility was re-opened Thursday, September 1, and was mostly operational within 24 hours and completely operational within 72 hours.[27] Skip Batchelor, a 20-year Red Cross veteran, said the facility would remain operational through October 2005.[28] The lifecycle of the emergency facility was, therefore, about two months.[29]

Located in an old K-Mart building, the facility houses all of the functions of a major corporation.[30] Having the appearance of large political campaign, there are hundreds of folding tables and chairs divided into work areas by function.[31] Some functional areas included:[32]

Warehousing. Approximately 30 percent of the facility served as storage location for food stuffs and supplies, including, cots, blankets, coolers, comfort kits, and meals ready to eat (MREs).

Staff Shelter. At its peak the facility housed 450 Red Cross personnel (staff and volunteers).

Transportation. The facility's parking lot was approximately 30 percent populated with large rental trucks, most supplied by Budget, which donated approximately 50 percent of the rental trucks free of charge. Numerous truck drivers reported each morning ready to drive goods to various points of service in the region. The Red Cross contracted with Shell to install an on site gasoline supply for its vehicles. The Red Cross was able to take advantage of wholesale pricing on this gasoline.

FEMA

Information Technology (IT). Work stations had computer, internet and telephony capability. There was a central IT department that supported the entire facility.

Real Estate. The Red Cross leased other facilities to serve as points of contact for client interaction. Their real estate team located and secured these properties.

Chapter Outreach. Personnel attempted to coordinate the field needs with the resources available at headquarters.

Jobs and Training. Served as a clearinghouse for job opportunities and training for the displaced.

Financial Assistance. Analysis of client needs and eligibility for financial assistance.

FEMA interface. Provided assistance in connecting victims to FEMA.

Other NGO Coordination. Personnel worked to coordinate with the other key charities and non-government organizations (NGOs) to ensure that the clients are directed to and made aware of all of the potential relief resources. The key charities that clients are referred to include: Baptist Kitchens

(food), Mennonites (home rebuilding), VOAD – Voluntary Organizations Active in Disaster (various local volunteers and other smaller relief entities, many of which are faith-based), Catholic Charities, and Habitat for Humanity (new homes).

Government Liaison. Government outreach to coordinate shelter operations, rescue and client outreach.

Volunteer Coordination. At its peak, the facility processed 45,000 volunteers.

Data Entry. There appeared to be 60 to 100 work stations for data entry, half of which are paid temporary workers and half are volunteers.

The ability of the Red Cross to rapidly open and operate such a sophisticated facility in a short amount time reflects the sophisticated planning regime the Red Cross has long had in place. The rapid standing up of the facility was described by Laura Howe a Birmingham-based Red Cross official as the equivalent of opening a Fortune 500 company in a couple days time.[33]

The Red Cross, much like FEMA, did not have a logistics capacity sophisticated enough to deal with a truly catastrophic disaster the size of Katrina

The Red Cross was dependent on FEMA and DOD to provide certain supplies—particularly food in the form of MREs—so it suffered from all the weaknesses in the FEMA and DOD supply chain discussed earlier.

The flooding of New Orleans became a reality on August 30 and the Mayor declared that "80 percent of the city is under water and media sources report the water level is still rising, due in part to broken levees and failed water pumps in the city."[34] By 8:00 a.m. on August 30, the Red Cross was operating 254 shelters for 41,013 people and serving more than 63,000 meals a day.[35] According to the Red Cross' periodic reporting documentation, these numbers continued to grow. The largest number of meals served in a day occurred on September 4, when nearly 946,000 meals were provided.[36] Figure 2 shows the Red Cross daily statistics for the number of shelters in operation, their population, and the number of meals served per day.

Figure 2:
Red Cross Service Levels By Day

Date	Number of Shelters	Population	Number of Meals	Source
August 26	6	584	1,209	DOSR #2
August 27	3	252	3,884	DOSR #4
August 28	3	244	4,454	DOSR #6
August 29	239	37,091	N/A	DOSR #9
August 30	254	41,013	63,175	DOSR #11
August 31	259	52,719	114,413	DOSR #12
September 1	275	76,453	170,465	DOSR #14
September 2	308	94,308	N/A	DOSR #17
September 3	361	96,178	137,588	DOSR #18
September 4	397	106,970	945,886	DOSR #20
September 5	413	124,617	618,938	DOSR #22
September 6	490	125,941	485,983	DOSR #24
September 7	504	143,712	669,271	DOSR #26
September 8	527	138,294	683,826	DOSR #28
September 9	510	101,381	534,864	DOSR #30
September 10	468	97,892	501,318	DOSR #32
September 11	443	88,883	491,751	DOSR #34
September 12	445	74,890	444,793	DOSR #36
September 13	348	62,931	359,816	DOSR #38

Red Cross

Figure 3 shows the daily shelter population for Louisiana, Mississippi, Alabama, and a fourth category with the shelter population in all other states.

Figure 3:
Daily Shelter Population By State

RED CROSS

The Red Cross was encouraged by its pre-landfall staging operation, deeming it largely a success.[37] That being said, the unprecedented devastation of Katrina, both in terms of property damage and number of

individuals affected, was much larger than the Red Cross was equipped to handle. Its logistics system was not sophisticated enough – especially with regard to food service. Many problems were experienced in obtaining enough food to satisfy client needs. Many of the food orders processed through FEMA were either inexplicably canceled or never satisfied. On follow-up, it was discovered that many of the orders placed by the Red Cross with FEMA were not reflected in FEMA's systems.[38] FEMA's logistics system was not sophisticated enough to handle the volume Katrina triggered.

The Red Cross experienced substantial communication issues with FEMA.[39] The Red Cross relied on FEMA to provide food, fuel, mobile refrigeration equipment, portable toilets, and many other primary necessities to operate its shelters.[40] Ordinarily these needs are requested by the Red Cross through the respective states.[41] As Katrina gathered force the Red Cross compiled requests for Louisiana, Mississippi, and Alabama among other states.[42] These requests reflected predicted need levels for food, MREs, water, fuel, and other indispensable commodities.[43] In Mississippi, the Red Cross requests were cut substantially by FEMA middle management.[44] Joseph C. Becker, Senior Vice President of Preparedness and Response told Select Committee staff that the upper management of FEMA, including Dan Craig, the Director of the Recovery Division was responsive to Red Cross needs, but the middle level personnel, who were described as "FEMA's mushy middle" proved to be unnecessarily meddlesome.[45] FEMA's middle ranks, according to Becker, canceled orders, lost orders and were the root cause of many of the problems experienced in the field.[46] MREs were ordered and were to be used to feed people during the period before the feeding kitchens were up and running.[47] These MREs were canceled by FEMA under the logic that the Red Cross had also ordered food for the kitchens.[48]

The master log of official requests made by the Red Cross to FEMA under ESF #6 further reveals the ineffective logistics system.[49] The official requests, called Action Request Forms (ARFs), are processed through the FEMA logistics system.[50] A total of 99 ARFs were submitted to FEMA by the Red Cross. Red Cross resource requests are processed through the five emergency coordination centers – the NRCC at FEMA headquarters (18 ARFs), the Regional Response Coordination Center (RRCC) for FEMA Region IV in Atlanta, Georgia (22 ARFs), the RRCC for FEMA Region VI in Denton, Texas (9 ARFs), the Joint Field Office (JFO) in Baton Rouge, Louisiana (30 ARFs), the JFO in Jackson, Mississippi (13 ARFs), and the JFO in Austin, Texas (7 ARFs).

Given the enormous nature of the Katrina relief effort, and the important role the Red Cross plays in the NRP, 99 requests is not an extraordinarily large number. FEMA, however, could not handle these requests. Only 22 of the 99 ARFs were deemed "Received" by the Red Cross, and 8 were canceled or withdrawn.

A careful review of the master log suggests that the logistics system did not work. Figure 4 is a table identifying logistics problems.

Figure 4:
Official Requests By The Red Cross to FEMA (selected).

Center	Date Requested	Resources Ordered	What Occurred
NRCC	August 30	700,000 MREs for AL and MS	Received only 400,000 and not until September 8 did 600,000 additional MREs arrive for MS.
NRCC	September 1	300,000 MREs for LA	Order canceled, then un-canceled. Product delivered on October 8.
NRCC	September 10	126 5-person security teams needed (630 total) for sites in MS	No security received.
Reg. IV	September 1-3	13 orders for "Kitchen Support," which includes refrigerator, propane, diesel, hand washing stations, porta potties, water buffalo, among other kitchen items.	Received, 10-14 days after request was approved. RC forced to purchase items independently to ensure continuous feeding.
Reg. VI	September 1	9 orders for "Kitchen Support" for Louisiana. Kitchens were for use in Alexandria, Baton Rouge, Bogor, Covington, Hammond, Kenner, and Prairieville.	Not received. Items purchased independently by Red Cross.

RED CROSS

Chapter resources and self-reliance could be buttressed by extending chapter self-reliance to 72 hours. Each chapter is generally equipped to survive on its own for

the first 48 hours. If expanded to 72 hours, FEMA should be able to assist the Red Cross at the national level in re-stocking the pipeline.[51]

The Red Cross was challenged by the sometimes disorganized manner in which shelters were established

While the Red Cross has an established role in operating shelters, many of the local governments set up ad hoc shelters without notifying the Red Cross. In other cases, the Red Cross was denied access to shelters.

The Red Cross has been criticized in both Mississippi and Louisiana for a variety of reasons, from excessive levels of bureaucracy to lack of sufficient shelters and food.[52] Becker said the root cause of many problems centered on substantial incongruities between the state and local political leadership on one hand and state emergency management personnel on the other.[53] Far too often state emergency management personnel and local political leadership were not aligned.[54] The Red Cross would receive one set of directions from the state and another from the locals.[55] Becker said, however, with independently elected sheriffs, mayors, and county and parish commissioners, this is not an easily avoidable problem.[56] Many complaints lodged at the Red Cross reflected their policy of not operating shelters in danger zones.[57] Local political leadership often feels compelled to open shelters in their locales even when the entire county or parish is subject to a mandatory evacuation order.[58] The Red Cross has trouble servicing these shelters, both from an access perspective (the roads are sometimes inaccessible) and from an identification perspective (sometimes nobody tells the Red Cross where the shelters are).[59]

The Mississippi National Guard had numerous issues with the Red Cross. The primary complaint was the Red Cross' failure to establish a formal operations section in accordance with the National Incident Management System combined with the fact that the Red Cross is staffed almost exclusively by volunteers. According to Major General Harold Cross, the Mississippi Adjutant General:

> While well intentioned, the volunteers never had a good grasp on security requirements for financial assistance distribution operations. On numerous instances, the ARC volunteers would simply find a vacant parking area and commence voucher distribution operations. Immediately, crowds would gather and would overwhelm the distribution site. The ARC would then call on the Guard for assistance. Repeated attempts were made to reinforce the need for prior coordination for site security. It was not until mid-September that the ARC started coordinating these operations. Also, the ARC had volunteers who attempted to coordinate directly with subordinate Guard units for shelter and distribution site security. The Forward EOC operations officer met with ARC representatives on numerous occasions to define the requirements for security taskings. The ARC rarely adhered to these requirements. Consequently, the National Guard stayed in a reactive mode concerning security of distribution sites and shelters and hundreds of man hours were wasted. For future events, if the ARC would position a senior operations representative in the Forward Emergency Operations Center, many of the security issues would be resolved. This senior person should not rotate every few days.[60]

Cross also recommended the integration of NGO's like the Red Cross, into the Incident Command System.

GAO has testified the Red Cross did not provide relief in certain hard-to-reach areas because of safety policies.[61] Similarly, media reports indicate the Red Cross was slow to arrive in some small rural towns.[62] The Mississippi town of Pearlington, population 1,684, received no Red Cross support for weeks.[63] A Florida state disaster team set up a shelter, but the Red Cross said it was unsafe and declined to run it.[64] In Pearlington, the Red Cross declined to operate one shelter because it lacked a dehumidifier.[65]

Far too many shelters were unknown to the Red Cross, making it difficult for it to deploy resources.[66] Many of these shelters were within the danger or surge zones, including the Superdome. The Red Cross does not service these "shelters of last resort," as it would put its volunteers in harm's way.[67] After Katrina passed, the Red Cross did attempt to deliver provisions to the Superdome, but was denied access.[68] "The Homeland Security Department has requested and continues to request that the American Red Cross not come back into New Orleans. Right now access

The Red Cross does not service these "shelters of last resort," as it would put its volunteers in harm's way.

is controlled by the National Guard and local authorities. . . . We cannot get into New Orleans against their orders," Renita Hosler, a Red Cross spokesperson, told *The Pittsburgh Post-Gazette*.[69]

The Red Cross encountered many access problems where local law enforcement would not permit entry to establish a shelter.[70] The Select Committee asked the Red Cross for an accounting of the shelters utilized as compared to the pre-approved shelter list,[71] and for the reasons behind any differences. The Red Cross provided the Select Committee with a complete list of every shelter in operation between the dates of August 25 and September 30,[72] but will not provide a specific listing explaining why certain pre-approved shelters were not used. Lori Polacheck, of the Red Cross general counsel's office said this was too difficult an undertaking.[73]

The Red Cross was challenged by the magnitude and chaos of the evacuation of people before landfall and after the flooding in New Orleans. People were moved, either by government agencies or on their own initiatives, all over the country in a haphazard way, making it difficult for the Red Cross to track and care for the needs of evacuees.

From the Red Cross' perspective, the transportation of evacuees by FEMA was disorganized and uncoordinated. As a primary provider in the feeding and sheltering of the displaced, the Red Cross needed advance notice of how many people it would be asked to serve. Many problems were reported in this area. The information communicated to the Red Cross by FEMA was unreliable. There appeared to be no correlation between the information communicated by FEMA and what actually happened.[74] Howe noted that often airplanes of evacuees would arrive without any warning. Conversely, it seemed to Howe, whenever warnings of arrivals were communicated, the arrivals often failed to materialize.[75]

This has been chronicled in the press. *The San Jose Mercury News* reported on September 8 that a plan to send 1,000 evacuees to California had been put on hold.[76] The Red Cross, Catholic Charities, and the city of San Francisco had spent days readying a shelter at St. Mary's Cathedral.[77] On September 11 *The Columbus Dispatch* reported a similar story; Columbus, Cleveland and Cincinnati were set to take 1,000 evacuees on September 8, but the in-bound flights were canceled by FEMA.[78] Evacuees were scheduled by FEMA to be transported to Ohio. Fred Strathman, a spokesman for the Ohio Emergency Management Agency, indicated to the newspaper that the plan to send evacuees to Ohio was delayed twice by FEMA and then apparently canceled.[79] A spokesman for the Red Cross of Greater Columbus, Lynn Cook said, "Are we a little tired of pumping things up and taking them back down? Yeah."[80] Similarly, *The Courier-Journal* of Louisville, Kentucky reported that on September 13, FEMA suspended evacuation flights due to the unwillingness of evacuees to relocate so far from the Gulf coast.[81] According to the newspaper, on September 5, federal officials told Louisville that 500 evacuees would be arriving at any time.[82] The Red Cross had worked to prepare a shelter and had stockpiled food and clothing.[83] All for nothing.

More than any other hurricane, Katrina has produced a large volume of seemingly permanent evacuees. The Red Cross is now finding that a large number of evacuees are not going home.[84]

The Red Cross has not escaped substantial public criticism

The Red Cross has not escaped substantial criticism.[85] The most obvious casualty of this criticism came on December 13, when its president, Marsha Evans, announced her resignation.[86] According to press accounts, even Evans acknowledged the organization's response to Katrina and Rita had been uneven, "eclips[ing] even our direst, worst-case scenarios."[87]

At a December 13 hearing conducted by the House Committee on Ways and Means Oversight Subcommittee to review the response by charities to Hurricane Katrina, Louisiana Representative Jim McCrery was extremely critical of the Red Cross:[88]

> Hurricane Katrina, and the subsequent flooding of New Orleans, displaced roughly one million

people from their homes in Southeast Louisiana. Tens of thousands of evacuees sought shelter in my district. It was clear from the beginning that the Red Cross simply did not have the sheltering capacity to meet immediate needs. Small independent shelters began popping up by the dozens across Northwest Louisiana. At the peak, there were over forty shelters in my district, while fewer than ten of those were operated by the Red Cross. Red Cross had serious trouble operating at least three of the larger shelters in my district: Hirsch Coliseum in Shreveport, LA, CenturyTel Center in Bossier City, LA, and the Health and Physical Educational Building at Northwestern State University in Natchitoches, LA.

Several days after Katrina's landfall, the American Red Cross asked a network of local churches, led by the First Assembly of God, to take over the Red Cross Shelter at Hirsch Coliseum in Shreveport, LA. Steve Beyer, an Associate Pastor with one of the churches, agreed to manage the shelter until a replacement Red Cross manager could be found. No one replaced him. Mr. Beyer operated the Hirsch Coliseum shelter, where 6,200 people came through its doors, with only two Red Cross volunteers for the first two weeks. The Red Cross asked church volunteers to wear Red Cross shirts, I suppose to give the appearance that Red Cross was operating the shelter.

The CenturyTel Center in Bossier City, LA, opened as an independent shelter one week after the storm in response to overwhelming need for additional sheltering capacity. CenturyTel operated on the backs of local government and community organizations while it waited for certification from the American Red Cross. Even after the American Red Cross moved in, local charities provided all of the food for seven days until Red Cross could secure food....

The American Red Cross shelter at Northwestern State University was managed by the City of Natchitoches and the Natchitoches Parish Sheriff's Department in conjunction with the University. Dr. Bill Dickens, the shelter's manager, had one Red Cross volunteer to help service the 1,000 evacuees housed each night at the site for the first 10 days following the storm. I should note that it took seven days for this shelter to receive any of the $60,000 in new bedding that was donated to the local Red Cross chapter by General Motors. The bedding sat unused in a Red Cross facility seventy miles away in Shreveport, LA, despite the fact that some evacuees in Natchitoches were sleeping on the floor. The failure to get these resources to the shelter in a timely fashion represents an inexcusable breakdown in communication and coordination within the Red Cross.

While the Red Cross could barely manage its own network of shelters, the organization offered little assistance to struggling independent shelters. Dennis Butcher, the Office of Emergency Preparedness Director for Claiborne Parish, was instructed by the Red Cross to fend for himself. Mr. Butcher operated an independent shelter of 1,200 evacuees for over a month without any assistance from the Red Cross. I wish Mr. Butcher's experience was unique, but the Red Cross also refused requests for assistance from the Office of Emergency Preparedness Directors for Claiborne, Sabine, Vernon and Webster Parishes. I also spoke with OEP and other officials on the Mississippi Gulf Coast who experienced similar treatment from the Red Cross.[89]

But Katrina was bigger than the Red Cross

The response to Hurricane Katrina has been more complex than any previous Red Cross-involved disaster. The string of 2004 hurricanes in Florida was the previous benchmark, when the Red Cross provided financial assistance to 73,000 families. During Katrina, the number is up to 1.2 million families. In 2004 it provided 519,000 nights of shelter. During Katrina the figure currently stands at 3.42 million. The 2004 hurricanes were attended to by 35,000 volunteers; Katrina required 220,000 volunteers.[90] The total estimated expenditures by the Red Cross for Katrina-related aid is in excess of $2 billion.

Figure 5 compares Katrina and Rita to Hurricane Season 2004.[91]

Figure 5:

Hurricane Season 2004 v. Katrina and Rita

Category	Hurricane Season 2004	Katrina and Rita
Shelter Nights	519,000	3.42 million
No. of Families Provided With Financial Support	73,000	1.2 million
Meals and Snacks Provided	Close to 16.5 million	More than 52.6 million
Total Spent	$130 million	$2 billion

RED CROSS

This $2 billion operation must be contrasted with the Red Cross' overall financial model. According to its 2004 Annual Report, its operating revenues were just over $3 billion.[92] In 2004, its stated operating expenses for domestic disaster services was $261 million. It is unrealistic to expect any charitable relief organization to instantaneously pivot in response to the might inflicted by Katrina. As Katrina was too large for the emergency management professionals in the state of Louisiana, the city of New Orleans, and FEMA, it was as well for the Red Cross.

The Red Cross readily agrees it did not have a presence everywhere throughout the affected region.[93] The primary mission of the Red Cross is to provide food, clothing, and shelter to victims of disasters.[94] Given its size, there are misconceptions about its capabilities.[95] The Red Cross does not provide transportation, does not get involved with search and rescue operations, does not participate in evacuations, and does not provide medical care (other than providing assistance with minor medical issues).[96]

In testimony before the House Committee on Ways and Means Oversight Subcommittee, the Red Cross' Becker said, "we fell short of being universally present everywhere there was a need."[97] He continued, "Given the number of people in need, our response was geared toward places that we knew we could get to immediately and places where we knew people were congregated. It was our goal to reach the greatest number of people with the most possible speed."[98]

The Red Cross does not provide transportation, does not get involved with search and rescue operations, does not participate in evacuations, and does not provide medical care (other than providing assistance with minor medical issues).

As a leading provider of food and shelter to those affected by Katrina, the Red Cross is often asked why it was not active within New Orleans, whether it be on the ground, co-located with the search and rescue teams, or in the shelters of last resort such as the Convention Center and the Superdome. Becker addressed this in his testimony:[99]

> There were a number of questions regarding why we did not re-enter the City of New Orleans. The American Red Cross of Southeast Louisiana, located in the City of New Orleans, heeded the evacuation order called for by local authorities. The chapter relocated to the town of Covington, located on the north side of Lake Pontchartrain. Our service delivery in New Orleans differed from that provided to other affected areas in Alabama, Louisiana, and Mississippi. Under the Louisiana State Plan, if a Category 3 or higher storm is headed for Louisiana, 23 parishes, including Orleans Parish, are to begin an evacuation inland. The inland parishes, in cooperation with state agencies and the American Red Cross, are to shelter evacuees from "Risk Area Parishes," as there are no shelter sites that meet hurricane safety criteria within Orleans Parish. In fact, it has been the policy of the Red Cross that there are no safe areas south of the I-10/I-12 corridor for a large scale hurricane. The Louisiana Plan, which makes no reference to the Red Cross operating shelters within the city, enumerates eight distinct shelter types, plus what is described as the "Refuge of Last Resort." The Convention Center and the Superdome served as refuges of last resort. Under state plans, these facilities are to open when local authorities terminate an evacuation due to unsafe driving conditions. These facilities are not operated by the Red Cross. In practice, after the threat has passed, the Red Cross at times staffs shelters of last resort, providing services to people. We do not establish

shelters in facilities that do not meet our criteria for safety during landfall.

Consistent with State and local plans, and our practice in previous disasters, we were asked by state and federal officials not to enter New Orleans. While we were in constant communication with local and state authorities, it was not deemed safe for Red Cross personnel to re-enter the city of New Orleans. The Red Cross does not place our client evacuees, staff, volunteers, or resources in harm's way. It is our practice to heed evacuation orders and assist those in need of shelter outside of high-risk areas.

Additionally, it was the goal of local and state officials to fully evacuate the city of New Orleans after the storm passed. We were instructed by authorities that, in addition to issues of safety, if the Red Cross provided services to survivors within New Orleans, it would discourage people from heeding evacuation orders. At the direction of public officials, we entered New Orleans in a coordinated fashion to provide services at the earliest possible time.

This was a difficult scenario for the Red Cross. Eighty percent of our local Red Cross staff in the Southeast Louisiana Chapter lost their homes to Katrina, yet while they themselves were victims, they desperately wanted to provide support to their neighbors in need, and to this day they continue to do so. We are still engaged in active operations in the city.

Important assistance was provided by the Salvation Army, Catholic Charities, the United Way, and the National Voluntary Organizations Active in Disaster

As the only charitable organization with primary responsibility under the NRP, the Red Cross received a lot of Select Committee attention. Beyond the Red Cross, however, there was a vast network of charities that contributed meaningfully to the response efforts in the Gulf coast area. The important contributions of organizations such as the Salvation Army, Catholic Charities USA, the United Way, and the National Voluntary Organizations Active in Disaster (NVOAD) merit attention.

FEMA

Salvation Army

The Salvation Army has been at the site of most major natural disasters in America for more than a century.[100] It has developed areas of expertise in disaster response: mass feeding to survivors and emergency responders immediately after a disaster has occurred; sheltering those affected while tending to their spiritual and emotional needs; and then, the continuation of social service assistance to ensure the survivors have the means to move back into some semblance of the routine known before the disaster struck.[101]

In responding to those affected by Hurricane Katrina, the Salvation Army staged personnel and equipment in the states adjacent to the primary strike zone. Major Todd Hawks of the Salvation Army, summarized some of the key contributions the Salvation Army made to immediate response efforts:

- Loaded meals on 72 mobile canteens, each capable of providing 5,000 hot meals per day, and two 54-foot mobile kitchens, each capable of providing 20,000 hot meals per day. We intended to dispatch these mobile feeding units into those geographic areas determined by FEMA to be the hardest hit, and to dispatch additional units as needed.
- Mobilized 200 officers, employees, and volunteers to man these mobile kitchens.
- Prepared to dispatch portable shower units, trucks transformed into 1-stop shops called comfort stations, and emergency response command stations for officers to direct the response efforts.[102]

In the immediate aftermath of Katrina, the Salvation Army facilitated mass feeding, moving mobile feeding units into New Orleans, Biloxi, Gulfport, Mobile and numerous other affected communities within hours after the storm had passed.[103] In total the number of mobile canteens deployed numbered 178 and the number of field kitchens reached 11.[104] Since Katrina struck, the Salvation Army has served more than 5 million hot meals and more than 7 million sandwiches and snacks to survivors and first responders.[105] Although not a primary activity for the Salvation Army, at its highest point, it operated 225 shelters for more than 31,000 people.[106]

Catholic Charities

Catholic Charities USA is the membership association of one of the nation's largest social service networks. Catholic Charities agencies provide vital social services to people in need, regardless of their religious, social, or economic backgrounds.[107] As of January 6, 2006, Catholic Charities had allocated more than $56 million to over 60 local Catholic Charities and other Catholic organizations responding to the needs of families affected by the Gulf coast hurricanes.[108] In total, Catholic Charities USA has raised $137 million to assist the network's largest disaster response effort in its history.[109] Dozens of Catholic Charities agencies and Catholic organizations have each received disaster relief grants from Catholic Charities USA, ranging from $6,000 to $25 million.[110] Across the nation, more than 80 local Catholic Charities are working to meet the needs of hurricane victims.[111] Relief efforts have included: providing victims with food, financial aid, clothing, shelter, gas and retail store cards, and household goods; helping with medical and prescription needs; offering clean up assistance; helping victims work with FEMA and other groups; and providing crisis counseling, case management, transportation, job placement, and temporary and long-term housing.[112]

FEMA

United Way

United Way of America is the national organization that provides leadership to approximately 1,350 community-based United Way organizations. Each is independent, separately incorporated, and governed by local volunteers.[113] As of December 15, 2005, the United Way of America has raised $45 million to support hurricane response and recovery efforts.[114] Through its Hurricane Response and Recovery Fund, the United Way has focused its efforts on restoring the abilities of social service agencies in the Gulf coast region.[115] Many human services organizations in the Gulf coast states suffered tremendous damage to their facilities, which severely limited their ability to provide services to those in need.[116] United Ways throughout the affected areas have worked with partner agencies to ensure services such as emergency assistance, food, clothing, housing and transportation are available to those in need.[117]

National Voluntary Organizations Active in Disaster (NVOAD)

NVOAD is a national charity umbrella organization composed of approximately 40 charities that provide services following disasters.[118] As a designated support agency under ESF #6, NVOAD is responsible for sharing information with its member organizations regarding the severity of the disaster, needs identified, and actions taken to address these needs.[119] NVOAD coordinates planning efforts by many voluntary organizations responding to disaster.[120] Member organizations provide a more effective and efficient service to the community in need by agreeing to share information and combine resources.[121] This cooperation has proven to be an effective way for a multitude of organizations to work together in during an emergency.[122]

During the immediate response to Katrina, NVOAD organized daily conference calls with FEMA and other federal government representatives and its member

FEMA

organizations operating in the Gulf coast region.[123] NVOAD also invited nonmember charitable organizations that were providing relief to hurricane victims to participate in these calls, which sometimes included more than 40 organizations at once. During these calls, both the federal government and charities were able to provide information and answer questions about services provided, needs identified, and the organizations' abilities to meet these needs.[124]

Conclusion

Since August 29, charitable donations to Katrina relief have exceeded $3 billion. Two-thirds of this amount has been raised by the Red Cross. With its $2 billion relief effort, the Red Cross has been able to fulfill many of its obligations under the National Response Plan. Katrina, however, overwhelmed the Red Cross. The Red Cross, like FEMA, did not have a logistics capacity sophisticated enough to fully support the massive number of Gulf coast victims. Among other challenges, the Red Cross was required to grapple with the sometimes disorganized manner in which shelters were established. While it has a well-defined role in operating shelters, many of the local governments set up ad hoc shelters without notifying Red Cross officials. In some cases, the Red Cross was denied access to shelters. Despite falling short of being universally present everywhere there was a need, the Red Cross and numerous other charitable organizations performed admirably and heroically in reaching the greatest number of people with impressive speed. ■

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[2] *Hearing to Review the Response by Charities to Hurricane Katrina Before Subcommittee on Oversight of the House Committee on Ways and Means*, 109th Cong. (Dec. 13, 2005) (written statement of Cynthia M. Fagnoni, Managing Dir., Educ., Workforce and Income Sec., U.S. Gov. Accountability Office) [hereinafter *Dec. 13, 2005 Ways and Means Oversight Hearing (*written statement of Cynthia Fagnoni)].

[3] American Red Cross, *Facts at a Glance*, http://www.redcross.org/news/ds/hurricanes/2005/facts.html (Jan. 12, 2006) [hereinafter Jan. 12, 2006 Red Cross Facts at a Glance].

[4] Center on Philanthropy – Donations; Center on Philanthropy – Spreadsheet.

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[6] Press Release, United Way, *United Way Receives $10 Million Grant From Lilly Endowment For Hurricane Recovery and Rebuilding*, Nov. 3, 2005 at http://national.unitedway.org/files/pdf/press_releases/Lilly_Endowment_Grant_FINAL_Nov_2005.PDF [hereinafter Nov. 3, 2005 United Way Press Release].

[7] *Dec. 13, 2005 Ways and Means Oversight Hearing* (written statement of Cynthia Fagnoni).

[8] *Id*.

[9] Jan. 12, 2006 Red Cross Facts at a Glance.

[10] American Red Cross, *Facts at a Glance*, http://www.redcross.org/news/ds/hurricanes/2005/facts.html (Jan. 9, 2006) [hereinafter Jan. 9, 2006 Red Cross Facts at a Glance].

[11] The Southern Baptist Convention provides the manpower and the kitchens, and the Red Cross provides supplies and logistics. Gabrielle DeFord and Maryann Sinkler, *Southern Baptists Help Feed Millions After Katrina*, Sept. 14, 2005, http:www.redcross.org.

[12] Jan. 9, 2006 Red Cross Facts at a Glance.

[13] *Hearing to Review the Response by Charities to Hurricane Katrina Before Subcommittee on Oversight of the House Committee on Ways and Means*, 109th Cong. (Dec. 13, 2005) (written statement of Joseph C. Becker, Senior Vice President Preparedness and Response, American Red Cross) [hereinafter *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Joseph C. Becker)].

[14] E-mail correspondence from Carol Hall, American Red Cross, to Kirstjen M. Nielsen, et al. (Aug. 27, 2005) (2:48 p.m.) [hereinafter Aug. 27, 2005 Hall E-mail].

[15] A complete list of all pre-approved shelters for Louisiana, Mississippi and Alabama was supplied to the Select Comm. The establishment of shelters is carefully planned for and part of the chapter disaster planning regime. See ARC 4496, Standards for Hurricane Evacuation Shelter Selection (Jan. 2002); ARC Shelter Operations Management Toolkit (Sept. 2005); Complete Shelter Listings for Alabama, Mississippi, and Louisiana.

[16] Aug. 27, 2005 Hall E-mail.

[17] American Red Cross, *Disaster Operations Summary Report (DOSR)* #7 at 2 (Aug. 28, 2005).

[18] American Red Cross, DOSR#7 at 3 (Aug. 28, 2005).

[19] American Red Cross, DOSR#9 at 3 (Aug. 29, 2005).

[20] *Id*. at 2.

[21] *Id*. at 1.

[22] Interview by Select Comm. Staff with Laura Howe and Skip Batchelor, American Red Cross, in Montgomery, AL (Oct. 11, 2005) [hereinafter Oct. 11, 2005 Red Cross Interview].

[23] *Id*.

[24] *Id*.

[25] *Id*.

[26] *Id*.

[27] *Id*.

[28] *Id*.

[29] *Id*.

[30] *Id*.

[31] *Id*.

[32] *Id*.

[33] *Id*.

[34] American Red Cross, DOSR#11 at 2 (Aug. 30, 2005).

[35] *Id*. at 1.

[36] American Red Cross, DOSR#20 at 3 (Sept. 4, 2005).

[37] Oct. 11, 2005 Red Cross Interview; Interview by Select Comm. Staff with Joseph C. Becker, Sr. Vice Pres., Preparedness and Response, American Red Cross, in Wash., DC (Oct. 14, 2005) [hereinafter Oct. 14, 2005 Red Cross Interview].

[38] Oct. 11, 2005 Red Cross Interview; Oct. 14, 2005 Red Cross Interview.

[39] Oct. 14, 2005 Red Cross Interview.

[40] *Id*.

[41] *Id*.

[42] *Id*.

[43] *Id*.

[44] *Id*.

[45] *Id*.
[46] *Id*.
[47] *Id*.
[48] *Id*.
[49] American Red Cross, ESF #6 Master Log at 2 (Dec. 22, 2005).
[50] *Id*.
[51] Oct. 11, 2005 Red Cross Interview; Oct. 14, 2005 Red Cross Interview.
[52] Oct. 14, 2005 Red Cross Interview.
[53] *Id*.
[54] *Id*.
[55] *Id*.
[56] *Id*.
[57] The Select Comm. reviewed planning documentation from individual Red Cross chapters. Disaster Response Plans were submitted from the following Red Cross chapters: Southeastern Louisiana (June 205), St. Bernard Parish Chapter (undated), Northwest Louisiana Chapter (June 2005), Northeast Louisiana Chapter (June 2005), Central Louisiana Chapter (Apr. 2002), South Central Mississippi Chapter (Sept. 2004), Mississippi Gulf Coast Chapter (Sept. 2005), Southeast Mississippi Chapter (Feb. 2003), and Alabama Gulf Coast Chapter (Jan. 1997). Statewide plans were received from the Red Cross in Alabama and Mississippi. The Red Cross is now organized into eight Service Areas, rather than by state. The state plans obtained by the Select Comm. from Alabama and Mississippi are now technically obsolete.
[58] Oct. 14, 2005 Red Cross Interview.
[59] *Id*.
[60] *Hearing on Hurricane Katrina: Preparedness and Response by the Department of Defense, the Coast Guard, and the National Guard of Louisiana, Mississippi, and Alabama Before the Select Comm.*, 109th Cong. (Oct. 27, 2005) (written response to questions for the record of Maj. Gen. Harold A. Cross, the Adjutant General, State of Mississippi.); Mississippi National Guard, Hurricane Katrina Narrative, Daily Logs (Aug. 2005 – Nov. 2005).
[61] *Dec. 13, 2005 Ways and Means Oversight Hearing* (written statement of Cynthia Fagnoni).
[62] Martha T. Moore, *Red Cross in Critics' Cross Hairs*, USA TODAY, Oct. 17, 2005 [hereinafter Oct. 17 Moore Article].
[63] *Id*.
[64] *Id*.
[65] *Id*.
[66] Oct. 14, 2005 Red Cross Interview.
[67] *Id*.
[68] Oct. 14, 2005 Red Cross Interview; *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Joseph C. Becker).
[69] Ann Rodgers, *Homeland Security Won't Let Red Cross Deliver Food*, PITTSBURGH POST-GAZETTE, Sept. 3, 2005; *Dec. 13, 2005 Ways and Means Oversight Hearing* (Statement of Joseph C. Becker).
[70] Oct. 11, 2005 Red Cross Interview; Oct. 14, 2005 Red Cross Interview.
[71] Pre-approved Shelter Listings for Alabama, Mississippi, and Louisiana.
[72] Hurricane Katrina Daily Shelter Populations, American Red Cross, Aug. 25, 2005 to Sept. 30, 2005.
[73] Telephone Interview by Select Comm. Staff with Lori Polacheck, Senior Counsel, American Red Cross, Wash., DC (Jan. 23, 2005).
[74] Oct. 14, 2005 Red Cross Interview.
[75] *Id*.
[76] Mary Anne Ostrom and Chuck Carroll, *Feds Hold Off On Sending 1,000 Evacuees to California; Families Want to Remain Closer to Home*, SAN JOSE MERCURY NEWS, Sept. 8, 2005 [hereinafter Sept. 8, 2005 Ostrom Article].
[77] Sept. 8, 2005 Ostrom Article.
[78] Robert Vitale, *With Few Evacuees Interested, Flights to Ohio Canceled*, THE COLUMBUS DISPATCH, Sept. 11, 2005 at A21 [Sept. 1, 2005 Vitale Article].
[79] Sept. 1, 2005 Vitale Article.
[80] *Id*.
[81] Chris Kenning, *Evacuee Airlift Not Coming To City*, THE COURIER-JOURNAL (Louisville, KY), Sept. 14, 2005 at 1B [Sept. 14, 2005 Kenning Article].
[82] Sept. 14, 2005 Kenning Article.
[83] *Id*.
[84] Oct. 11, 2005 Red Cross Interview; Oct. 14, 2005 Red Cross Interview.
[85] *See generally*, Editorial, *Red Cross Operations Due For A Tune-Up*, MIAMI HERALD, Jan. 3, 2006 at A16; Jacqueline L. Salmon, *Red Cross Bolstering Minority Outreach; Recruitment a Priority After Storms Expose Sensitivity Gaps*, THE WASH. POST, Dec. 5, 2005 at A1; Jacqueline L. Salmon and Elizabeth Williamson, *Red Cross Borrowing Funds For Storm Aid – Loan of $340 Million Comes as Nonprofit Draws New Scrutiny*, THE WASH. POST, Oct. 28, 2005 at A1; Oct. 17 Moore Article; Josh Getlin et al., *A Long Road To Recovery; Red Cross' Huge Effort Not Without Critics; Defenders Say The Scope Of The Storms Pushed The Short-Term Aid Expert Out Of Its League*, LA TIMES, Oct. 7, 2005, A1; Josh Getlin et al., *Fundraising Phenom – Red Cross – Is Under Fire*, LA TIMES, Oct. 6, 2005; Chad Terhune, *Along Battered Gulf, Katrina Aid Stirs Unintended Rivalry, Salvation Army Wins Hearts, Red Cross Faces Critics; Two Different Missions*, THE WALL STREET JOURNAL, Sept. 29, 2005 at A1; Associated Press, *Despite Katrina Efforts, Red Cross Draws Criticism*, USA TODAY, Sept. 28, 2005; Sean Gregory, *Trying To Get It Right This Time*, TIME, Sept. 26, 2005 at 24.
[86] Press Release, American Red Cross, *Marsha J. Evans Steps Down As American Red Cross President and CEO* (Dec. 13, 2005).
[87] David Cary, *American Red Cross President Resigns*, AP, Dec. 14, 2005.
[88] *Hearing to Review the Response by Charities to Hurricane Katrina Before Subcommittee on Oversight of the House Committee on Ways and Means*, 109th Cong. (Dec. 13, 2005) (statement of The Honorable Jim McCrery) [hereinafter *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Rep. McCrery)].

[89] *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Rep. McCrery).
[90] Oct. 14, 2005 Red Cross Interview; Facts at a Glance, American Red Cross website (Jan. 9, 2006), http://www.redcross.org/news/ds/hurricanes/2005/facts.html.
[91] *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Joseph C. Becker).
[92] American Red Cross, *2004 Annual Report* at 8. For a third party view of the Red Cross' finances, *see* Charity Navigator, http://www.charitynavigator.org.
[93] *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Joseph C. Becker).
[94] Oct. 14, 2005 Red Cross Interview.
[95] *Id.*
[96] *Id.*
[97] *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Joseph C. Becker).
[98] *Id.*
[99] *Id.*
[100] *Hearing to Review the Response by Charities to Hurricane Katrina Before Subcommittee on Oversight of the House Committee on Ways and Means*, 109th Cong. (Dec. 13, 2005) (statement of Major Todd Hawks, Public Affairs Secretary and Associate National Community Relations and Development Secretary, Salvation Army of America) [hereinafter *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Todd Hawks)].
[101] *Dec. 13, 2005 Ways and Means Oversight Hearing* (statement of Todd Hawks).
[102] *Id.*
[103] *Id.*
[104] *Id.*
[105] *Id.*
[106] Nov. 3., 2005 United Way Press Release.
[107] Catholic Charities, About, http://www.catholiccharitiesusa.org/about/index.cfm?cfid=6359238&cftoken=12248968.
[108] Press Release, Catholic Charities USA, *Catholic Charities USA, 13 Other Major Nonprofits Reaffirm Commitment to Human Needs Aspect of Gulf Coast Recovery* (Jan. 6, 2005), http://www.catholiccharitiesusa.org/news/content_displays.cfm?fuseaction=display_document&id=743&location=3 [hereinafter Jan. 6, 2005 Catholic Charities Press Release].
[109] Jan. 6, 2005 Catholic Charities Press Release.
[110] *Id.*
[111] *Id.*
[112] *Id.*
[113] Press Release, American Red Cross, *Salvation Army, and United Way, American Red Cross, Salvation Army, and United Way 'Put People First' When Addressing Needs Of Hurricane Katrina Victims – Three Organizations Prepare for Next Disaster* (Sept. 23, 2005) [hereinafter Sept. 23, 2005 Joint Press Release].
[114] Center on Philanthropy – Donations; Center on Philanthropy – Spreadsheet.
[115] Nov. 3, 2005 United Way Press Release.
[116] *Id.*
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[118] Members of NVOAD are: Adventist Community Services, America's Second Harvest, American Baptist Men USA, American Disaster Reserve, American Radio Relay League, Inc. (ARRL), American Red Cross, Ananda Marga Universal Relief Team (AMURT), Catholic Charities USA, Center for International Disaster Information (formerly Volunteers in Technical Assistance), Christian Disaster Response, Christian Reformed World Relief Committee (CRWRC), Church of the Brethren-Emergency Response, Church World Service, Convoy of Hope, Disaster Psychiatry Outreach, Episcopal Relief and Development, Friends Disaster Service, Inc., Humane Society of the United States International Aid, International Critical Incident Stress Foundation, International Relief Friendship Foundation (IRFF), Lutheran Disaster Response, Mennonite Disaster Service, Mercy Medical Airlift (Angel Flight), National Emergency Response Team, National Organization for Victim Assistance, Nazarene Disaster Response, Northwest Medical Teams International, Presbyterian Church (USA), REACT International, Inc., Society of St. Vincent de Paul, Southern Baptist Convention, The Points of Light Foundation, The Salvation Army, United Church of Christ-Wider Church Ministries, United Jewish Communities, United Methodist Committee on Relief, United Way of America, Volunteers of America, and World Vision. *See* NVOAD, Members, http://www.nvoad.org/membersdb.php?members=National.
[119] *Dec. 13, 2005 Ways and Means Oversight Hearing* (written statement of Cynthia Fagnoni); NVOAD, About, http://www.nvoad.org/about.php [hereinafter Website Materials, About NVOAD].
[120] *Id.*
[121] *Id.*
[122] *Id.*
[123] *Id.*
[124] *Id.*

"Order is indeed the dream of man,
but chaos, which is only another word for dumb, blind, witless chance,
is still the law of nature."

WALLACE STEGNER
Crossing to Safety

"Nature, to be commanded, must be obeyed."

FRANCIS BACON

CONCLUSION

The preparation for and response to Hurricane Katrina should disturb all Americans. While the Select Committee believes all people involved, at all levels of government, were trying their best to save lives and ease suffering, their best just wasn't good enough.

In this report we have tried to tell the story of the inadequate preparation and response. We cover a lot of territory – from evacuations to medical care, communications to contracting. We hope our findings will prompt the changes needed to make all levels of government better prepared and better able to respond the next time.

The resolution that created the Select Committee charged us with compiling findings, not recommendations. But in reality that's a distinction without a difference. Moving from our findings to legislative, organizational, and policy changes need not be a long or difficult journey.

We are left scratching our heads at the range of inefficiency and ineffectivness that characterized government behavior right before and after this storm. But passivity did the most damage. The failure of initiative cost lives, prolonged suffering, and left all Americans justifiably concerned our government is no better prepared to protect its people than it was before 9/11, even if we are.

How can we set up a system to protect against passivity? Why do we repeatedly seem out of synch during disasters? Why do we continually seem to be one disaster behind?

We have not found every fact nor contemplated all successes and failures. What we have done over four months is intensely focus on a three-week period, uncovering a multitude of problems. We have learned more than enough to instruct those who will now have to craft and execute changes for the future.

We leave it to readers to determine whether we have done a fair and thorough job, and whether we identified and supported findings in a way that will foster change. Some predicted we would place disproportionate blame on one person or another, or that we would give some others a pass. We hope it is clear we have done neither.

We have not sought to assign individual blame, though it is clear in our report that some were not up to the challenge that was Katrina. Rather, we have tried to tell the story of government's preparation for and response to a massive storm, and identify lessons learned.

Our interaction with the White House illustrates this point. Some insist the White House's failure to provide, for example, e-mails to and from the White House Chief of Staff means we have insufficient information to determine why government failed. That view exalts political curiosity over the practical realities of a serious investigation.

While our dealings with the White House proved frustrating and difficult, we ended up with more than enough information to determine what went wrong there, to form a picture of a White House that, like many entities, was overcome by the fog of war. There is a big difference between having enough information to find institutional fault, which we do, and having information to assign individual blame, which, in the case of the White House, in large part we do not.

It's the former that's important if the goal is to be better prepared the next time. This was not about some individual's failure of initiative. It was about organizational and societal failures of initiative. There was more than enough failure to go around:

- Tardy and ineffective execution of the National Response Plan.
- An under-trained and under-staffed Federal Emergency Management Agency.
- A Catastrophic Incident Annex that was never invoked, and doubt that it would have done the job anyway.
- A perplexing inability to learn from Hurricane Pam and other exercises.
- Levees not built to withstand the most severe hurricanes.
- An incomplete evacuation that led to deaths and tremendous suffering.
- A complete breakdown in communications that paralyzed command and control and made situational awareness murky at best.
- The failure of state and local officials to maintain law and order.
- Haphazard and incomplete emergency shelter and housing plans.
- An overwhelmed FEMA logistics and contracting system that could not support the effective provision of urgently needed supplies.

The Select Committee encountered shortcomings and challenges even among those response elements that went relatively well and saved many lives. The military performed an invaluable role once forces were deployed, but encountered coordination problems with FEMA, the National Guard, and state officials. State-to-state emergency aid compacts were critical in restoring law and order and accelerating relief supplies, but too many people remain unfamiliar with the process. Contributions from charitable groups were enormously helpful, but they too were overwhelmed by the size of the storm.

Many of our findings are mixed in nature. Evacuations of general populations, for example, went relatively well in all three states. But declarations of mandatory evacuations in metropolitan New Orleans came late or not at all, and that, coupled with the decision to shelter but not evacuate the remaining population prolonged suffering. We saw heroic examples of medical care and patient needs being met under dire circumstances. But too often the deployment of medical personnel was reactive, not proactive.

The Select Committee acknowledges it was often torn between sympathy and incredulity, compassion and criticism. On the one hand, we understood Katrina was so big and so devastating that death and chaos were inevitable. We understood that top federal, state, and local officials overlooked some steps and some needs in the hours and days after landfall because they were focused on saving lives. But on the other hand, a dispassionate review made it clear that even an extraordinary lack of situational awareness could not excuse many of the shortcomings and organizational inaction evident in the documents and communications the Select Committee reviewed.

Leadership requires decisions to be made even when based on flawed and incomplete information. Too often during the immediate response to Katrina, sparse or conflicting information was used as an excuse for inaction rather than an imperative to step in and fill an obvious vacuum. Information passed through the maze of departmental operations centers and ironically-named "coordinating" committees, losing timeliness and relevance as it was massaged and interpreted for internal audiences.

As a result, leaders became detached from the changing minute-to-minute realities of Katrina. Information translated into pre-cast bureaucratic jargon put more than geographic distance between Washington and the Gulf coast. Summaries and situation reports describing the gross totals of relief supplies directed to affected areas did not say when or how or to whom those desperately needed supplies would be delivered. And apparently no one asked.

Communications aren't a problem when you're only talking to yourself.

The Select Committee believes too many leaders failed to lead. Top aides failed as well, primarily in mis-prioritizing their bosses' attention and action. Critical time was wasted on issues of no importance to disaster response, such as winning the blame game, waging a public relations battle, or debating the advantages of wardrobe choices.

We have spared our readers a rehashing of unflattering e-mails involving Michael Brown and Governor Blanco and others, as they have been given more than enough attention by the media. We will pause only briefly here to urge future responders to make people, not politics, their priority.

We further urge public officials confronting the next Katrina to remember disaster response must be based on knowledge, not rumors. Government at all levels lost credibility due to inaccurate or unsubstantiated public statements made by officials regarding law and order, levee breaches, and overall response efforts.

The media must share some of the blame here. The Select Committee agrees the media can and should help serve as the public's "first informer" after disasters. In the 21st century, Americans depend on timely and accurate reporting, especially during times of crisis. But it's clear accurate reporting was among Katrina's many victims. If anyone rioted, it was the media. Many stories of rape, murder, and general lawlessness were at best unsubstantiated, at worst simply false. And that's too bad, because this storm needed no exaggeration.

As discussed in our report, widely-distributed uncorroborated rumors caused resources to be deployed, and important time and energy wasted, chasing down the imaginary. Already traumatized people in the Superdome and elsewhere, listening to their transistor radios, were further panicked.

"The sensational accounts delayed rescue and evacuation efforts already hampered by poor planning and a lack of coordination among local, state, and federal

agencies. People rushing to the Gulf coast to fly rescue helicopters or to distribute food, water and other aid steeled themselves for battle. In communities near and far, the seeds were planted that the victims of Katrina should be kept away, or at least handled with extreme caution," the *Washington Post* reported on October 5.[1]

Lt. Gen. H. Steven Blum told the Select Committee on October 27, "We focused assets and resources based on situational awareness provided to us by the media, frankly. And the media failed in their responsibility to get it right. …we sent forces and capabilities to places that didn't need to go there in numbers that were far in excess of what was required, because they kept running the same B roll over and over….and the impression to us that were watching it was that the condition did not change. But the conditions were continually changing."[2]

E-mails obtained by the Select Committee reinforce the conclusion that top military officials were relying on news reports for information – information used to plan and deploy resources.[3]

The Select Committee does not mean to suggest the media is solely responsible for responders' lack of situational awareness, or the destruction of communications infrastructure that thrust television into the role of first informer for the military as well as the general public. Nor is the media solely responsible for reporting comments from sources they believed to be credible – especially top officials.

The Select Committee does, however, believe such circumstances make accurate reporting, especially in the period immediately after the storm, all the more important. Skepticism and fact-checking are easier when the sea is calm, but more vital when it is not.

As with so many other failures related to Katrina, what's most vexing is that emergency managers should have known such problems would arise among the chaos. Dr. Kathleen Tierney, head of the University of Colorado-Boulder Natural Hazards Center, told Select Committee staff that misleading or completely false media reports should have been among the most foreseeable elements of Katrina. "It's a well-documented element of disaster response," she said. "What you do has to be based on knowledge, not rumor, and you're going to be faced with a lot of rumors."[4]

Benigno Aguirre, sociology professor at the University of Delaware Disaster Research Center, told the *Philadelphia Inquirer*, "It's discouraging for those who spend their lives studying disaster behavior that journalists so often get it wrong."[5]

Former FEMA Director Michael Brown told the Select Committee one of his biggest failures was failing to properly utilize the media as first informer.

"I failed initially to set up a series of regular briefings to the media about what FEMA was doing throughout the Gulf coast region," Brown said at the Select Committee's September 27 hearing. "Instead, I became tied to the news shows, going on the news shows early in the morning and late at night, and that was just a mistake. We should have been feeding that information to the press…in the manner and time that we wanted to, instead of letting the press drive us."[6]

Finally, a word about public communications. Both the message and the messengers were ineffective before and after Katrina. Messages to the public were uncoordinated and often confusing, leaving important questions unanswered. Federal, state, and local officials did not have a unified strategy for communicating with the public.

Risk communication is a well-researched field of study. There are accepted core principles for successfully communicating risks to the public. Information about threats should be consistent, accurate, clear, and provided repeatedly through multiple methods. It should be timely. It should be specific about the potential threat. It needs to get to people regardless of their level of access to information.

The Select Committee heard loud and clear from Gulf coast residents that the dangers of the coming hurricane could have been presented in a more effective manner, an issue which also carried racial and socioeconomic implications. If people don't hear a message from someone they trust, they will be skeptical.

Doreen Keeler, a New Orleans resident who evacuated before Mayor Nagin called for a mandatory evacuation, told the Select Committee local officials should have called for mandatory evacuations earlier, noting how difficult it was to convince the elderly residents of New Orleans to leave.[7] "If a mandatory evacuation would have been called earlier," she said, "it would have been easier to move seniors out of the area and many lives would have been saved. It took me almost 24 hours to get my in-laws to leave. Others tell the same story. The severity of the storm was not stressed by elected officials."[8]

The relevant "elected officials," we are sure, would contest that. In fact they did, in testimony before the Select Committee. But it's the public perception of what was stressed that's important here. The failure of initiative was also a failure of empathy, a myopia to the need to reach more people on their own terms.

Four and half years after 9/11, Americans deserve more than the state of nature after disaster strikes. With this report we have tried to identify where and why chaos ensued, so that even a storm the size of Katrina can be met with more order, more urgency, more coordination, and more initiative. ■

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1 Robert E. Pierre and Ann Gerhart, *News of Pandemonium May Have Slowed Aid*, WASHINGTON POST, Oct. 5, 2005, at A8.

2 *Hearing on Hurricane Katrina: Preparedness And Response By The Department Of Defense, The Coast Guard, And The National Guard Of Louisiana, Mississippi And Alabama Before the Select Comm.*, 109th Congress (Oct. 27, 2005), (statement of Lt. Gen. H. Steven Blum, Chief, Nat'l Guard Bureau).

3 *See* e.g., E-mail correspondence from 1A JOC Watch Battle Captain to Lt. General Russell Honoré (Aug. 29, 2005).

4 Interview by Select Comm. Staff with Kathleen J. Tierney, Director, Natural Hazards Research and Applications Information Center, Institute of Behavioral Science, U. of Colorado at Boulder (Oct. 6, 2005).

5 Beth Gillin, *Katrina Spawned rumors; media ran with them*, THE PHILADELPHIA INQUIRER, Sept. 28, 2005, at A2.

6 *Hearing On Hurricane Katrina: The Role Of The Federal Emergency Management Agency Before the Select Comm.*, 109th Congress (Sept. 27, 2005), (statement of Michael D. Brown, former Undersecretary of Emergency Preparedness and Response, DHS).

7 *Hearing on Hurricane Katrina: Voices from Inside the Storm Before Select Comm.*, 109th Congress, (Dec. 6, 2005) (written statement of Doreen Keeler Tomlinson, resident of New Orleans, LA).

8 *Id.*

APPENDIX 1

GLOSSARY OF ACRONYMS AND ABBREVIATIONS

AAMC	Association of American Medical Colleges
AAMS	Association of Air Medical Services
ACI	Advanced Contracting Initiative
ADAMS	Atlas and Database of Air Medical Services
ADHS	Alabama Department of Health Services
AEMA	Alabama Emergency Management Agency
AEOC	Alabama Emergency Operations Center
AEW	Airborne Early Warning
AFB	Air Force Base
AGR	Active Guard and Reserve
AMA	American Medical Association
AMR	American Medical Response
ANG	Alabama National Guard
APCO	Association of Public-Safety Communications Officials
ARC	American Red Cross
ARES	Amateur Radio Emergency Services
ARF	Action Request Form
ARNG	Arkansas National Guard
ARW	Air Refueling Wing
ASAC	Assistant Special Agent-in-Charge
ASCE	American Society of Civil Engineers
ASDHD	Assistant Secretary of Defense for Homeland Defense
ASH	Assistant Secretary for Health
ASPHEP	Assistant Secretary for Public Health Emergency Preparedness (HHS)
ATCS	Air Traffic Control Squadron
AVCRAD	Aviation Classification and Repair Depot
ATF	Bureau of Alcohol, Tobacco, Firearms and Explosives (DOJ)
BAH	Board of Animal Health
BOP	Bureau of Prisons
BORSTAR	Border Patrol Search Trauma and Rescue
BORTAC	Border Patrol's Tactical Unit
BRAC	Base Realignment and Closure
BTS	Border and Transportation Security (DHS)
CAS	Client Assistance System
CBC	Construction Battalion Command
CBCS	Combat Communications Squadron
CBMU	Construction Battalion Maintenance Unit
CBP	United States Customs and Border Protection (DHS)
CBRNE	Chemical, Biological, Radiological, Nuclear, and High Yield Explosives
CCP	Citizen Corps Programs
CCRF	Commissioned Corps Readiness Force

CDC	Centers for Disease Control and Prevention (HHS)
CDT	Central Daylight Time
CEM	Comprehensive Emergency Management
CEMP	Comprehensive Emergency Management Plan
CERT	Community Emergency Response Teams
CEO	Chief Executive Officer
CG	Coast Guard
CIM	Clinical Information Management
CIMG	Crisis Incident Management Group
CIMRT	Critical Incident Management Response Team
CIMST	Critical Incident Management Support Team
CIP	Critical Infrastructure Protection
CIRG	Critical Incident Response Group
CIS	COPS in Schools
CJIS	Criminal Justice Information Services Division
CNU	Crisis Negotiation Unit
CO	Contracting Officer
COG	Continuity of Government
CONOP	Concept of Operations
COOP	Continuity of Operations
COLTS	Cells on Light Trucks
COPS	Community Oriented Policing Services
COW	Cells on Wheels
CP	Command Post
CPO	Chief Procurement Officer
CRAF	Civil Reserve Air Fleet
CRS	Congressional Research Service
CST	Civil Support Team
CS	Civil Support
CSEPP	Chemical Stockpile Emergency Preparedness Plan
DCAA	Defense Contract Audit Agency
DCO	Defense Coordinating Officer
DEA	Drug Enforcement Administration
DHH	Department of Health and Hospitals
DHS	United States Department of Homeland Security
DMAT	Disaster Medical Assistance Team
DMH	Department of Mental Health
DMORT	Disaster Mortuary Operational Response Team
DOC	United States Department of Commerce
DOD	United States Department of Defense
DOE	United States Department of Energy
DOJ	United States Department of Justice
DOSR	Daily Operations Summary Reports
DOT	United States Department of Transportation
DPS	Department of Public Safety
DRF	Disaster Relief Fund

DRS	Department of Rehabilitation Services-Vocational Rehabilitation
DTAC	Disaster Technical Assistance Center
DUSM	Deputy United States Marshall
DVD	Digital Versatile Disc
DWI	Disaster Welfare Information
ECRV	Emergency Communications Response Vehicles
EEO	Explosive Enforcement Officers
EHO	Environmental Health Officer
ELT	Evacuation Liaison Team
EMA	Emergency Management Agency
EMAC	Emergency Management Assistance Compact
EMEDS	Expeditionary Medical Support System
EMPG	Emergency Management Performance Grant
EMWG	Emergency Management Working Group
EMS	Emergency Medical Services
EMT	Emergency Medical Technician
EO	Executive Order
EOC	Emergency Operations Center
EOP	Emergency Operations Plan
	Executive Office of the President
EPA	United States Environmental Protection Agency
EPR	Emergency Preparedness and Response
ERRS	Emergency and Rapid Response Services
ERT	Emergency Response Team
ERT-A	Emergency Response Team Advance Element
ERT-N	National Emergency Response Team
ERV	Emergency Response Vehicles
ESAR-VHP	Emergency System for Advance Registration of Volunteer Health Professionals
ESF	Emergency Support Function
ESF-1	Emergency Support Function #1 – Transportation Annex
ESF-2	Emergency Support Function #2 – Communications Annex
ESF-3	Emergency Support Function #3 - Public Works and Engineering Annex
ESF-4	Emergency Support Function #4 - Firefighting Annex
ESF-5	Emergency Support Function #5 - Emergency Management Annex
ESF-6	Emergency Support Function #6 - Mass Care, Housing, and Human Services Annex
ESF-7	Emergency Support Function #7 - Resource Support Annex
ESF-8	Emergency Support Function #8 - Public Health and Medical Services Annex
ESF-9	Emergency Support Function #9 - Urban Search and Rescue Annex
ESF-10	Emergency Support Function #10 - Oil and Hazardous Materials Response Annex
ESF-11	Emergency Support Function #11- Agriculture and Natural Resources Annex
ESF-12	Emergency Support Function #12 - Energy Annex
ESF-13	Emergency Support Function #13 - Public Safety and Security Annex
ESF-14	Emergency Support Function #14 - Long-Term Community Recovery and Mitigation Annex
ESF-15	Emergency Support Function #15 - External Affairs Annex
FAA	Federal Aviation Administration
FAMS	Federal Air Marshal Service

FAR	Federal Acquisition Regulation
FBI	Federal Bureau of Investigation
FCI	Federal Correctional Institution
FCC	Federal Correction Complex
	Federal Communications Commission
	Federal Coordination Center
FCO	Federal Coordinating Officer
FDA	United States Food and Drug Administration (HHS)
FDOCC	Forward Deployed Operations Command Center
FEMA	Federal Emergency Management Agency (DHS)
FEOC	Federal Emergency Operation Center
FEL	Federal Explosive License
FFL	Federal Firearms License
FHWA	Federal Highway Administration (DOT)
FIRE	Assistance to Firefighters Program
FMA	Flood Mitigation Assistance
FMCS	Federal Medical Contingency Stations
FMS	Facilities Management Services
	Federal Medical Shelter
FORSCOM	United States Forces Command
FRP	Federal Response Plan
FPS	Federal Protective Services
FSS	Federal Supply Service
FTE	Full-time Employees
GAO	United States Government Accountability Office
GETS	Government Emergency Telecommunications Service
GIS	Geographic Information System
GSA	United States General Services Administration
HAZMAT	Hazardous Material
HCS	Health Care System
HD	Homeland Defense
HEAR	Hospitals Emergency Alert Radio
HF	High Frequency
HHS	United States Department of Health and Human Services
HIPAA	Health Insurance Portability and Accountability Act of 1996
HLT	Hurricane Liaison Team
HMGP	Hazard Mitigation Grant Program
HQ	Headquarter
HRT	Hostage Rescue Team
	Health Response Team
HSA	Homeland Security Act of 2002
	Alabama Homeland Security Act of 2003
HSC	Homeland Security Council
HSEEP	Homeland Security Exercise and Evaluation Program
HSGAC	Senate Homeland Security and Governmental Affairs Committee
HSOC	Homeland Security Operations Center

HSOP	Homeland Security Overtime Program
HSPD	Homeland Security Presidential Directive
HUD	United States Department of Housing and Urban Development
IAFIS	Integrated Automated Fingerprint Identification System
IAEM	International Association of Emergency Managers
IA TAC	Individual Assistance Technical Assistance Contracts
ICE	United States Immigration and Customs Enforcement (DHS)
ICS	Incident Command System
ICU	Intensive Care Unit
iDEN	Integrated Digital Enhanced Network
IEM	Innovative Emergency Management, Inc.
IHP	Individuals and Households Program
IIMG	Interagency Incident Management Group
I/O	Interoperability
IMT	Incident Management Team
IPET	Interagency Performance Evacuation Team
INS	Incident of National Significance
IRS	Internal Revenue Service
ISO	Information Security Officer
IT	Information Technology
JAG	Judge Advocate General
JCAHO	Joint Commission on Accreditation of Healthcare Organizations
JDOMS	Joint Director of Military Support
JFCOM	Joint Forces Command
JFO	Joint Field Office
JIC	Joint Information Center
JIOC	Joint Information Operations Center
JOC	Joint Operations Center
JTF	Joint Task Force
JPATS	Justice Prisoner and Alien Transportation System
KDHAP	Katrina Disaster Housing Assistance Program
LANG	Louisiana National Guard
LDPSC	Louisiana Department of Public Safety and Corrections
LE	Law Enforcement
LECC	Law Enforcement Coordination Center
LES	Law Enforcement Services
LETPP	Law Enforcement Terrorism Prevention Program
LFA	Lead Federal Agency
LHA	Louisiana Hospital Association
LIHEAP	Low-Income Home Energy Assistance Program
LIMS	Logistics Information Management System
LNHA	Louisiana Nursing Home Association
LNO	Liaison Office
LO	Liaison Officers
LOHSEP	Louisiana Office of Homeland Security and Emergency Preparedness
LRC	Logistics Readiness Center

LSP	Louisiana State Police
LSU	Louisiana State University
LSUHSC	Louisiana State University Health Sciences Center
LTG	Lieutenant General
MA	Mission Assignment
MARS	Military Affiliate Radio Service
MASH	Mobile Army Surgical Hospital
MBP	Mississippi Board of Pharmacy
MCI	Mass Casualty Incident
MCLNO	Medical Center of Louisiana at New Orleans
MCT	Mission Critical Team
MDAC	Mississippi Department of Agriculture and Commerce
MDEQ	Mississippi Department of Environmental Quality
MDT	Maintenance Down Time
MEF	Marine Expeditionary Force
MEMA	Mississippi Emergency Management Agency
MEOP	Mississippi Emergency Operations Plan
MERS	Mobile Emergency Response Support
MERV	Major Emergency Response Vehicle
MET	Mobile Enforcement Team
MG	Major General
MHz	Megahertz
MMD	Mississippi Military Department
MMRS	Metropolitan Medical Response System
MMWR	Morbidity and Mortality Weekly Report
MOU	Memorandum of Understanding
MP	Military Police
MRC	Medical Reserve Corps
MRE	Meals Ready to Eat
MR-GO	Mississippi River-Gulf Outlet Canal
MSCA	Military Support to Civil Authorities
MSDH	Mississippi State Department of Health
MSNG	Mississippi National Guard
MST	Management Support Team
MSY	Louis Armstrong New Orleans International Airport
MTSA	Maritime Transportation Security Act
MVMA	Mississippi Veterinary Medical Association
NAS	Naval Air Station
NASA	National Aeronautics and Space Administration
NBC	Nuclear, Biological and Chemical
NCC	National Coordinating Committee
	National Coordinating Center for Communications
NCG	National Coordination Group
NCH	Natural and Cultural Resources and Historic Properties
NCPA	National Community Pharmacists Association
NCS	National Communications System

NCT	National Coordinating Team
NDMS	National Disaster Medical System
NEMA	National Emergency Management Association
NEMIS	National Emergency Management Information System
NENA	National Emergency Number Association
NERPP	National Emergency and Regional Response Plan
NG	National Guard
NGB	National Guard Bureau
NGBJOC	Joint Operations Center at National Guard Bureau
NGO	Non-Governmental Organizations
NHS	National Hurricane Service
NIH	National Institutes of Health (HHS)
NIMS	National Incident Management System
NIOSH	National Institute for Occupational Safety Health
NIRT	Nuclear Incident Response Team
NOAA	National Oceanic and Atmospheric Administration (DOC)
NOMIC	New Orleans Maritime Interoperable Committee
NOOEP	New Orleans Office of Emergency Preparedness
NOPD	New Orleans Police Department
NORAD	North American Air Defense Command
NORTHCOM	United States Northern Command
NRCC	National Response Coordination Center
NRP	National Response Plan
NRP-CIA	National Response Plan - Catastrophic Incident Annex
NRP-CIS	National Response Plan - Catastrophic Incident Supplement
NRT	National Response Team
NSF	National Science Foundation
NSSE	National Special Security Event
NVOAD	National Voluntary Organizations Involved in Disaster
NWS	National Weather Service
OBP	Office of Border Patrol
ODP	Office of Domestic Preparedness
OEP	Office of Emergency Preparedness
OFO	Office of Field Operations
OFRD	Office of Force Readiness and Deployment
OIG	Office of Inspector General
OIO	Office of International Operations
OMB	Office of Management and Budget
OMT	Operational Management Teams
OPM	Office of Personnel Management
OPLAN MSSTAD	Mississippi National Guard Operations Plan
OSD	Operations Support Division
	Office of the Secretary of Defense
OSG	Office of the Surgeon General
OSHA	Occupational Safety and Health Administration
OTD	Operational Technology Division

OTU	Operational Training Unit
OVP	Office of the Vice President
PACOM	United States Pacific Command
PDM	Pre-Disaster Mitigation
PSAP	Public Safety Answering Point
PFO	Principal Federal Official
PHS	United States Public Health Service
PMU	Portable Morgue Units
POC	Point of Contact
POD	Plans of the Day
PPR	Prevention, Preparedness, and Response
PSAP	Public Safety Answering Points
RCPI	Regional Community Policing Institute
RCT	Regional Coordinating Team
RDD	Reportable Disease Database
RED HORSE	Rapid Engineer Deployable Operational Repair Squadron Engineer
RETCO	Regional Emergency Transportation Coordinator
RFA	Request for Assistance
RFP	Request for Proposal
RRCC	Regional Response Coordination Center
RTA	Regional Transit Authority
SAC	Special Agent-in-Charge
SAMHSA	Substance Abuse and Mental Health Services Administration
SAR	Search and Rescue
SATERN	Salvation Army Amateur Radio Communications System
SBA	United States Small Business Administration
SCO	State Coordinating Officer
SCHIP	State Children's Health Insurance Program
SEOC	State Emergency Operations Center
SERT	State Emergency Response Team
	Secretary's Emergency Response Team (HHS)
SFLEO	Senior Federal Law Enforcement Officers
SHARES	Shared Resources High Frequency Radio Program
SHSGP	State Homeland Security Grant Program
SLGCP	State and Local Government Coordination and Preparedness
SLOSH	Sea, Lakes and Overland Surges from Hurricanes
SMAC	Statewide Mutual Aid Compact
SMS	Short Message Service
SNS	Strategic National Stockpile
SOG	Special Operations Group
SOP	Standard Operating Procedure
SOU	SWAT (Special Weapons and Tactics) Operations Unit
	Statement of Understanding
SPEARR	Small Portable Expeditionary Aerospace Rapid Response
SRT	Special Response Team
SSA	Social Security Administration

SSHP	Service Supplemental Hurricane Plan
SHSS	State Homeland Security Strategy
SWAT	Special Weapons and Tactics
TAG	The Adjutant General
TANF	Temporary Assistance to Needy Families
TARU	Technical Advisory Response Unit
TDD	Training and Development Division
TDY	Temporary Duty
TERT	Telecommunications Emergency Response Taskforce
TMICC	Transportable Multi-mission Communications Center
TOC	Tactical Operations Center
TOPOFF	Top Officials
TRANSCOM	United States Transportation Command
TSA	Transportation Security Administration
TSP	Telecommunications Service Priority
TVA	Tennessee Valley Authority
UASI	Urban Areas Security Initiative
UHF	Ultra High Frequency
UHP	Universal Hiring Program
UHS	Universal Health Services, Inc.
UMC	University of Mississippi Medical Center
USACE	United States Army Corps of Engineers
USAID	United States Agency for International Development
USAR	United States Army Reserve
USCG	United States Coast Guard
USDA	United States Department of Agriculture
USMS	United States Marshals Service
USNS	United States Navy Ship
USP	United States Penitentiary
USPS	United States Postal Service
USS	United States Ship
VA	United States Department of Veterans Affairs
VAMC	Department of Veterans Affairs Medical Center
VFC	Vaccines for Children
VHF	Very High Frequency
VISN 16	Veterans Integrated Service Network 16
VISTA	Veterans Integrated Service Technical Architecture System
VOIP	Voice Over Internet Protocol
VOAD	Voluntary Organizations Active in Disaster
VTC	Video Teleconference
VTS	Vessel Traffic System
WCP	Working Capital Fund
WH	White House
WMD	Weapons of Mass Destruction
WPD	Witness Security and Prisoner Operations Division

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HSOC SPOT REP

SPOT REP #:	#013
Date/Time (EDT):	08/29/05 @ 2230
Reference:	New Orleans Helicopter Overflight
Source of Information:	FEMA Teleconference – observations from Marty Bahamonte, FEMA Public Affairs. Participants included Patrick Rhode, Mike Lowder, Bill Locke, Mike Pawlowski and Mary Anne Lyle
Type of Incident:	Hurricane Katrina

	Update
Summary:	Marty Bahamonte of FEMA Public Affairs made two aerial over flights of the New Orleans area the afternoon of Monday, August 29, 2005. As additional information becomes available it will be reported. He concluded the two immediate major problems would be: 1. Access to the city because roads are flooded to the north and east. 2. Housing His observations include the following: • The I-10 Twin Span bridges to the east of the City to Slidell are compromised in both directions for a stretch of five to seven miles. On the east side bridge sections are gone; on the west side bridge sections are buckled and askew. • There is no way to enter New Orleans from the east. Highway 11 appears generally in tact but is under water where it enters the City and will require some repair but appears to be a quick fix. • The western I10/I610 junction connecting Jefferson and Orleans Parrish is under water. • Entrance from the north is not possible because as roads get into the city, they are under water. • I10 to the west appears to have several underwater sections. • The Airline Highway by the airport is above water. • There is a quarter-mile breech in the levee near the 17th Street Canal about 200 yards from Lake Pontchartrain allowing water to flow into the City. • The levee in Metarie is in tact. • Only one of the main pumps is reported to still be working but cannot keep up with the demand and its longevity is doubtful. • In the neighborhoods there are many small fires where natural gas lines have broken. • Flooding is greatest in the north and east in New Orleans, Metairie

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	and north towards Slidell – an estimated 2/3 to 75% of the city is under water. • The flights did not go all the way north to Slidell so conditions there are not reported. • Some homes were seen with water to the first floor and others completely underwater. • Hundreds of people were observed on the balconies and roofs of a major apartment complex in the city. The location has been provided to City officials. • Downtown there is less flooding. Most buildings have windows blown out but otherwise appear structurally sound. • West and South of the City appear dry. • Lake Front Airport by Lake Pontchartrain is under water. • There is an oil tanker grounded in the Industrial Canal – two tugs were observed working with the ship. • The Coast Guard reported two other tankers aground but they were not observed. • The Coast Guard is flying rescue missions for people stuck on roofs. They reported seeing about 150 people but also said that as they lifted people out, they saw others breaking through the roofs of adjacent homes. • The Coast Guard will use night vision devices and continue rescue missions into the night. • Search and Rescue will need boats, in some locations high wheeled trucks may be usable. FEMA USR Teams are coordinating boat use with Louisiana Fish and Game officials. • The City reports about 300 people have been rescued by boat so far. These rescue operations will continue through the night. • Boat traffic is not restricted and movement of supplies by boat and barge is feasible. • The Inter Harbor Canal is not visible. • A few bodies were seen floating in the water and Coast Guard pilots also reported seeing bodies but there are no details on locations or numbers.
Significance:	
Actions/Follow-Up:	N/A
Miscellaneous:	
Prepared By:	Mathew Thompson NRCC Planning Section Analyst

APPENDIX 3

SUMMARY OF WHITE HOUSE DOCUMENT REVIEW

These are examples of documents received by the White House (WH) Homeland Security Council (HSC) staff between August 27 and September 3. The items logged do not reflect the entire information flow to the White House, or all documents provided to the Select Committee. Rather, they are meant to illustrate the type and range of information known to the White House suggesting Katrina and the subsequent flooding of New Orleans (NO) was not a standard emergency event. Yet the enormity of Katrina seemed not to have been fully understood by the White House until at least Tuesday, August 30.

Facts Reported to White House Homeland Security Council Staff	Received	WHK Bates No. Begin
Red Cross notifies K. Nielsen at WH it expects Katrina to be a major hurricane. Red Cross stands ready to brief WH as requested.	8/27; 1:08 p.m.	5169
HSOC reports: New Orleans evacuation ordered. Superdome to open, Nagin to commandeer any property or vehicle necessary to provide shelter or transport.	8/28; 11:56 a.m.	12931
DHS infrastructure advisory sent to HSC. Advises likely flooding from Lake Pontchartrain due to surges from Cat 5 hurricane. If levee is breached, it is predicted to take 3 to 6 months to dewater New Orleans.	8/28; 11:59 a.m.	5217
DHS forwards to WH diagrams of NO levee system.	8/28; 12:14 p.m.	12922
DHS Advisory re transportation. Buses not in use should be moved to high ground. Surge is predicted to exceed 20 feet. Levees to be breeched.	8/28; 12:32 p.m.	5222
WH receives overview re capabilities of National Guard units from LA, AL, MS and FL.	8/28; 1:07 p.m.	9678
DHS forwards NO evacuation plan.	8/28; 5:00 p.m.	12934
HSOC reports: Katrina now Cat 5. Landfall expected at 8:00 a.m. 8/29. Coastal flooding as high as 28'.	8/28; 6:26 p.m.	5958
DHS sends WH comprehensive report [41 pages] on potential infrastructure impacts of a Cat 5 hurricane on the Gulf coast. Damage estimates predicted as high as $10 billion.	8/29; 1:47 a.m.	12072
HSOC reports: Katrina weakens to Cat 4. Coastal storm surge flooding of 18-22' above normal tide levels, locally as high as 28 feet. Some levees in New Orleans could be overtopped.	8/29; 6:10 a.m.	6509
DOD briefs WH re capabilities of DOD Civil Support.	8/29; 6:52 a.m.	9953
K. Nielsen advises federal agencies WH HSC will be available twenty-four hours a day through the duration of Hurricane Katrina. Bethany Nichols and Dan Kaniewski are identified as additional WH staff monitoring Katrina.	8/29; 10:58 a.m.	15770
DHS Watch Desk E-mails WH in re report from Maj Gen Landreneau. Extensive flooding along St. Claude and Claiborne avenues. Leak has developed in the Superdome. Five floors of windows at Charity Hospital have blown out and the first floor of the hospital is flooded. The 911 Centers in St. Bernard and Orleans parishes have been shut down.	8/29; 11:32 a.m.	14825
HSOC reports: Some LA Parishes have 8 to 10 feet of water. No levee failures reported. Approximately 15,000 evacuees in Superdome. It is estimated 300,000 LA residents will be without power. Unspecified numbers of LA and MS residents are stranded and awaiting evacuation in flooded areas.	8/29; 2:20 p.m.	16118
HSOC reports: Preliminary reports indicate the levees have not been breached. Assessment still pending. Army Corps estimates if NO experiences extensive flooding it could take months to dewater the city. Such flooding will preclude damage assessments and restoration.	8/29; 6:13 p.m.	6472

Facts Reported to White House Homeland Security Council Staff	Received	WHK Bates No. Begin
HSOC reports: Marty Bahamonde reports the following after a helicopter over flight: Access to the city is impeded due to flooding to the north and east. I-10 Twin Span bridges to the east of Slidell are compromised in both directions. Portions of this bridge are buckled, askew and in some cases gone. No ability to enter NO from the east. West I-10 and I-610 junction connecting Jefferson and Orleans Parish is under water. Entrance from the north is not possible because roads are under water. Quarter mile breach in the levee near the 17th St. Canal about 200 yards from Lake Pontchartrain allowing free water to flow into the city. Levee in Meterie is in tact. Only one of the main pumps is reported to be operable but its longevity is doubtful. Flooding is greatest in the north and east in New Orleans. Homes are completely underwater. Hundreds of people were observed on roofs and balconies. A few bodies were seen floating in the water.	8/30; 12:02 a.m.	7158
LA reports: No power; 911 system out; roof damage to Superdome; entire city flooded. St. Bernard & 9th Ward levee breached.	8/30; 6:00 a.m.	4057
HSOC reports: Levee breach, 17th St. at Canal Blvd – exceeds 100 meters in length. Much of downtown and east NO is underwater, the depth of which is unknown. Flooding to a depth of 8-10 feet in Meterie and 6 feet in 9th Ward.	8/30; 6:33 a.m.	11281
DHS Watch Officer E-mails WH and others that a 200 foot levee breach is being assessed.	8/30; 8:13 a.m.	6324
FEMA chart listing all task and ESF assignments.	8/30; 9:24 a.m.	6345
DHS Watch Officer E-mails WH with maps identifying locations of breached levees, highlighting two areas of concern, the levee at Tennessee St. and the levee at 17th St.	8/30; 10:23 a.m.	13330
K. Nielsen at WH e-mails Red Cross and acknowledges several federal partners have expressed a lack of situational awareness and are having problems getting logistics issues resolved.	8/30; 11:18 a.m.	16135
FEMA requests evacuation of 15-25K from Superdome.	8/30; 11:50 a.m.	12712
DHS Watch Officers advises WH – Martial Law reportedly declared in Jefferson and Orleans Parishes. National Guard to assume responsibility.	8/30; 11:51 a.m.	6325
DHS Watch Officers advises WH of distinction between the term “Martial Law” and “Law Enforcement Emergency” and further advises the latter term should be used.	8/30; 2:08 p.m.	14853
HSOC reports: Army Corps reports 300 foot levee breach 100 meters south of Hammond St. bridge; Water from Lake Pontchartrain is pouring into NO through this breach; additional multiple levee breaches in NO to include Tennessee St. breach.	8/30; 2:19 p.m.	4088
HSOC reports: Spot Report detailing levee breaches (maps included) south of Hammond St. bridge and near Tennessee St. bridge.	8/30; 3:07 p.m.	6850
New Orleans: No power in NO, no 911, entire city flooded except French Quarter and Business district; Superdome has roof damage; the following levee breaches are reported: St. Bernard & 9th, Haynes Blvd Pump Station, and 17th St. Canal. Jefferson Parish: People searching for food; gas and chemical leaks; toxic, deep flood waters.	8/30; 4:00 p.m.	4092

Facts Reported to White House Homeland Security Council Staff	Received	WHK Bates No. Begin
HSOC reports: Army Corps indicates 300 foot breach approximately 100 meters south of Hammond Street Bridge. Three hundred feet of the east flood wall is missing and water from Lake Pontchartrain is pouring into NO. Vehicles cannot access this breach location. The plan is for helicopters to dump sand into the breach site. Additional levee breaches in NO exist, including Tennessee Street.	8/30; 7:26 p.m.	6545
Memo from Sec. Chertoff distributed to Cabinet announcing Michael Brown as PFO.	8/30; 9:00 p.m.	6695
HSOC reports: Superdome needs to be evacuated; population is 12-15,000 people.	8/31; 2:00 a.m.	13833
HSOC reports: Waters continue to rise due to the breach of the 17th St. levee. 300 foot breach at present. Expectations are, without fixing the breach, flooding will not stop until it reaches lake level.	8/31; 5:47 a.m.	12484
FEMA reports: Total cumulative shelter population is 54,378.	8/31; 7:21 a.m.	12503
DHS Watch Desk advise re a recent report from Bob Patrick, FTA's NO Administrator: 200 to 250 Regional Transportation District employees were stranded at their Canal St. facility due to flooding. All were self evacuated via air mattresses whereby they were able to paddle to shallow water. From there they waded in shallow water to the Convention Center. Bob Patrick estimates the entire city of NO will be flooded by day's end.	8/31; 11:09 a.m.	14858
HSOC reports: Rising water at Superdome is threatening to flood the generator which will cause power failure. The State of LA has requested assistance in evacuating Superdome.	8/31; 12:54 p.m.	7080
HSOC reports: Astrodome site recommended as alternative shelter location for Superdome evacuees.	8/31; 6:25 p.m.	4177
HSOC reports: Significant flooding continues throughout NO. 17th St. levee breach in NO is ongoing and is currently two feet above flood stage. Southern region of MS is devastated and is currently out of fuel and water. Both Harrison and Hancock Counties experienced total destruction. 23,000 from the Superdome are being evacuated. 350,000 homes are estimated to have taken severe damage. Housing needs are estimated at 500,000 to 1 million. Widespread damage to utility systems and environmental impact will likely prevent habitation of the area for six month to one year. Pictures are included at bates nos. WHK7404 and 7405.	8/31; 6:31 p.m.	7388
HSOC reports: 11 hospitals in varying stages of damage. Most have no power.	9/1; 12:15 a.m.	7584
Commodity Status – listing locations and commodity supplies.	9/1; 1:00 a.m.	6692
HSOC reports: NOPD has suspended search and rescue efforts and are focusing on securing the city from lawlessness. Pipeline from Plaquemines Parish is leaking an estimated 240 barrels of oil a day. A fatality collection site is being established in Baton Rouge. Levee breaches have not been repaired or blocked. Army Corps projects it could take months to dewater NO once the flooding ceases.	9/1; 5:50 a.m.	6756
Aerial maps of flooded areas distributed by HSOC.	9/1; 5:52 a.m.	6775
K. Nielsen seeks update from DHS HSOC on news story re National Guardsman shot at the Superdome.	9/1; 10:06 a.m.	15834
FEMA chart listing all task and ESF assignments.	9/1; 11:05 a.m.	6580
K. Nielsen complains information arriving at WH HSC is stale, i.e., already updated by HSOC.	9/1; 11:24 a.m.	14760
K. Nielsen at WH requests DHS Watch Desk to follow up with a confirmation of the cause of the downed helicopter.	9/1; 12:41 p.m.	14903

Facts Reported to White House Homeland Security Council Staff	Received	WHK Bates No. Begin
DHS Watch Desk reports a downed helicopter.	9/1; 12:56 p.m.	14900
DHS Watch Officer advises WH: NOPD reports Guardsman shot in Superdome bathroom following an altercation with an evacuee.	9/1; 1:48 p.m.	12748
Flyover pictures sent to WH showing magnitude of damage.	9/1; 2:37 p.m.	10674
Hostage situation at Tulane Hospital reported.	9/1; 2:47 p.m.	12750
LA reports: Jefferson Parish has people on street searching for food. There are contaminated flood waters and the streets are impassable. Orleans Parish's 911 system is inoperable. Entire City of NO is flooded except the French Quarter.	9/1; 4:00 p.m.	5654
Availability of generators and MREs are insufficient due to overwhelming demand.	9/1; 6:00 p.m.	11653
National Guard deployed to assist with law and order. Significant flooding continues in Jefferson, Orleans, and St. Bernard Parish. 17th Street Canal levee breach is being repaired. Food and water airdrops are taking place through affected area.	9/1; 6:14 p.m.	14138
E-mail trail beginning with Richard Davis at WH-HSC asking for specific operational response plans for attending to hospitals in danger.	9/1; 7:24 p.m.	11831
Rajeev Venkayya of WH HSC e-mails officials at DHS re standing water hazards and resources available via CDC.	9/1; 8:43 p.m.	15373
TSA personnel report trouble at MSY with maintaining order.	9/1; 10:19 p.m.	5588
Dan Ostergaard at DHS advises Richard Davis at WH that Katrina is a national disgrace.	9/1; 10:50 p.m.	15786
1,700 patients need to be evacuated from LA hospitals.	9/2; 4:21 a.m.	5183
DHS Briefing Points report FPS officers have walked the perimeter of the Convention Center and there are approximately 1,000 people there. "New Orleans Officers on scene and tactically prepared."	9/2; 5:44 a.m.	10919
Red Cross is operating no feeding kitchens in NO due to security concerns. Red Cross will not ask its volunteers to risk their personal safety.	9/2; 6:00 a.m.	11756
WH advised of the willingness of states such as AK, AL and GA to receive evacuees.	9/2; 11:33 a.m.	15364
DHS notifies WH, NO Convention Center population is 25,000 according to FEMA Region 6 RRCC. Limited food and water is available.	9/2; 12:44 p.m.	5602
Red Cross estimates shelter population of 94,000.	9/2; 2:02 p.m.	16179
LA reports: Jefferson: Downed power lines, downed telephone and light poles, downed trees and limbs/debris and house debris. Lower water pressure or no water, gas/chemical leaks in air. Live wires, no commercial power in drainage pumps stations, toxic water, still some deep water in some neighborhoods, animal/reptile issues. West Bank business/apartment building burning to the ground, creeping water from the 17th St. Canal. Orleans: No power, 911 system down, EOC on emergency power and cell phones, Bayou Bienvenue reporting 20 foot storm surge. Lost contact with 4 pump stations. Entire city flooded, except French Quarter/West. Bank/Business district. Superdome is structurally okay, some roof damage. St. Bernard: No power; 911 center down, structure damage, glass breakage at shelters, roof torn off on high school gym shelter.	9/3; 12:00 p.m.	4522

APPENDIX 4

EMERGENCY PREPAREDNESS AND RESPONSE GRANTS TO ALABAMA, LOUISIANA, AND MISSISSIPPI, FY 2003-2004

Emergency management assistance administered by FEMA includes providing funds for the reconstruction of damaged public facilities, cash grants to victims of disasters, and access to temporary housing, among other types of aid. FEMA also provides disaster planning and preparedness aid to state and local governments, and coordinates federal emergency management activities.

Prior to September 11, 2001, the federal government's role in supporting emergency preparedness and management was limited primarily to providing resources before large-scale disasters like floods, hurricanes, and earthquakes, and response and recovery assistance after such disasters. In response to the events of September 11, 2001, however, the federal government has provided billions of dollars to state and local governments for planning, equipment, and training to enhance the capabilities of first responders to respond to terrorist attacks and to a lesser extent natural disasters. Indeed, legislation and presidential directives call for DHS to place special emphasis on preparedness for terrorism, and DHS has directed that the majority of first responder grant funding be used to enhance first responder capabilities to prevent, protect against, respond to, and recover from terrorist attacks. Nonetheless, many grants can have all-hazards applications. The following is a summary of all FEMA Hazard Mitigation, COPS, and ODP grants awarded in Alabama, Louisiana, and Mississippi in Fiscal Years 2003-2004.

FEMA Hazard Mitigation Grant Programs

FEMA administers three programs that provide funds for activities that reduce losses from future disasters or prevent the occurrence of catastrophes. These hazard mitigation programs include the Flood Mitigation Assistance (FMA) program, the Hazard Mitigation Grant Program (HMGP), and the Pre-Disaster Mitigation (PDM) program.[1] These programs enable grant recipients to undertake activities such as the elevation of structures in floodplains, relocation of structures from floodplains, construction of structural enhancements to facilities and buildings in earthquake prone areas (also known as retrofitting), and modifications to land use plans to ensure that future construction ameliorates, and does not exacerbate, hazardous conditions.

Alabama, Louisiana, and Mississippi received a total of $67,313,169 through the three hazard mitigation programs in fiscal years 2003, 2004, and 2005. Following is a brief summary of the grants awarded in the three fiscal years:

- Alabama received a total of $27,516,469 over the three year period through the three FEMA-administered hazard mitigation programs, Louisiana received $31,221,099, and Mississippi $8,575,601;
- FMA grants: the state of Louisiana received $1,625,909, the state of Mississippi received $3,207,573 (Alabama received no FMA grants);
- HMGP grants: the state of Alabama received a total of $20,486,277, Louisiana received $29,595,190, and the state of Mississippi received a total of $5,368,030; and,
- PDM grants: the state of Alabama received a total of $6,530,977 in FY2004 — no PDM funds were received by Alabama in FY2003 or FY2005, and no PDM awards were made to Mississippi or Louisiana during the three year period.

FEMA Hazard Mitigation Awards in FY2003

Flood Mitigation Assistance Program. A total of $1,100,109 was awarded to Alabama and Louisiana in FY2003 under authority of the Flood Mitigation Assistance (FMA) program. Mississippi received no funds through this program in FY2003. Baldwin County, Alabama received $143,770 under the FMA program and spent the funds on private structure elevation. No other county in Alabama received FMA funding. Louisiana received a total of $956,339 under the FMA program and all grant recipients, including Jackson, Terrebonne, and East Baton Rouge parishes, used the funding for private structure elevation.

Hazard Mitigation Grant Program. A total of $20,870,041 was awarded in FY2003 to two of the states under authority of Section 404 of the Stafford Act. No HMGP awards were provided in the state of Mississippi in FY2003. Alabama received $338,524 and Louisiana received $20,531,517. Of this amount, $13,565,975 was awarded to Terrebonne parish for elevation of private structures.

Pre-Disaster Mitigation Program. No PDM awards were made to Alabama, Louisiana, or Mississippi in FY2003.

FEMA Hazard Mitigation Awards in FY2004

Flood Mitigation Assistance Program. A total of $646,947 was awarded to the three states in FY2004 under authority of the Flood Mitigation Assistance (FMA) program. Alabama received $282,136, Louisiana $76,500, and Mississippi $288,311. Again, the majority of the funding went to private structure elevation or private property acquisition.

Hazard Mitigation Grant Program. A total of $10,485,309 was awarded in FY2004 to the three states under authority of Section 404 of the Stafford Act. Alabama received $4,538,660 and mostly put it towards elevation of private structures or acquisition of private or public real property. Louisiana was awarded $5,921,463. Most notably, $1,810,500 was awarded statewide for the development of local multi-hazard plans. Assumption parish used its $15,000 to purchase generators. Louisiana State University used its $94,685 for public awareness and education. And Jefferson Parish put its $634,938 award towards elevation of private structures.

Pre-Disaster Mitigation Program. Only one state, Alabama, received FMA funding in only one of the three years, FY2004. Most of the funds received by the state (83% of the $6,530,977) were awarded to the City of Birmingham for the acquisition of property in riverine flood plains.

FEMA Hazard Mitigation Awards in FY2005

Flood Mitigation Assistance Program. A total of $4,685,750 was awarded in the three states in FY2005 under authority of the FMA program. Alabama received a total of $73,309. Louisiana received nearly $600,000, $400,000 of which went to the Louisiana Office of Homeland Security and Emergency Preparedness for salaries and expenses. And Mississippi's nearly 3,000,000 awarded funded private property acquisitions in the cities of Florence, Gulfport, Long Beach, Grenada, and Pearl River County.

Hazard Mitigation Grant Program. A total of $10,485,309 was awarded to the three states in FY2005 through the HMGP. Alabama received $15, 609,093. The funding went to generators, warning systems, and acquisition of private or public real property and structures. Louisiana was awarded $3,142,210, which was used for public awareness and

education in Terrebonne and Assumption parishes and elevation of private structures in Ouachita and Livingston parishes. And Mississippi was awarded $5,342,844, which it dispersed among several cities and counties, including Vicksburg, Lauderdale, Brandon, and Jackson. The funds were spent primarily on acquisition of private and public real property.

Pre-Disaster Mitigation Program. No PDM awards were made to Alabama, Louisiana, or Mississippi in FY2005.

Community Oriented Policing Services (COPS) Office

The COPS Office was created by Title I of the Violent Crime Control and Law Enforcement Act of 1994 (P.L. 103-322). The mission of the COPS Office is to advance community policing in all jurisdictions across the United States. The COPS Office awards grants to state, local and tribal law enforcement agencies throughout the United States so they can hire and train law enforcement officers to participate in community policing, purchase and deploy new crime-fighting technologies, and develop and test new and innovative policing strategies.[2] The COPS Office has awarded more than $11.4 billion to over 13,000 law enforcement agencies across the United States since it started awarding grants in 1994.[3] As of the end of FY2004, the COPS Office has funded more than 118,000 community policing officers throughout the U.S.[4]

COPS Grant Programs

Below is a brief summary of the COPS grant programs under which funding was awarded to local law enforcement agencies in Alabama, Louisiana, and Mississippi. In summary:

- Alabama received $24,770,274 from FY2003 to FY2005 under the COPS Interoperability Communications, Law Enforcement Technology, Universal Hiring Program (UHP), COPS in Schools (CIS), and Homeland Security Overtime (HSOP) grant programs;
- Louisiana received $23,495,114 from FY2003 to FY2005 under the COPS Interoperability Communications, Law Enforcement Technology, UHP, CIS, Regional Community Policing Institute (RCPI) and Homeland Security Overtime (HSOP) grant programs; and
- Mississippi received $7,003,688 from FY2003 to FY2005 under the COPS Law Enforcement Technology, UHP, CIS, and HSOP grant programs.

COPS Interoperable Communications Grant Program. The Interoperable Communications Grant Program provides funding to local communities to help them develop effective interoperable communications systems for public safety and emergency service providers. The grant program funds projects that explore the use of equipment and technology to increase interoperability and data sharing among law enforcement, fire departments, and emergency medical services. Some examples of projects that have been funded include:

- Interoperability communications equipment for multidisciplinary and multijurisdictional public safety communications projects;
- Deployment of portable gateway networks;
- Technology to upgrade or enhance the ability of law enforcement to improve the timeliness, effectiveness and accuracy of criminal justice information exchanges; and
- Other technology that can be demonstrated to significantly increase interoperability within the public safety community.[5]

COPS Law Enforcement Technology Grant Program. The COPS Law Enforcement Technology Program provides funding for the development of automated systems that help state, local, and tribal law enforcement agencies prevent, respond to, and investigate crime. The funding can be used by law enforcement agencies to purchase technology that advances crime analysis, intelligence gathering, and crime prevention in their communities.[6] The technology grants allow law enforcement agencies to purchase technology that does not fall under the Interoperable Communications Grant Program.[7]

COPS Universal Hiring Program (UHP). UHP provides funding to state, local, and tribal governments for the salaries and benefits of newly hired officers who engage in community policing. Law enforcement agencies can use UHP funding to hire new law enforcement officers to work in community policing or to redeploy a comparable number of veteran officers into community policing. UHP funding can also be used to help law enforcement agencies partner with local communities to develop innovative ways to deal with long-standing problems. UHP was created in 1995 when COPS merged their Funding Accelerated for Smaller Towns (FAST) and Accelerated Hiring, Education and Deployment (AHEAD) Programs.8 Funds awarded under this program are used to pay 75 percent of a newly hired, entry-level officer's salary and benefits up to $75,000 per officer over the course of the three-year grant period. The agency is expected to pay the other 25 percent of the officer's salary and benefits, unless they are able to obtain a waiver because of extreme fiscal hardship.

COPS in Schools (CIS). The CIS grant program provides funding to local law enforcement agencies so they can hire new or additional school resource officers to engage in community policing activities in and around primary and secondary schools.9 The CIS grant program provides an incentive for the local law enforcement agency to collaborate and develop partnerships with the school to use community policing efforts to combat school violence. Jurisdictions that apply for funding must show they have primary law enforcement authority over the schools identified in their application and do not have the ability to implement the program without federal assistance. Funds awarded under this program are used to pay the salary and benefits of a School Resource Officer up to $125,000 per officer over the course of the three-year grant period. Any costs over the $125,000 per officer are expected to be covered by the local jurisdiction.

Homeland Security Overtime Program (HSOP). HSOP provides funding to cover the overtime pay for officers engaging in homeland security and community policing activities.10 The funds are meant to supplement the local law enforcement agency's current overtime budget. HSOP funds can be used to pay for officer overtime during homeland security training sessions or other law enforcement activities designed to prevent acts of terrorism or other drug-related violent crime. HSOP funds can be used to support overtime efforts for non-supervisory, sworn personnel. Funds cannot be used for civilian or community service officers. HSOP grantees are expected to contribute 25 percent in matching funds.

Regional Community Policing Institutes (RCPI). RCPI funds are used to establish Regional Community Policing Institutes. RCPIs are training centers funded by COPS that teach a range of courses from homeland security and domestic preparedness to police integrity. RCPIs also provide technical assistance for local law enforcement agencies.11 There is a network of RCPIs across the United States that provide training to local law enforcement agents.12 The Gulf Coast RCPI provides training and technical assistance in all aspects of community policing to local law enforcement in Louisiana, Alabama and Mississippi.

COPS Funding Awarded to Jurisdictions in Alabama

Fiscal Year 2003. In FY2003, jurisdictions in the state of Alabama received a total of $9,567,867 from the COPS Office. COPS funding awarded to jurisdictions in Alabama in FY2003 was done under three different grant programs, as shown in **Table 1.** A total of eight Law Enforcement Technology grants were awarded in Alabama, for a total of $1,855,820 in funding. A total of nine UHP grants were awarded in Alabama, for a total of $7,638,363 in funding. Only one HSOP grant was awarded in Alabama in the amount of $73,684.

Table 1: COPS Grants Awarded to Jurisdictions in Alabama in FY2003

Agency	Grant Program	Funding
Alabama Dept. Of Public Safety	Law Enforcement Technology	$174,000.00
Choctaw County Emergency Management Agency	Law Enforcement Technology	$198,700.00
City of Harselle	Law Enforcement Technology	$69,545.00
Huntsville Police Dept.	Law Enforcement Technology	$347,725.00
Jefferson County Sheriff's Dept.	Law Enforcement Technology	$469,750.00
Limestone County Board	Law Enforcement Technology	$49,675.00
Town of Rogersville	Law Enforcement Technology	$49,675.00
University of Alabama-Huntsville	Law Enforcement Technology	$496,750.00
Alabama Dept. Of Public Safety	UHP	$5,625,000.00
City of Troy	UHP	$70,021.00
Town of Coosada	UHP	$73,981.00
Jefferson County Sheriff's Dept.	UHP	$750,000.00
Lake View Police Dept.	UHP	$152,052.00
Madison Police Dept.	UHP	$450,000.00
Marengo County Sheriff's Dept.	UHP	$297,288.00
City of Troy	UHP	$70,021.00
Tuscaloosa County Sheriff's Dept.	UHP	$150,000.00
Mobile County Board of Commissioners	Homeland Security Overtime	$73,684.00
	Total Awarded	$9,567,867.00

Jurisdictions in Alabama received approximately 7.7 percent of the total amount of UHP funding awarded to all jurisdictions in the United States by the COPS Office in FY2003. However, jurisdictions in Alabama received slightly less than one percent of the total amount of Law Enforcement Technology funding awarded by the COPS Office for the fiscal year. Likewise, only 0.1 percent of the total amount of HSOP funding awarded in FY2003 by the COPS office went to Alabama.

Fiscal Year 2004. In FY2004, jurisdictions in Alabama received a total of $8,695,875 from the COPS Office. COPS funding awarded to jurisdictions in Alabama was done under four different grant programs, as shown in **Table 2**. Nine Law Enforcement Technology grants were awarded to jurisdictions in Alabama, for a total of $1,810,745 in funding. Three UHP grants were awarded in Alabama, for a total of $571,169 in funding. Four CIS grants were awarded in Alabama, for a total of $688,961 in funding. Only one Interoperable Communications Technology grant was awarded in FY2004 to Alabama, in the amount of $5.625 million.

Table 2: COPS Grants Awarded to Jurisdictions in Alabama in FY2004

Agency	Grant Program	Funding
St. Clair County Sheriff's Dept.	Law Enforcement Technology	$98,948.00
Jefferson County Sheriff's Dept.	Law Enforcement Technology	$98,948.00
Hanceville Police Dept.	Law Enforcement Technology	$19,790.00
Arab Police Dept.	Law Enforcement Technology	$14,842.00
Town of Douglas	Law Enforcement Technology	$9,895.00
Blount County Sheriff's Dept.	Law Enforcement Technology	$34,632.00
Lexington Police Dept.	Law Enforcement Technology	$49,474.00
Jefferson County Medical Examiner	Law Enforcement Technology	$494,739.00
Board of Trustees of the University of Alabama	Law Enforcement Technology	$989,477.00
City of Helena	UHP	$375,000.00
City of Midland	UHP	$121,169.00
Daphne Police Dept.	UHP	$75,000.00
Randolph County Sheriff's Dept.	COPS in Schools	$91,809.00
Scottsboro Police Dept.	COPS in Schools	$81,978.00
Wilcox County Sheriff's Dept.	COPS in Schools	$196,898.00
Marshall County Sheriff's Dept.	COPS in Schools	$318,276.00
Birmingham Police Dept.	Interoperable Communications Tech.	$5,625,000.00
	Total Awarded	$8,695,875.00

In FY2004, jurisdictions in Alabama received one percent of the total UHP funding awarded to jurisdictions nationwide by the COPS Office. Less than two percent of the total funding under the Law Enforcement Technology program and the CIS program went to jurisdictions in Alabama in FY2004. However, 6.8 percent of the total amount of funding awarded under the Interoperable Communications Technology program for FY2004 went to one jurisdiction in Alabama.

Fiscal Year 2005. In FY2005, a total of $6,506,532 in COPS funding was awarded to jurisdictions in the state of Alabama. Funding awarded to jurisdictions in Alabama were made under three different COPS grant programs, as shown in **Table 3**. Thirteen grants, for a total of $2,821,800 in funding, were awarded to jurisdictions in Alabama under the Law Enforcement Technology Program. One CIS grant was award in Alabama in the amount of $684,732. As in previous years, only one Interoperable Communications Technology grant was awarded in Alabama in the amount of $3,000,000.

Table 3: COPS Grants Awarded to Jurisdictions in Alabama in FY2005

Agency	Grant Program	Funding
Board of Trustees of the University of Alabama	Law Enforcement Technology	$147,996.00
Guin Police Dept.	Law Enforcement Technology	$39,466.00
Southside Police Dept.	Law Enforcement Technology	$19,733.00
Boaz Police Dept.	Law Enforcement Technology	$19,733.00
Morgan County Sheriff's Dept.	Law Enforcement Technology	$78,931.00
Shelby County Sheriff's Dept.	Law Enforcement Technology	$246,661.00
Mobile Police Dept.	Law Enforcement Technology	$246,661.00
Huntsville Police Dept.	Law Enforcement Technology	$295,993.00
Huntsville Police Dept.	Law Enforcement Technology	$493,322.00
Madison County Sheriff's Dept.	Law Enforcement Technology	$493,322.00
Morgan County Sheriff's Dept.	Law Enforcement Technology	$98,664.00
Jefferson County Criminal Courts	Law Enforcement Technology	$394,657.00
Tuscaloosa County Sheriff's Dept.	Law Enforcement Technology	$246,661.00
City of Tuscaloosa	COPS in Schools	$684,732.00
Mobile Police Dept.	Interoperable Communications Tech.	$3,000,000.00
	Total Awarded	$6,506,532.00

Three percent of the Law Enforcement Technology grant funds awarded nationwide by the COPS Office in FY2005 was awarded to jurisdictions in Alabama. Approximately 1.4 percent of all CIS funding awarded by the COPS Office for the fiscal year was awarded to a jurisdiction in Alabama. The Mobile Police Department received three percent of the Interoperable Communications Technology awarded by the COPS Office in FY2005.

COPS Funding Awarded to Jurisdiction in Louisiana

Fiscal Year 2003. In FY2003, a total of $10,699,027 in COPS funding was awarded to jurisdictions in Louisiana. Funding awarded by COPS during the fiscal year was done under five different grant programs, as shown in **Table 4**. COPS awarded a total of eight Law Enforcement Technology grants in Louisiana, for a total of $2,493,685 in funding. COPS also awarded four UHP grants in Louisiana for a total of $2,039,523 in funding. Three grants under the HSOP were awarded in Louisiana for a total funding amount of $305,407. One grant was made to a jurisdiction in Louisiana under the Interoperable Communications Technology Program for $5,510,412, and under the RCPI Program for $350,000.

Table 4: COPS Grants Awarded to Jurisdictions in Louisiana in FY2003

Agency	Grant Program	Funding
Louisiana Commission on Law Enforcement and Admin.	Law Enforcement Technology	$1,490,250.00
Slidell Police Dept.	Law Enforcement Technology	$49,675.00
Vernon Parish Sheriff's Dept.	Law Enforcement Technology	$59,610.00
New Orleans Metropolitan Crime Commission	Law Enforcement Technology	$198,700.00
Jefferson Parish Sheriff's Dept.	Law Enforcement Technology	$49,675.00
St. Tammany Parish Sheriff's Dept.	Law Enforcement Technology	$99,350.00
Harahan Police Dept.	Law Enforcement Technology	$49,675.00
Lafourche Parish Sheriff's Dept.	Law Enforcement Technology	$496,750.00
Houma Police Dept.	UHP	$412,160.00
Lake Charles Police Dept.	UHP	$772,974.00
Port of New Orleans Harbor Police Dept.	UHP	$212,351.00
Quachita Parish Sheriff's Dept.	UHP	$642,038.00
Slidell Police Dept.	Homeland Security Overtime	$48,833.00
Gretna Police Dept.	Homeland Security Overtime	$49,229.00
Quachita Parish Sheriff's Dept.	Homeland Security Overtime	$207,345.00
New Orleans Police Dept.	Interoperable Communications Tech.	$5,510,412.00
Northwestern State University	RCPI	$350,000.00
	Total Awarded	$10,699,027.00

Jurisdictions in Louisiana received 1.3 percent of the total Law Enforcement Technology funding awarded by the COPS Office in FY2003. Also, jurisdictions in Louisiana received 2.1 percent of UHP funding awarded in the same fiscal year. Jurisdictions in Louisiana received less than one percent of HSOP funding awarded in FY2003. However, the New Orleans Police Department received 7.4 percent of the Interoperable Communications Technology funds awarded in FY2003. Northwestern State University received 1.7 percent of the RCPI funds awarded in FY2003 by the COPS Office.

Fiscal Year 2004. In FY2004, a total of $5,306,337 in COPS funding was awarded to jurisdictions in Louisiana. Like FY2003, grants awarded in the state of Louisiana were made under four different grant programs, as shown in **Table 5**. COPS awarded a total of six Law Enforcement Technology grants in Louisiana for the fiscal year, for a total of $1,335,795. COPS also awarded three grants under UHP in Louisiana for the fiscal year, for a total of $869,707. One grant was awarded to a local agency under the CIS program, for $101,394, and under the Interoperable Communication Technology Program, for $2,998,901.

Table 5: COPS Grants Awarded to Jurisdictions in Louisiana in FY2004

Agency	Grant Program	Funding
Rapides Parish Sheriff's Dept.	Law Enforcement Technology	$148,422.00
Lafayette Police Dept.	Law Enforcement Technology	$49,474.00
Sunset Police Dept.	Law Enforcement Technology	$19,790.00
Town of Grand Coteau	Law Enforcement Technology	$29,684.00
City of Bastrop	Law Enforcement Technology	$989,477.00
New Orleans Metropolitan Crime Commission	Law Enforcement Technology	$98,948.00
Terrebonne Parish Sheriff's Dept.	UHP	$360,686.00
Gretna Police Dept.	UHP	$75,000.00
Bossier Parish Sheriff's Dept.	UHP	$434,021.00
City of Westwego	COPS in Schools	$101,934.00
City of Shreveport	Interoperable Communications Tech.	$2,998,901.00
	Total Awarded	$5,306,337.00

Jurisdictions in Louisiana received less than one percent of the total amount of Law Enforcement Technology and CIS funds awarded by the COPS Office in FY2004. Less than two percent of all UHP funding in FY2004 went to jurisdictions in Louisiana. The City of Shreveport received 3.6 percent of the Interoperable Communications Technology funding awarded in FY2004.

Fiscal Year 2005. In FY2005, jurisdictions in Louisiana received a total of $7,453,750 in COPS funding. Like FY2003 and FY2004, awards made by the COPS Office to jurisdictions in Louisiana were done under three different programs, as shown in **Table 6**. Three awards were made under the Law Enforcement Technology grant program, for a total of $686,657. Only one award was made under the Interoperable Communications Technology Program, in the amount of $5,999,184. Two awards were made by the COPS Office under the RCPI program, for a total of $767,909.

Table 6: COPS Grants Awarded to Jurisdictions in Louisiana in FY2005

Agency	Grant Program	Funding
New Orleans Metropolitan Crime Commission	Law Enforcement Technology	$98,664.00
Bastrop Police Dept.	Law Enforcement Technology	$246,661.00
Northwestern State University	Law Enforcement Technology	$341,332.00
Baton Rouge Police Dept.	Interoperable Communications Tech.	$5,999,184.00
Northwestern State University	RCPI	$600,000.00
Northwestern State University	RCPI	$167,909.00
	Total Awarded	$7,453,750.00

Jurisdictions in Louisiana received 0.5 percent of the total amount of Law Enforcement Technology funding awarded by the COPS Office in FY2005. The Baton Rouge Police Department received six percent of the total amount of Interoperable Communications Technology funding awarded in FY2005. Also, Northwestern State University received five percent of RCPI funding awarded by the COPS Office for FY2005.

COPS Funding Awarded to Jurisdictions in Mississippi

Fiscal Year 2003. In FY2003, a total of $3,251,953 was awarded by the COPS Office in Mississippi. As shown in **Table 7**, funds awarded to jurisdictions in Mississippi by the COPS Office were done under four different programs. Five Law Enforcement Technology grants were awarded in Mississippi during FY2003, for a total of $1,559,796. Seven UHP grants were awarded in Mississippi, for a total of $1,325,545. Only one CIS grant, for $94,513, was awarded in Mississippi in FY2003. Five HSOP grants were awarded in Mississippi for a total of $272,099.

Table 7: COPS Grants Awarded to Jurisdictions in Mississippi in FY2003

Agency	Grant Program	Funding
Columbia Police Dept.	Law Enforcement Technology	$248,375.00
Leake County Board of Supervisors	Law Enforcement Technology	$94,383.00
Simpson County Sheriff's Dept.	Law Enforcement Technology	$844,475.00
Warren County Sheriff's Dept.	Law Enforcement Technology	$248,375.00
Wilkinson County Sheriff's Dept.	Law Enforcement Technology	$124,188.00
Alcorn County Sheriff's Dept.	UHP	$75,000.00
DeSoto County Sheriff's Dept.	UHP	$299,067.00
City of Hattiesburg	UHP	$349,946.00
Pearl River Community College	UHP	$150,385.00
City of Sardis	UHP	$217,951.00
University of Southern Mississippi	UHP	$193,871.00
Vaiden Police Dept.	UHP	$39,325.00
Okolona Police Dept.	COPS in Schools	$94,513.00
Gulfport Police Dept.	Homeland Security Overtime	$139,759.00
Jackson County Sheriff's Dept.	Homeland Security Overtime	$68,948.00
City of Sardis	Homeland Security Overtime	$20,803.00
City of Starkville	Homeland Security Overtime	$22,896.00
Mississippi State University	Homeland Security Overtime	$19,693.00
	Total Awarded	$3,251,953.00

Less than one percent of the total amount of Law Enforcement Technology, CIS, and HSOP funds was awarded to jurisdictions in Mississippi in FY2003. Less than two percent of the UHP funds awarded by the COPS Office were awarded to jurisdictions in Mississippi.

Fiscal Year 2004. In FY2004, a total of $2,271,770 was awarded to jurisdictions in Mississippi by the COPS Office. As shown in **Table 8**, grants awarded to jurisdictions in Mississippi in FY2004 were done under three different programs. Three Law Enforcement Technology grants were made in Mississippi in FY2004, for a total of $444,557. Four UHP grants were awarded in Mississippi, for a total of $912,130. Four CIS grants were also awarded in Mississippi in FY2004, for a total of $915,083.

Table 8: COPS Grants Awarded to Jurisdictions in Mississippi in FY 2004

Agency	Grant Program	Funding
City of Jackson	Law Enforcement Technology	$98,948.00
Jackson County Sheriff's Dept.	Law Enforcement Technology	$98,948.00
Lee County Sheriff's Dept.	Law Enforcement Technology	$246,661.00
Booneville Police Dept.	UHP	$75,000.00
City of Mound Bayou	UHP	$204,501.00
Pearl River County Sheriff's Dept.	UHP	$412,500.00
City of D'Iberville	UHP	$220,129.00
Alcorn County Sheriff's Dept.	COPS in Schools	$103,192.00
Marion County Sheriff's Dept.	COPS in Schools	$251,769.00
Ripley Police Dept.	COPS in Schools	$195,082.00
Harrison County Sheriff's Dept.	COPS in Schools	$365,040.00
	Total Awarded	$2,271,770.00

Less than one percent of all of the FY2004 Law Enforcement Technology grant funding went to jurisdictions in Mississippi. Approximately 1.3 percent of UHP funding awarded by the COPS Office in FY2004 was awarded to jurisdictions in Mississippi. Less than two percent of all CIS funding for FY2004 went to jurisdictions in Mississippi.

Fiscal Year 2005. In FY2005, a total of $1,479,965 was awarded to jurisdictions in Mississippi by the COPS Office. As shown in **Table 9**, only two awards were made in Mississippi in FY2005, both under the Law Enforcement Technology program.

Table 9: COPS Grants Awarded to Jurisdiction in Mississippi in FY2005

Agency	Grant Program	Funding
Yazoo City Police Dept.	Law Enforcement Technology	$493,322.00
Southaven Police Dept.	Law Enforcement Technology	$986,643.00
	Total Awarded	$1,479,965.00

Approximately 1.1 percent of all Law Enforcement Technology funding went to the two jurisdictions in Mississippi that received funding in FY2005.

Office for Domestic Preparedness (ODP)

The Office for Domestic Preparedness (ODP) was transferred from the Department of Justice to the Department of Homeland Security (DHS) by Section 430, Title IV of the Homeland Security Act of 2002 (P.L. 107-296). ODP has primary responsibility for United States government terrorism preparedness.[13] ODP administers grants to state, local, and tribal first responder entities (such as law enforcement, emergency management, fire departments, and emergency medical services) that assist their preparedness activities. Since FY2003, ODP has awarded approximately $480 million to Alabama, Louisiana, and Mississippi first responders.

Since September 11, 2001 funding appropriated by Congress for DHS programs to enhance first responders' capabilities has largely emphasized enhancing capabilities to respond to terrorist attacks. The Homeland Security Act of 2002 and Homeland Security Presidential Directive-8, however, direct DHS to take an all-hazards approach to national emergency preparedness with a special emphasis on terrorism.[14] As a result, DHS grant guidance for the State Homeland Security Grant and the Urban Area Security Initiative grant programs, the two largest sources of DHS grants funds available to state and local first responders, is designed to support an all-hazards approach to planning, equipment, and training to enhance the capabilities of first responders to respond to terrorist attacks and to a lesser extent natural disasters.

ODP Grant Programs

A brief summary of ODP grant programs under which funding was awarded to first responder entities in Alabama, Louisiana, and Mississippi follows:

- Alabama received $216,130,186, from FY2003 to FY2005 under the ODP State Homeland Security Grant Program (SHSGP), the Critical Infrastructure Protection Program (CIP), the Citizen Corps Programs (CCP), the Law Enforcement Terrorism Prevention Program (LETPP), the Assistance to Firefighters Program (FIRE), and the Emergency Management Performance Grant Program (EMPG);
- Louisiana received $140,038,519, from FY2003 to FY2005 under the ODP State Homeland Security Grant Program (SHSGP), the Critical Infrastructure Protection Program (CIP), the Citizen Corps Programs (CCP), the Law Enforcement Terrorism Prevention Program (LETPP), the Assistance to Firefighters Program (FIRE), and the Emergency Management Performance Grant Program (EMPG); and
- Mississippi received $123,583,324, from FY2003 to FY2005 under the ODP State Homeland Security Grant Program (SHSGP), the Critical Infrastructure Protection Program (CIP), the Citizen Corps Programs (CCP), the Law Enforcement Terrorism Prevention Program (LETPP), the Assistance to Firefighters Program (FIRE), and the Emergency Management Performance Grant Program (EMPG).

State Homeland Security Grant Program (SHSGP). This assistance program provides financial assistance to states and U.S. insular areas to prepare for terrorist attacks involving weapons of mass destruction (WMD). The program authorizes purchase of specialized equipment to enhance state and local agencies' capability in preventing and responding to WMD incidents, and provides funds for protecting critical infrastructure of national importance. This program provides grant funds for designing, developing, conducting, and evaluating WMD exercises; developing and conducting WMD training programs; and updating and implementing each state's Homeland Security Strategy (SHSS).[15]

SHSGP funds may be used to plan for, design, develop, conduct, and evaluate exercises that train first responders, and to assess the readiness of state and local jurisdictions to prevent and respond to terrorist attacks. Exercises must be threat- and performance-based, in accordance with ODP Homeland Security Exercise and Evaluation Program (HSEEP) manuals. Exercises conducted with funds from this program must be managed and executed in accordance with HSEEP.[16]

Funds from this program may be used to enhance the capabilities of state and local first responders through the development of a state homeland security training program. Allowable training costs include establishment of WMD training capacities within existing training academies, universities, and junior colleges.[17]

States are the only authorized applicants, with the following state and local entities eligible to receive funding:

- Emergency management agencies or offices;
- Homeland security agencies or offices;
- Fire departments;
- Law enforcement agencies;
- Emergency medical services;
- Hazardous material-handling personnel;
- Public works agencies or offices;
- Public health agencies or offices;
- Governmental administrative agencies or offices; and
- Public safety communications agencies or offices.[18]

Citizen Corps Programs (CCP). On January 29, 2002, President Bush issued an executive order[19] which established the USA Freedom Corps. USA Freedom Corps' mission is to increase opportunities for citizens by expanding and enhancing public service. Within the USA Freedom Corps, the Citizen Corps program was established to coordinate volunteer organizations, with the mission to make local communities safe and prepared to respond to any emergency situation. Community Emergency Response Teams (CERT) is the only program of the four which Citizen Corps administers that provides grant funding to volunteer first responders.

CERT trains people to be prepared to respond to emergency situations in their own local communities. CERTs are groups of volunteers within communities that are trained by professional first responders to assist in the event of a disaster. CERT members give critical support to first responders, provide immediate assistance to victims, and organize spontaneous volunteers at a disaster site.

This program authorizes funding for training of CERT members only. The CERT program is a professionally instructed course taught by a team of first responders who have the requisite knowledge and skills. The course, taught to groups of citizens within their communities, consists of two and a half hour sessions held one evening a week, over a seven week period.[20] States apply for a grant under this program, while any community that has established a Citizen Corps Council is also eligible to receive funding from it.

Law Enforcement Terrorism Prevention Program (LETPP). In the FY2004 DHS appropriations, Congress directed ODP to establish a local law enforcement terrorism prevention grant program for states and localities.[21] This program provides funds to support activities to establish and enhance state and local efforts to prevent and deter terrorist attacks. Eligible program activities authorized include:

- Information sharing to preempt terrorist attacks;
- Target hardening to reduce vulnerability of selected high value targets;
- Threat recognition to identify potential or actual threats; and
- Intervention activities to interdict terrorists.

Approved costs for this program include, but are not limited to, personnel costs (including overtime as approved by the state administering agency), equipment, systems, and related expenses.[22] State and local law enforcement agencies are authorized to apply for grant funding under this program.

Assistance to Firefighters Program (FIRE). This program awards one-year grants directly to fire departments to enhance their abilities to respond to fires and fire-related hazards.[23] The program seeks to support fire departments that lack the tools and resources necessary to protect the health and safety of the public and firefighting personnel.[24] At least five percent of the funds go to prevention programs, and recipients agree to contribute a 30 percent nonfederal match if the

local population is greater than 50,000, or 10 percent if the local population is 50,000 or less. Grant recipients may not receive more than $750,000 for any fiscal year.[25] The program's grant application process is competitive, and applications are peer reviewed by state and local fire department officials.

FIRE program provides funds to support firefighter safety, fire prevention, emergency medical services, and firefighting vehicle acquisition. Individual fire departments are eligible to apply for grants under this program.

Emergency Management Performance Grant Program (EMPG). This program is designed to assist the development, maintenance, and improvement of state and local emergency management capabilities. It provides support to state and local governments to achieve measurable results in key functional areas of emergency management.[26]

EMPG funds are used for emergency management personnel costs, travel, training, supplies, and other routine expenditures for emergency management activities.[27] Funds from this grant program may also be used for consequence management preparedness projects and programs that develop and improve the capabilities of states and localities to prepare for, respond to, and recover from acts of terrorism involving WMD.[28]

States may use the funds provided through the EMPG to structure their individual emergency management programs based on identified needs and priorities for strengthening emergency management capabilities. States may also use EMPG funds to develop intrastate emergency management systems that encourage partnership building among government, business, and volunteer and community organizations.[29] State emergency management agencies or offices are eligible applicants and recipients of this grant program; additionally, state emergency management agencies may pass funds to emergency management offices at the local level.

ODP Funding Awarded to Alabama

Fiscal Year 2003. In FY2003, Alabama received a total of $61,348,493 from ODP. ODP funding awarded to Alabama in FY2003 was done under five different grant programs, as shown in **Table 10.**

Table 10: ODP Grants Awarded to Alabama in FY2003

Grant Program	Funding
State Homeland Security Grant Program	$31,200,000.00
Citizen Corps	$500,000.00
Critical Infrastructure Protection	$3,300,000.00
Assistance to Firefighters Program	$23,548,493.00
Emergency Management Performance Grant Program	$2,800,000.00
Total Awarded	$61,348,493.00

Fiscal Year 2004. In FY2004, Alabama received a total of $108,732,787 from ODP. ODP funding awarded to Alabama in FY2004 was done under five different grant programs, as shown in **Table 11**.

Table 11: ODP Grants Awarded to Alabama in FY2004

Grant Program	Funding
State Homeland Security Grant Program	$28,000,000.00
Citizen Corps	$600,000.00
Law Enforcement Terrorism Prevention Program	$8,300,000.00
Assistance to Firefighters Program	$68,932,787.00
Emergency Management Performance Grant Program	$2,900,000.00
Total Awarded	$108,732,787.00

Fiscal Year 2005. In FY2005, Alabama received a total of $46,048,906, in funding from ODP. ODP funding awarded to Alabama in FY2005 was done under five different grant programs, as shown in **Table 12.**

Table 12: ODP Grants Awarded to Alabama in FY2005

Grant Program	Funding
State Homeland Security Grant Program	$17,000,000.00
Citizen Corps	$200,000.00
Law Enforcement Terrorism Protection Program	$6,400,000.00
Assistance to Firefighters Program	$19,548,906.00
Emergency Management Performance Grant Program	$2,900,000.00
Total Awarded	$46,048,906.00

ODP funding Awarded to Louisiana

Fiscal Year 2003. In FY2003, Louisiana received a total of $51,048,654 from ODP. ODP funding awarded to Louisiana in FY2003 was done under five different grant programs, as shown in **Table 13.**

Table 13: ODP Grants Awarded to Louisiana in FY2003

Grant Program	Funding
State Homeland Security Grant Program	$32,200,000.00
Citizen Corps	$500,000.00
Critical Infrastructure Protection	$3,300,000.00
Assistance to Firefighters Program	$12,248,654.00
Emergency Management Performance Grant Program	$2,800,000.00
Total Awarded	$51,048,654.00

Fiscal Year 2004. In FY2004, Louisiana received a total of $51,159,534 from ODP. ODP funding awarded to Louisiana in FY2004 was done under five different grant programs, as shown in **Table 14.**

Table 14: ODP Grants Awarded to Louisiana in FY2004

Grant Program	Funding
State Homeland Security Grant Program	$28,000,000.00
Citizen Corps	$600,000.00
Law Enforcement Terrorism Prevention Program	$8,300,000.00
Assistance to Firefighters Program	$11,359,534.00
Emergency Management Performance Grant Program	$2,900,000.00
Total Awarded	$51,159,534.00

Fiscal Year 2005. In FY2005, Louisiana received a total of $37,830,331 from ODP. ODP funding awarded to Louisiana in FY2005 was done under five different grant programs, as shown in **Table 15.**

Table 15: ODP Grants Awarded to Louisiana in FY2004

Grant Program	Funding
State Homeland Security Grant Program	$17,700,000.00
Citizen Corps	$200,000.00
Law Enforcement Terrorism Prevention Program	$6,400,000.00
Assistance to Firefighters Program	$10,630,331.00
Emergency Management Performance Grant Program	$2,900,000.00
Total Awarded	$37,830,331.00

ODP Funding Awarded to Mississippi

Fiscal Year 2003. In FY2003, Mississippi received a total of $46,208,491 from ODP. ODP funding awarded to Mississippi in FY2003 was done under five different grant programs, as shown in **Table 16.**

Table16: ODP Grants Awarded to Mississippi in FY2003

Grant Program	Funding
State Homeland Security Grant Program	$25,000,000.00
Citizen Corps	$400,000.00
Critical Infrastructure Protection	$2,700,000.00
Assistance to Firefighters Program	$15,908,491.00
Emergency Management Performance Grant Program	$2,200,000.00
Total Awarded	$46,208,491.00

Fiscal Year 2004. In FY2004, Mississippi received a total of $43,564,925 from ODP. ODP funding awarded to Mississippi in FY2004 was done under five different grant programs, as shown in **Table 17**.

Table 17: ODP Grants Awarded to Mississippi in FY2004

Grant Program	Funding
State Homeland Security Grant Program	$22,400,000.00
Citizen Corps	$500,000.00
Law Enforcement Terrorism Prevention Program	$6,700,000.00
Assistance to Firefighters Program	$11,564,925.00
Emergency Management Performance Grant Program	$2,400,000.00
Total Awarded	$43,564,925.00

Fiscal Year 2005. In FY2005, Mississippi received a total of $31,109,908 from ODP. ODP funding awarded to Mississippi in FY2005 was done under five different grant programs, as shown in **Table 18.**

Table 18: ODP Grants Awarded to Mississippi in FY2005

Grant Program	Funding
State Homeland Security Grant Program	$14,200,000.00
Citizen Corps	$200,000.00
Law Enforcement Terrorism Prevention Program	$5,200,000.00
Assistance to Firefighters Program	$9,209,908.00
Emergency Management Performance Grant Program	$2,300,000.00
Total Awarded	$31,109,908.00

[1] The programs are authorized in the following statutes: Flood Mitigation Assistance - 42 U.S.C. § 4104(c)-(d) (2005); Hazard Mitigation Grant Program - 42 U.S.C. § 5170(c) (2005); Pre-Disaster Mitigation - 42 U.S.C. § 5133 (2005).
[2] U.S. Dep't. of Justice, Cmty. Oriented Policing Servs. Office [hereinafter DOJ COPS Office], About Cmty. Oriented Policing Servs. Office, http://www.cops.usdoj.gov/Default.asp?Item=35, (last visited Oct. 25, 2005) [hereinafter About DOJ COPS Office website].
[3] DOJ COPS Office website, Message from the Dir., http://www.cops.usdoj.gov/Default.asp?Item=37, (last visited Oct. 25, 2005).
[4] About DOJ COPS Office website.
[5] DOJ COPS Office, COPS Fact Sheet: Interoperable Communications Tech., http://www.cops.usdoj.gov/mime/open.pdf?Item=947, (last visited Oct. 25, 2005).
[6] DOJ COPS Office, COPS Tech. Grants, http://www.cops.usdoj.gov/Default.asp?Item=58, (last visited Oct. 25, 2005).
[7] Telephone call by Select Comm. Staff with DOJ COPS Office personnel (Oct. 25, 2005).
[8] DOJ COPS Office, Universal Hiring Program, http://www.cops.usdoj.gov/Default.asp?Item=53, (last visited Oct. 25, 2005).
[9] DOJ COPS Office, COPS in Schools, http://www.cops.usdoj.gov/default.asp?Item=54, (last visited Oct. 25, 2005).
[10] DOJ COPS Office, Homeland Sec. Overtime Program, http://www.cops.usdoj.gov/default.asp?Item=1023, (last visited Oct. 25, 2005).
[11] Telephone call by Select Comm. Staff with DOJ COPS Office personnel (Nov. 21, 2005).
[12] DOJ COPS Office, Reg'l Cmty. Policing Insts., http://www.cops.usdoj.gov/default.asp?Item=229 (last visited Jan. 30, 2005) (The website provides a list of all Reg'l Cmty. Policing Insts. across the United States).
[13] Homeland Sec. Act (2002), Pub. L. No. 107-296, 116 Stat. 2135 (2002).
[14] Directive on Mgmt. of Nat'l Preparedness, 39 WEEKLY COMP. PRES. DOC. 1822 (Dec. 17, 2003) (Known as Homeland Sec. Presidential Directive/HSPD-8).
[15] Office for Domestic Preparedness, U.S. Dep't of Homeland Sec., *Fiscal Year 2004 State Homeland Security Grant Program: Program Guidelines and Application Kit*, 1 (2003).
[16] *Id.* at 3.
[17] *Id.* at 4.
[18] *Id.* at 2.
[19] Establishing the USA Freedom Corps, 67 Fed. Reg. 4869 (2002).
[20] Emergency Mgmt. Inst., Community Emergency Response Team Overview, http://training.fema.gov/emiweb/CERT/overview.asp (last visited Apr. 1, 2004).
[21] 2004 Dep't of Homeland Sec. Appropriations Act, Pub. L. No. 108-90, 117 Stat. 1137 (2003).
[22] S. REP. NO. 108-86 (2003).
[23] House REP. NO. 108-280 (2003) (In the conference report to accompany H.R. 2555, the Assistance to Firefighters grant program is to be administered by the Office of Domestic Preparedness. It also specifies that the grant administration process will not be changed from the present procedures, to include peer review and involvement by United States Fire Admin).
[24] Fed. Emergency Mgmt. Agency, U.S. Dep't of Homeland Sec., *FY2003 Assistance to Firefighters Grant Program Guidance*, 2 (2003).
[25] Floyd D. Spence Nat'l Def. Authorization Act for FY 2001, Pub. L. No. 106-398, § 1701, 114 Stat. 1654 (2000).
[26] 26 Fed. Emergency Mgmt. Agency, U.S. Dep't of Homeland Security, *FY2003 Emergency Management Performance Grant Program Guidance to States*, 2 (2003).
[27] *Id.* at 6.
[28] *Id.* at 8.
[29] *Id.* at 9.

APPENDIX 5

KEY FEDERAL LAW ENFORCEMENT ACTIONS IN RESPONSE TO KATRINA

The Federal Bureau of Investigations established a Tactical Operations Center and utilized its Fly Teams to assist in fingerprinting victims and potential recovery contractors

The Federal Bureau of Investigations (FBI) accomplished core mission functions in response to the hurricane by establishing a Tactical Operations Center to support the FBI's tactical teams. In addition, FBI Fly Teams assisted FEMA's Disaster Mortuary Operational Response Team in identifying 112-115 hurricane victims by computerized fingerprint matching. FBI Fly Teams also assisted FEMA in identifying 458 criminal histories out of 2,900 potential hurricane recovery contractors through fingerprinting.

The FBI is the "principal investigative arm of the United States Department of Justice." The FBI's mission is to:

> [U]phold the law through the investigation of violations of federal criminal law; to protect the United States from foreign intelligence and terrorist activities; to provide leadership and law enforcement assistance to federal, state, local, and international agencies; and to perform these responsibilities in a manner that is responsive to the needs of the public and is faithful to the Constitution of the United States.[1]

The United States Attorney General can authorize the FBI to assist state and location authorities in a "law enforcement emergency."[2] The FBI may provide public safety support to state and local authorities in a presidentially declared "major disaster."[3]

The FBI's Law Enforcement Services Branch coordinates the Bureau's preparation for and response to a domestic emergency.[4] Staff from all offices within this branch were utilized after Hurricane Katrina. In addition, the FBI called upon its Administrative Services Division, Counterterrorism Division, Criminal Investigative Division, Cyber Division, Directorate of Intelligence, Finance Division, Information Technology Operations Division, and Security Division.

There are approximately 225 employees assigned to the FBI's New Orleans Field Office, which has jurisdiction over all FBI authority in the state of Louisiana.[5] The FBI has field offices in Jackson, Mississippi and Mobile, Alabama.[6] As part of the Jackson Field Office, the FBI has Resident Agencies in Pascagoula, Hattiesburg, and Gulfport, Mississippi.[7]

On August 26, the Jackson Field Office notified each supervisor at its Resident Agencies to implement their hurricane plans.[8] This required installing hurricane shutters, securing vehicles, bagging computers and equipment, and locking the safes. Authorized personnel on the Mississippi coast moved to the Jackson Field Office.

By 6:00 p.m. on August 29, the Jackson Field Office moved its traditional FBI operations to the Resident Agency in Oxford, Mississippi.[9] Also that evening, the FBI used an airplane to survey the damage to the Resident Agencies on the coast. The Jackson Field Office was able to electronically monitor the security alarms of its Resident Agencies in the affected area. FBI personnel who remained on the coast were dispatched to the Resident Agencies and confirmed that all offices were still secure.

On August 29, after Katrina's landfall, the Special Agent-in-Charge (SAC) of New Orleans and four other FBI agents surveyed the damage to the New Orleans Field Office.[10] The roof suffered significant damage, leaving sixty percent of the top floor uncovered. Due to the sensitivity of documents housed in the Field Office, the SAC and the four agents remained at the building to ensure its security.

Because of the damage to the building, the SAC decided to move the New Orleans Field Division to the Louisiana State Police (LSP) headquarters in Baton Rouge.[11] An Assistant Special Agent-In-Charge (ASAC) from the New Orleans Field Office went to Baton Rouge while the New Orleans SAC stayed in New Orleans. The Operational Technology Division

(OTD) left Quantico, Virginia, with 16 FBI personnel to deliver communication equipment to the affected area so the New Orleans Field Office could communicate with FBI headquarters.[12] FBI command vehicles — tractor trailers containing mobile offices — were deployed to Baton Rouge and the Jackson Field Office.[13]

Within 12 hours after Hurricane Katrina subsided, the Jackson Field Office was in contact with all of its personnel.[14] On August 30, OTD dispatched a mobile command post to Mississippi. The Jackson ASAC participated in another airplane survey of the area. The Jackson Field Office office manager left Jackson via car for the coast in order to assess damage to the Hattiesburg Resident Agency. While the Hattiesburg building remained secure, the Pascagoula Resident Agency sustained water damage to the ceiling, wall cavities, and carpet. The office was able to secure a temporary facility through the Navy free of charge. The Gulfport Resident Agency sustained similar water damage. The office was located on the top floor of a building and the attic of the building flooded. The FBI was able to work with government contractors to clean the office, and it was habitable by October 1.

The same day, Jackson Field Office personnel met with several military officials to determine where the temporary FBI command post should be located.[15] The FBI decided on Keesler Air Force Base, as there was a hotel on the property with showers and bathrooms. Some FBI personnel from the Jackson Field Office were also Air Force reservists and they had access to goods and services provided to Air Force employees.

On August 30, FBI headquarters officials put their Field Offices on alert that additional personnel were needed in the affected area.[16] Ten Special Weapons and Tactics (SWAT) agents from the Houston Division were deployed to New Orleans to assist the New Orleans Police Department (NOPD) SWAT.[17] The agents from Houston brought a boat that enabled them to transport personnel and supplies. The FBI SWAT agents relieved the New Orleans SAC and agents who had stayed to secure the New Orleans Field Office.

FBI personnel and equipment from Critical Incident Response Group (CIRG) and OTD arrived on August 31 in Baton Rouge and established a Command Post in Baton Rouge at the LSP headquarters.[18] Among the equipment were tents that FBI personnel used as shelter at the Command Post.[19]

By 2:00 a.m. on August 31, the FBI Command Post at Keesler Air Force Base was operational.[20] FBI agents from the Mobile and Miami Field Offices were deployed to work there. These agents assisted with health, safety, and welfare checks on other agents and citizens in the area. FBI sent employee assistance personnel, most of whom had crisis management backgrounds, to work with agents' family members. The first agents on the scene stayed the first week after the hurricane. After that, additional agents began rotating into the area. The second week, agents were deployed from FBI Headquarters to the Command Post. SWAT from the Little Rock Field Office were used to provide security at the Command Post and the Resident Agencies in Mississippi's affected area.

In a fortunate coincidence, the Command Post had an FBI employee who formerly worked for FEMA.[21] This employee checked in daily with FEMA in Jackson and on the coast and the Mississippi Emergency Management Agency. The Command Post also communicated with the Mississippi Bureau of Criminal Investigations, the Mississippi Highway Patrol, and the Homeland Security Director for Mississippi, who was also the former FBI Jackson Field Office SAC. The agents at the Command Post worked with local police and sheriffs to respond to requests for assistance.

On September 1, CIRG deployed agents from the Dallas, Atlanta, Baltimore, and Houston SWAT teams and Hostage Rescue Teams to continue to help NOPD control the affected area.[22] The FBI was able to create a Virtual Command Center for the Law Enforcement On-Line Internet site.[23] All law enforcement nationwide were able to log onto the website and receive daily situation reports regarding FBI relief efforts.[24]

The FBI established a Tactical Operations Center (TOC) in Sorrento, Louisiana on September 4.[25] Kenneth Kaiser, the Boston SAC, was deployed to Sorrento to oversee the TOC.

On September 3, the Laboratory Disaster Squad and the CJIS Fly Teams were deployed to St. Gabriel, Louisiana to assist with FEMA's National Disaster Medical System Center's Disaster Mortuary Operational Response Team (DMORT).[26] LSP, the National Guard, and local police were delivering deceased victims of the storm to St. Gabriel.[27] The DMORT

was responsible for the handling of the bodies. The Fly Teams and the FBI's Evidence Recovery Teams worked together to submit the victims' fingerprints electronically to CJIS and the Integrated Automated Fingerprint Identification System (IAFIS) to search for identifying fingerprint matches.[28] In total, 750 unidentified bodies were brought to the DMORT and 112-115 bodies were identified using IAFIS.[29]

Also on September 3, a finance employee was sent from FBI headquarters to the FBI Command Post at Keesler Air Force Base.[30] This enabled the agents in Mississippi to purchase gas from the Air Force. By September 4, all FBI personnel living in the affected area of Louisiana were located.[31]

On September 5, CJIS Fly Teams helped FEMA fingerprint potential contractors for the Hurricane response.[32] This took place in Orlando and consisted of fingerprinting technology that identified if contracting applicants had criminal histories. The FBI and FEMA fingerprinted 2,900 potential contractors, detecting 458 criminal histories.

The FBI continued to deploy and assign personnel to assist state and local police.[33] The Violent Gang Task Force from the New Orleans Division worked out of the Gretna Police Department. Over 30 more agents coordinated with NOPD to back up NOPD SWAT, FBI SWAT, and HRT Special Agents. The FBI's Rapid Deployment Teams were sent to crisis sites to assist with administrative issues.

The FBI also utilized its air assets in responding to Hurricane Katrina.[34] They flew daily helicopter flights moving law enforcement personnel, equipment, supplies, and evacuees.[35] In addition, the FBI flew 12 missions utilizing its fixed wing assets for moving FBI personnel and equipment from Washington, D.C. to New Orleans and Jackson.[36] There were 1,200 FBI employees involved.[37] Seven hundred were deployed to the New Orleans area.

The Bureau of Alcohol, Tobacco, Firearms and Explosives secured buildings containing firearms, located and inspected all federal firearms and explosive licensees, recovered lost and stolen firearms, and dismantled explosives in the New Orleans area

Following the hurricane, the Bureau of Alcohol, Tobacco, Firearms and Explosives (ATF) established a Critical Incident Management Response Team (CIMRT). The CIMRT coordinates ATF's law enforcement operations and ensures that ATF continues its primary law enforcement missions. ATF located and secured buildings containing firearms, conducted inspections to ensure the safety of all individuals licensed to use firearms and explosives, worked to match stolen or lost firearms with their rightful owners, and dismantled explosives in New Orleans.

ATF's mission is to "conduct criminal investigations, regulate the firearms and explosives industries, and assist other law enforcement agencies."[38] This mission is in place so ATF's work can "prevent terrorism, reduce violent crime and to protect the public in a manner that is faithful to the Constitution and the laws of the United States." ATF's authority to respond to domestic emergencies is found in the Gun Control Act of 1968, the National Firearms Act, the Arms Export Control Act, and the Federal Explosives Laws.[39]

ATF's involvement in the preparation for Hurricane Katrina began on August 23.[40] Throughout that week, ATF headquarters in Washington, D.C. coordinated with its Houston, New Orleans (which includes the entire states of Louisiana and Mississippi), Nashville (which includes the state of Alabama), Tampa, and Miami Field Divisions to prepare for Katrina's landfall in Florida and the Gulf coast.[41] On August 25 and 26, ATF headquarters ordered the evacuation of ATF personnel in New Orleans and Mississippi, the New Orleans Special Agent in Charge (SAC) pre-identified those persons who were staying in the area, and those evacuating were instructed to call their immediate supervisor after the storm.[42]

On August 29, as Katrina made landfall, ATF headquarters began notifying the Field Divisions closest to New Orleans that assistance was needed.[43] These Field Divisions were asked to identify resources and personnel to be detailed to the affected area. Within eight hours, ATF identified the Nashville, Houston, and Dallas Field Divisions as those to detail personnel.[44]

On August 30, ATF personnel located in the affected area worked to assess the damage to ATF facilities on the Gulf coast.[45] The first floor of ATF's Biloxi Field Office was destroyed and the second floor sustained significant damage. The New Orleans Division Office, located on the fifth floor of an office building, was flooded when the levies broke.[46]

Due to significant damage to the ATF's facilities, a Continuity of Operations (COOP) site in Mandeville, Louisiana was activated on August 30.[47] The New Orleans Division Office was relocated to Shreveport, Louisiana to resume its responsibilities over the states of Louisiana and Mississippi.[48] The Biloxi Field Office was relocated behind the Harrison County Sheriff's Department building to a public safety compound.[49]

ATF also established CIMRT in Baton Rouge.[50] A CIMRT is established at or near an incident to conduct on-scene management, coordinate the law enforcement operations, and ensure that ATF continues its primary law enforcement mission.[51] Two Assistant Special Agents-In-Charge were responsible for CIMRT.

On August 30, ATF began contacting each ATF employee residing in the affected area.[52] In addition, a Critical Incident Management Support Team (CIMST) was created at ATF headquarters.[53] A CIMST serves as the point of contact for CIMRT at headquarters, coordinating large procurements of supplies and equipment, and lending technical support. One of ATF's three Deputy Assistant Directors for Field Operations was in command of CIMST.[54] CIMST quickly began evaluating the needs on the coast.[55] All ATF personnel detailed to the affected area were instructed to bring enough food and water for a week and to be prepared to sleep in their cars, in the event food and shelter did not reach the coast prior to their arrival.

Simultaneously on August 30, ATF headquarters formed the Emergency Management Working Group (EMWG).[56] The EMWG was tasked with handling non-law enforcement logistical needs arising out of the hurricane.[57] The EMWG was staffed with ATF support and COOP staff who worked on administrative issues, such as payroll, and coordinated with the U.S. General Services Administration regarding building space.[58] The EMWG held daily teleconferences with ATF stations on the coast to assess the resource needs for personnel.[59]

On August 31, ATF Field Divisions in Atlanta, Dallas, and Miami dispatched their Command and Control vehicles to Algiers and Mandeville, Louisiana and Biloxi, Mississippi.[60] These are large Winnebago-style vehicles that hold mobile command posts, work stations, and office equipment, allowing ATF personnel to conduct meetings and maintain communications.[61] Also on August 31, CIMST became a twenty-four-hour-a-day, seven-day-a-week operation at ATF headquarters.[62]

An assessment of ATF's Mobile field office was received on September 1.[63] The field office's first floor was flooded.[64] On September 3, the Mobile field office and personnel were moved to Brookley Air Force Base, an inactive base in the Mobile area.[65]

The first group of ATF personnel detailed to the affected area arrived on Friday, September 2.[66] Thirty-four members of Special Response Teams (SRT) from the Dallas and Detroit Field Offices and seven SRT support staff were deployed to Algiers. SRT are tactical teams specifically trained to handle high risk law enforcement and civil unrest.[67] The SRT members were sent to New Orleans to assist the NOPD, whose SWAT teams were down to 25 percent capacity. ATF set up a Tactical Operations Command Post with satellite communications in the parking lot of a post office in Algiers and SRT members slept in the building.[68] The NOPD was stationed at a school across the street from the post office.[69] The close proximity enabled SRT and NOPD to coordinate their efforts.

On September 3, ATF helped the U.S. Department of Justice (DOJ) establish a detention center at the Greyhound Bus Station in downtown New Orleans.[70] The detention center was created to house individuals arrested for crimes committed after the hurricane. ATF also provided security for the Assistant United States Attorneys assigned to the detention center.[71] The detention facility was supported by staff from the Angola State Prison in Louisiana and the United States Attorney's Office.[72] The facility, which processed state and federal arrests, contained holding cells where arrestees stayed for approximately 24 hours prior to being transported to Baton Rouge.[73]

Throughout the week, ATF continued to operate out of the COOP facility in Mandeville and CIMRT in Baton Rouge.[74] ATF support staff worked to establish communications and information technology support at CIMRT, as well as locating needed furniture and equipment.[75] By September 7, CIMRT was fully operational.

On September 6 and 7, 10 ATF agents were deployed to Biloxi, and 30 ATF agents were deployed to Gulfport.[76] These agents performed investigative roles, as well as assisting local police with firearms-related calls.[77] No federal arrests were made in Mississippi by ATF agents.[78]

On September 6, the Law Enforcement Coordination Center in Baton Rouge assigned ATF with enforcement activity in the 1st and 8th police districts in the city of New Orleans.[79] ATF also assisted the NOPD in New Orleans 6th district.

Throughout the period immediately following Katrina's landfall, ATF was tasked with carrying out its mission, as well as supporting state and local law enforcement.[80] ATF instructed law enforcement personnel to locate and secure all buildings containing firearms. ATF began to locate and conduct inspections to ensure the safety of all federal firearm and explosive licensees. Due to the voluminous amount of firearms recovered during the week of August 30, ATF began the task of matching up stolen or lost firearms with their legal owners. This process continues into 2006.

During search and rescue missions, law enforcement personnel discovered pipe bombs in some New Orleans homes.[81] As a result, six Explosive Enforcement Officers were deployed to the city on September 12.[82] The same day, ATF agents secured a Federal search warrant for the residences so that officers could dismantle the explosives.

In the month of September, ATF assisted with 600 missions to reduce violent crimes and enforce firearms laws.[83] Ten individuals were arrested for violating federal firearms laws.[84] During the course of searching for missing ATF personnel, ATF officers rescued 26 people.[85] In total, 301 ATF agents and support staff were deployed to the area affected by Hurricane Katrina.[86]

The Drug Enforcement Administration provided Mobile Enforcement Teams to assist with violent missions, and the Office of Diversion Control made exceptions for evacuees to receive prescription medications from neighboring states and established mobile replacement pharmacies

The Drug Enforcement Administration (DEA) performed law enforcement functions and helped resolve prescription medication issues arising from Hurricane Katrina. The DEA deployed Mobile Enforcement Teams (MET) — teams trained to specialize in violent missions — from throughout the country. In addition, DEA's Office of Diversion Control worked with the Boards of Pharmacy in affected and neighboring states to ensure that hurricane victims could receive refills on current prescription medication. The DEA also worked with major chain pharmacies to establish mobile replacement pharmacies for displaced individuals in need of medication.

DEA is charged with enforcing the nation's narcotics laws.[87] DEA derives its authority from the Controlled Substances Act.[88] The mission of DEA

> is to enforce the controlled substances laws and regulations of the United States and bring to the criminal and civil justice system of the United States, or any other competent jurisdiction, those organizations and principal members of organizations, involved in the growing, manufacture, or distribution of controlled substances appearing in or destined for illicit traffic in the United States; and to recommend and support non-enforcement programs aimed at reducing the availability of illicit controlled substances on the domestic and international markets.[89]

In the aftermath of Katrina, the Attorney General granted DEA additional authority to enforce all federal criminal laws.[90] The Attorney General also authorized DEA to help Louisiana state and local law enforcement officials enforce state laws.[91] DEA's involvement with Hurricane Katrina began shortly before landfall.[92] DEA Deputy Administrator Special Agent Michele Leonhart was identified as the "component" within the agency to implement and coordinate Katrina response activities. Authority to discharge these responsibilities was delegated to the New Orleans Field Division Special Agent in Charge (SAC), William Renton.

In anticipation of Katrina's landfall, on August 26, Renton ordered the New Orleans Field Division closed.[93] DEA personnel were asked to evacuate the area.

The New Orleans Field Division and the Gulfport Resident Office were severely damaged by the hurricane.[94] Beginning immediately after the storm and continuing into Tuesday, the New Orleans Field Division began the process of reconstituting its field office by accounting for and identifying the whereabouts of all Field Division personnel — some of whom were in need of rescue.[95] DEA teams were established to facilitate the rescues. In all, 63 DEA employees and family members were rescued by DEA agents. The process of reconstituting its office allows DEA to be most helpful in undertaking other law enforcement roles and responsibilities related to the emergency at hand.[96] After the New Orleans Field Division personnel were located, DEA began assisting local law enforcement in the massive search and rescue effort.[97] Most of the Katrina-related DEA man hours were ultimately spent on search and rescue.[98]

On August 31, command centers were established at the Baton Rouge District Office and in Mobile.[99] At this time, DEA headquarters mobilized Field Divisions from around the country, including agents from the Miami, Atlanta, St. Louis, Dallas, and Houston divisions. These agents responded to Baton Rouge and Gulfport, Mississippi with supplies, including food, water, chain saws, generators, tarps, ice, gasoline, satellite phones, and vehicles.

Headquarters designated the Office of Aviation in Addison, Texas to serve as the Command Center for logistics purposes, instructing field divisions throughout the country to ship necessary supplies to Addison for eventual transportation to the field, principally the Baton Rouge and Gulfport areas.[100] The Addison facility continued to play a key logistics role throughout the DEA recovery effort, coordinating all transportation — including the use of seven DEA aircraft — and supplies for the field. The Command Center was staffed by 12 people from both the Office of Aviation and the Dallas Field Division, the Field Division with responsibility for the Addison Office.

Flight missions were conducted to transport personnel and supplies and to survey the damage.[101] Aerial photography surveys assisted the recovery assignments taking place in the field. Technical personnel were dispatched to re-establish communication links where necessary. The Office of Aviation flew over 280 missions with 14 pilots totaling 782 flight hours, providing transportation and commodity support to local, state, and federal law enforcement throughout the affected region.

On September 1, the New Orleans Field Division established an Operations Center in Mandeville, Louisiana at a local high school.[102] The Mandeville Operations Center coordinated the efforts of various federal, state, and local officials throughout the greater New Orleans area. The Mandeville center coordinated the removal of firearms and sensitive items from the New Orleans Field Office.[103] To assist SAC Renton, the DEA deployed Houston SAC James Craig.

Shortly after Craig's arrival, Renton and he met with New Orleans city officials, including Mayor Nagin and law enforcement officials to assess the law enforcement needs for the city.[104] It was determined that federal law enforcement agencies, such as DEA, FBI, and ATF, among others, would join the New Orleans Police Department (NOPD) and the Louisiana State Police in policing the city of New Orleans.[105] Each NOPD district was staffed by federal law enforcement representatives.

From August 30 to September 12, 251 DEA Temporary Duty agents reported from Miami, Atlanta, St. Louis, Houston, and Dallas to provide law enforcement and search and rescue support as needed.[106] On September 4, DEA deployed personnel from the Atlanta Field Division as well as the Houston Mobile Enforcement Team (MET).[107] METs are self-contained, specially trained teams of eight to twelve agents that specialize in law enforcement missions involving violence.[108] These agents were then joined by the Charlotte MET on September 5, and the Miami MET on September 7.[109] The METs helped state and local departments conduct routine law enforcement tasks, including patrols and search and rescue missions.

On September 1, it was determined the DEA would be in charge of acquiring necessary fuel for DOJ vehicles.[110] SAC Craig oversaw this effort, which involved the bulk purchase of gasoline to be utilized by all DOJ agencies during the recovery effort. DEA also coordinated the provision of motor vehicles for law enforcement purposes in the affected area. Working with the U.S. Marshals Service, DEA provided approximately 30 vehicles for state and local police departments. DEA also arranged for $200,000 from its asset forfeiture budget to be provided to its fleet management group to move seized vehicles into official use.

DEA supported the communications needs of the affected area by supplying Government Emergency Telephone System cards, satellite phones, and other communications equipment, including the installation of Wireless Priority Service.[111]

DEA's Office of Diversion Control played an important role throughout the response to Katrina.[112] The Acting Deputy Assistant Administrator for the Office of Diversion Control was identified to coordinate response activities. The goal was to maintain the availability of controlled substances for medical uses to the affected region.

On August 31, DEA Diversion Control staff convened to review previously negotiated agreements between DEA and FEMA, as well as agreements between DEA and the Centers for Disease Control (CDC).[113] These agreements facilitate delivery of needed supplies by allowing for the waiver of certain regulations in times of emergency. DEA established a point of contact within Diversion Control to coordinate, control and document allowances, waivers and regulatory controls. The Diversion Control website (deadiversion.gov) was re-tooled to handle those affected by Katrina.

On September 1, DEA established contact with the Boards of Pharmacy in Louisiana, Mississippi, and Alabama, as well as states receiving evacuees, including Florida, Texas, and Arkansas.[114] The Boards of Pharmacy were told DEA was making allowances for filling prescriptions upon presentation of a prescription bottle and based upon the professional judgment of the pharmacist.

On September 2, James Crawford, the Special Assistant to the Deputy Assistant Administrator for Diversion Control, began contacting major wholesalers to facilitate the processing of papers permitting these wholesalers to ship product under expedited procedures.[115] Throughout DEA's Katrina response, Crawford and the Diversion Control office worked to streamline processes to ensure Katrina victims received the products they needed.

On September 6, Crawford began working directly with the major chain pharmacies, such as Rite Aid, CVS, Walgreens, and Wal-Mart, to establish mobile replacement pharmacies and pharmacy trailers within shelter areas.[116] Diversion Control's efforts continued through October 27, at which time the New Orleans Divisional Office of Diversion Control was reestablished.

The United States Marshals Service was responsible for protecting the Strategic National Stockpile, assisted in prisoner evacuations, accounted for and tracked federal judges in the affected area, and stood up a task force to locate violent parole and non-compliant sex offenders

The United States Marshal Service (USMS) focused on its core law enforcement missions following Katrina's landfall by locating and tracking federal judges in the affected area and creating a task force to locate violent parole and non-compliant sex offenders. USMS helped the Bureau of Prisons (BOP) relocate 920 Louisiana inmates and assisted FEMA in evacuating 3,510 individuals displaced by the hurricane. In addition, USMS helped the CDC protect the Strategic National Stockpile.

USMS is the oldest federal law enforcement agency in the United States, established by the Judiciary Act of 1789.[117] USMS is responsible for judicial and witness security, fugitive investigations, the transportation of prisoners and criminal aliens, asset forfeiture, federal service of process and prisoner services.[118]

On August 29, the Assistant Director for the USMS Operations Support Division ("Assistant Director") activated the USMS Emergency Operations Center (EOC) in Washington, D.C. in preparation for Hurricane Katrina.[119] The Assistant Director also placed four Operational Management Teams (OMT) and 33 USMS Inspectors, assigned to secure the Strategic National Stockpile, on standby.[120] CDC's Strategic National Stockpile contains large quantities of medicine and medical supplies to protect the United States in case a public emergency might result in the loss of local supplies.[121]

Following Katrina's landfall, USMS began accounting for USMS personnel. OMT worked with the Louisiana, Mississippi, and Alabama district offices to account for them.[122] Three Operational Medical Personnel were deployed to the coast of Mississippi and New Orleans to assist USMS personnel. Command posts were created by OMT at the Special Operations Group (SOG) Tactical Center at Camp Beauregard in Pineville, Louisiana, and at the District Office in Jackson, Mississippi.

Also on August 30, the Technical Operations Group Air Support Unit deployed six personnel, along with surveillance planes, which were used to assess the damage to the USMS facilities in New Orleans.[123] The federal court houses in New Orleans and Gulfport and Hattiesburg, Mississippi were damaged.[124] The Witness Security and Prisoner Operations Division (WPD) and Marshals from the Middle District of Louisiana Office helped the Orleans Parish evacuate prisoners

to other Louisiana Department of Corrections facilities.[125] WPD and BOP relocated all USMS prisoners and assisted in inmate removal from the Saint Charles Parish Jail.[126]

On the same date, the Assistant Director deployed 10 members of the OMT to New Orleans and southern Mississippi to relieve district management.[127] Marshals were deployed to Mississippi and New Orleans to protect the Strategic National Stockpile.

While USMS' response to Hurricane Katrina was ongoing, USMS' original mission continued.[128] Marshals in Louisiana and Mississippi worked with the United States Attorneys for the districts affected by the hurricane to ensure that judicial operations continued. USMS accounted for and tracked all federal judges in the affected area.

On August 31, the EOC received a FEMA request for USMS to provide security to the BellSouth facility in New Orleans.[129] According to USMS, the facility was designated by the Department of Homeland Security as a critical infrastructure.[130] This request was received through Emergency Support Function # 2 — Communications.[131] The following day, the Department of Justice authorized the mission and Deputy United States Marshals (DUSM) were deployed from the Western Louisiana district to secure the facility.[132]

On September 1, USMS increased staff at the EOC to 18, and the center remained open 24 hours a day, seven days a week.[133] The Assistant Director placed approximately 50 Marshals and trainees at the USMS Training Academy in Glynco, Georgia on standby. Five Marshals from the academy were deployed to provide security at the Biloxi Airport.

The same day, FEMA requested Justice Prisoner and Alien Transportation System (JPATS) aid with evacuating Katrina victims.[134] JPATS began the process of relocating evacuees. From September 1 through 9, JPATS evacuated 3,510 individuals.[135] JPATS also assisted BOP with the relocation of 920 Louisiana inmates to United States Penitentiary Coleman-II in Florida.[136]

Also on September 1, the Attorney General authorized USMS to use previously seized assets to assist in operations.[137] Seized vehicles were immediately deployed for use by state and local entities. USMS had possession of a convention center in Montgomery, Alabama, which they turned over to the state to house evacuees.[138]

On September 2, CDC requested and received additional Marshals to protect a $5 million movement of the Strategic National Stockpile.[139] FEMA requested security for the FEMA Strike Teams. USMS responded with 16 Marshals. Twenty-four SOG Marshals, USMS tactical teams, were deployed to the SOG Tactical Center to assist with tactical missions.

USMS continued to supplement its personnel on September 3 by sending four additional Marshals from the academy to provide security of the Biloxi Airport's control tower and surrounding areas and deploying an additional 10 operational personnel to secure the Strategic National Stockpile.[140] In addition, seven personnel were sent to the National Aeronautics and Space Administration's Stennis Space Center in southern Mississippi to protect FEMA supply trailers there.[141] Twenty DUSMs were deployed to FEMA's Joint Operations Center in Baton Rouge, Louisiana.

On September 4, it became necessary to send 10 additional DUSMs to Stennis Space Center after reports were received that a FEMA truck was stolen.[142] The DUSMs stayed for one day to provide security. USMS deployed to Camp Shelby, Mississippi to secure FEMA relief supplies and convoys.[143]

USMS supported (NOPD) by working with the 1st and 5th districts in New Orleans and responded to backlogged 911 calls.[144] In addition, USMS redirected NOPD National Crime Information Center traffic to the USMS Communications Center. USMS created a task force responsible for locating violent parole and non-compliant sex offenders who were unaccounted for following the hurricane.

USMS deployed more personnel to Mississippi on September 5 to assist local police and sheriff departments.[145] They provided security for 11 search and rescue teams, operated a missing person task force and a task force to locate sex offenders, and protected the Mississippi fuel depot in Collins.

A total of 1,039 USMS were deputized as law enforcement officers to respond to Hurricane Katrina.[146]

U.S. Immigration and Customs Enforcement provided Special Response Teams for tactical missions, assisted with thousands of 911 calls, and the Federal Protective Service inspected and secured federal buildings in New Orleans

Immediately following Katrina's landfall, the Federal Protective Service (FPS), part of U.S. Immigration and Customs Enforcement (ICE) began providing protection to federal buildings by searching and securing those buildings in New Orleans and the surrounding areas. ICE bolstered the hurricane response by providing Special Response Teams to work with the New Orleans Police Department's (NOPD) Special Weapons and Tactics (SWAT) teams on tactical missions. ICE also worked with law enforcement to follow up on thousands of 911 calls that were unanswered during and following the storm.

ICE is a part of the Border and Transportation Security Directorate at DHS.[147] ICE is the largest investigative arm of DHS and its mission is to "prevent acts of terrorism by targeting the people, money, and materials that support terrorist and criminal activities." In addition, ICE is "responsible for identifying and shutting down vulnerabilities in the nation's border, economic, transportation and infrastructure security."

At the time of Hurricane Katrina, FPS and the Federal Air Marshal Service were both under ICE's jurisdiction.[148] A long-standing Memorandum of Understanding (MOU) between FPS and FEMA designates FPS as the protective detail for FEMA personnel when responding to emergencies.[149] As a result of this MOU, ICE pre-deployed 30 FPS personnel in eastern Texas, outside of Dallas, prior to Hurricane Katrina's landfall.[150] They were able to move into the affected area the day following the hurricane and assist FEMA responders with food and fuel needs. In addition, FPS is tasked with protecting federal buildings.[151] On August 29, FPS began surveying the damage to federal buildings in Louisiana, as well as helping the NOPD with looters and disorderly conduct.[152]

The U.S. District Court and the Hale Boggs Federal Building, in New Orleans, were searched on August 30.[153] The buildings had minimal storm damage. However the entrance doors, which are accessed with card readers, were open due to the power outage, so the doors were secured with chains and locks. FPS implemented around the clock high visibility patrols for the buildings.

The F.E. Hebert Federal Building and the J.M. Wisdom Courthouse, in New Orleans, were searched on August 30.[154] FPS found no storm damage or security breaches to either building. Around the clock, high visibility patrols were initiated for these buildings, as well.

Also on August 30, FPS searched the U.S. Customs and Border Protection (CBP) Custom House.[155] There was water damage from the ceiling and two CBP employees were located inside the building. The entrance door was open due to the power outage affecting the card reader. As a result of an inability to secure the building, FPS posted officers inside for security. High visibility patrols were also implemented around the clock.

The Texaco Center, which houses staff for the U.S. Attorney's Office, and the Social Security Administration (SSA) Westbank, in Gretna, Louisiana, both General Services Administration (GSA) leased buildings were surveyed on August 30.[156] Neither building had breaches in security or external damage as a result of the storm. Both buildings were added to FPS' daily patrols. A GSA leased building at 1515 Poydras Street, which housed the SSA was unable to be searched on August 30, as the flood level surrounding the building was too high.

On August 31, FPS searched the Federal Supply Service Depot Warehouse 2 in Harahan, Louisiana. FPS found no security breech and no storm damage.[157] The building was placed on FPS' daily patrol. Five other GSA leased federal buildings were also checked for breeches and damage and were placed on FPS' daily patrol.

None of the ICE offices in Alabama was affected by Hurricane Katrina.[158] The ICE Gulfport office sustained no major damage and was equipped with back up generators.[159] ICE utilized the Gulfport office to provide assistance to ICE employees affected by the hurricane. Immediately following landfall, the San Antonio, Houston, Miami, and Tampa offices coordinated sending supplies in tractor trailers to ICE's Gulfport office, which was made a staging site. ICE was able to support hurricane victims and other federal law enforcement entities, like CBP and Border Patrol, by providing water, food, MREs, generators, fuel, and personal items, like diapers.

In Mississippi, ICE agents and logistical teams worked with county sheriffs and city police forces by assisting patrols, rescues, and searches.[160] ICE helped the Mississippi Highway Patrol in the six southern counties of the state discourage crime by increasing the profile of law enforcement presence.[161]

From landfall until September 2, the ICE New Orleans field office worked on accounting for ICE personnel assigned to the New Orleans, Lake Charles, Lafayette, Baton Rouge, and Gulfport offices and obtaining the needed supplies to restore operations and respond to the hurricane.[162] On September 2, ICE's New Orleans Special Agent-In-Charge (SAC), Michael Holt, contacted the New Orleans mayor and the chief of NOPD to offer ICE assistance. That day, a meeting was held with SAC Holt, the mayor's office, the chief of police, and members of the city council. ICE agreed to support local law enforcement in New Orleans' 4th District, which is located on the west bank of the city on the Mississippi River. The 4th District was still populated at this time, as it had not taken on water. SAC Holt stated that both the mayor and the chief of police welcomed ICE's offer for assistance.

ICE was able to assist the NOPD with tactical teams.[163] The New Orleans Special Response Team (SRT) was on site in the city on September 1. SRT teams from Chicago and San Antonio, consisting of 12 to 18 members, arrived the afternoon and evening on September 2. By midnight of September 2, there were over 100 ICE agents in New Orleans preparing to assist in the response to the hurricane.

The SRT teams were stationed in Kenner, Louisiana at a Louisiana State Trooper post.[164] The Kenner Police Department allowed the ICE agents to sleep in their jail. The agents slept on cots and were fed at a Kenner church.

SAC Holt stated no major violence or unrest was ongoing when ICE SRT began to coordinate with NOPD SWAT.[165] Throughout the week, ICE agents were tasked with patrols and shifts with local law enforcement, worked to curtail looting, assisted with evacuations, and followed up on the approximately 6,000 911 calls made during and after the hurricane. ICE's Tampa Field Office provided three inflatable Zodiac boats that helped ICE personnel assist with transportation for fire departments and medical personnel and respond to rescue calls.

On September 3, ICE operations moved to the lobby of the Sheraton Hotel in New Orleans.[166] NOPD was also housed at the Sheraton.

At the daily law enforcement meetings at the Harrah's Casino in downtown New Orleans, ICE agreed to also assist in New Orleans' 8th District.[167] Much of the 8th District was still under water and included the business district and French Quarter. As the National Guard had a heavy presence in the French Quarter, ICE restricted its mission to the parts of the 8th District outside of the French Quarter.

Throughout the response to Hurricane Katrina, SAC Holt had limited interaction with Governor Blanco's office.[168] Coordination between ICE and locals was primarily handled with a colonel of the Louisiana State Police, and the NOPD chief of police. SAC Holt stated that he had a very good relationship with the Mayor and the leadership of state and local police.

As of December 2, ICE agents had made 234 arrests in Louisiana and over 150 arrests in Mississippi in response to Hurricane Katrina.[169] ICE's mission to support the NOPD and re-establish stability and safety to the city of New Orleans continued through December 23.

The U.S. Customs and Border Protection established a Forward Deployed Operations Command Center to coordinate all personnel movements, coordinated the entrance of relief supplies from foreign countries, secured the Louisiana State University Hospital, and its Air and Marine Branch served as air traffic control for the Federal Aviation Administration

On September 1, the U.S. Customs and Border Protection (CBP) utilized a CBP Air hanger in Hammond, Louisiana to house a Forward Deployed Operations Command Center (FDOCC) to ensure that all CBP movements, law enforcement and customs related, were coordinated. The FDOCC monitored CBP Air as it served as the air traffic control over the affected area, while FAA worked to restore its communication capabilities. CBP officers helped to secure the Louisiana State University Hospital and facilitated an expedited entry of relief supplies from foreign countries.

CBP is the "unified border agency within the Department of Homeland Security."[170] CBP includes legacy U.S. Customs, legacy U.S. Immigration, and the U.S. Border Patrol. CBP's mission is to prevent "terrorists and terrorist weapons from entering the United States, while also facilitating the flow of legitimate trade and travel."

In preparation for Hurricane Katrina, the ports of Mobile and New Orleans activated their hurricane preparedness plans on August 26.[171] On August 27, the Hammond Air and Marine branch in Louisiana activated its hurricane evacuation plan by moving CBP air assets to Shreveport, Louisiana, and Dallas.[172] The same day, New Orleans Field Office's Mission Critical Team (MCT) left New Orleans for Shreveport, Louisiana.[173] On August 28, the Special Operations Division of the Office of Border Patrol began plans to deploy 100 agents to the gulf coast.[174] The Miami and Tampa Field Offices deployed relief teams to Panama City, Florida and the Atlanta and Houston Field Offices placed relief teams on stand by on August 29.[175] The same day the New Orleans Field Office's MCT began to locate all CBP personnel living in the affected area.[176]

On the morning of August 30, the Border Patrol's Tactical Unit's (BORTAC) pre-deployment site survey team left for the affected area, after a request to assist in evacuating the Superdome and for riot control.[177] However, the agents also worked other law enforcement functions and relief operations, such as distributing water, assisting with minor medical care, and helping evacuees onto buses and helicopters.[178]

On August 31, in coordination with the Coast Guard, CBP Air deployed its Mobile Air Command Center.[179] The Command Center was responsible for providing all radar and communications in the affected area. In addition, CBP Air's director became the FEMA Regional Air Coordinator. Also on August 31, CBP deployed liaison officers from its Office of Anti-Terrorism to work out of FEMA Headquarters. The MCT moved to Memphis, Tennessee to continue operations in a location not affected by Katrina.[180]

Between August 31 and September 12, CBP Air flew over 315 missions, accounting for 1,208 flight hours.[181] Due to downed systems, the Federal Aviation Administration (FAA) lost its ability to track and control air traffic in the area. From August 31 to September 8, CBP Air, based out of the Air and Marine Operations Center in Riverside, CA provided air traffic control in place of the FAA and served as an airborne repeater for critical law enforcement communications. During this time, CBP Air accounted for the entry of 1,608 rotary and fixed-wing aircraft into the area of operations. CBP Air also assisted in humanitarian missions, providing water, food, and other essential supplies.

Border Patrol had 100 agents, along with CBP vehicles, emergency equipment, and lifesaving supplies, in Louisiana by September 1.[182] On the same day, CBP's Deputy Assistant Commissioner for Field Operations, William S. Heffelfinger III, traveled to Louisiana to meet with CBP's Office of Field Operations (OFO) personnel in New Orleans. During this meeting, the decision was made to place a FDOCC in Hammond, Louisiana.[183] FDOCC utilized the airport hanger at CBP's Air and Marine Branch facility in Hammond.[184] The hanger was built to withstand 200 mile per hour wind gusts.[185] Heffelfinger was designated as the Commanding Officer for the FDOCC, by then-CBP Commissioner Robert Bonner.[186] The FDOCC was responsible for coordinating the CBP movements in the affected area, including BORTAC, Border Patrol Search Trauma and Rescue (BORSTAR), CBP officers, Border Patrol Agents, Human Resources Management, and marine and air assets.[187]

Within 36 hours, CBP had 40 computer terminals tracking all CBP missions. FDOCC used a map of Louisiana to pinpoint each CBP mission.[188] This information was sent to headquarters each day, along with a daily situation report for the commissioner. The FDOCC held daily 9:00 a.m. meetings that included individuals from CBP air, operations, procurement, information technology, and logistics and finance. Heffelfinger then communicated CBP's daily missions to headquarters during a noon conference call each day.

On September 2, Border Patrol agents were sent to provide security at the Louisiana State University Hospital, which served as the regional triage center.[189] Border Patrol agents were also deployed to the New Orleans Airport to assist with crowd control and security, and the decision was made to have BORSTAR accompany all CBP Air flights.

Also on September 2, OFO notified three hundred CBP Officers throughout the country that they were to be deployed to the FDOCC.[190] One hundred officers deployed to FDOCC on both September 3 and 4. The CBP officers who arrived on September 3, were responsible for reestablishing CBP operations and assisting CBP personnel living in the affected area. On the same day, 169 generators arrived at FDOCC from the Atlanta and Miami Field Offices. [191] CBP began to coordinate with FEMA on the arrival of 18-20 cruise ships.[192]

By September 4, all CBP employees were located.[193] There were 458 CBP employees affected by Hurricane Katrina.[194] Seventy percent suffered property damage and 15 percent lost their homes.

After Katrina's landfall, CBP was unable to utilize the New Orleans Customs House, due to hurricane damage.[195] CBP officers, Border Patrol agents, and a Rapid Response Team from the Houston Field Office were deployed to secure the Customs House, as the House contained a safe and a variety of contraband.[196] On September 5, CBP reopened the Customs House for CBP specific operations.[197] Also on September 5, CBP provided protection for workers in a high crime area who were responsible for repairing a gas line. In addition, the LECC assigned teams from CBP to work with the NOPD precinct captains in the 2nd and 5th districts, along with the U.S. Army's 82nd Airborne Division.

CBP worked with the FBI to stand up the morgue in St. Gabriele, Louisiana and 12 CBP officers took charge of the morgue's security on September 7.[198] Throughout the end of the week and weekend, CBP worked to clear relief supplies arriving from other countries.[199] A relief convoy arrived from Mexico on September 8 and relief supplies from Canada and Thailand arrived on September 10.[200]

On September 11, CBP placed another 250 CBP Officers and 100 Border Patrol agents on stand by.[201] $2.2 million in goods previously seized by CBP were delivered to the Red Cross and the Texas Methodist Church. The goods were primarily counterfeit clothes and shoes confiscated during routine CBP missions.[202]

The number of CBP personnel deployed to the area affected by Hurricane Katrina peaked at 688 on September 9.[203] CBP personnel remained at this number until September 13. During its 36-day response to Hurricane Katrina, CBP performed 1,428 law enforcement and humanitarian missions.[204]

The Federal Air Marshal Service established security and oversaw the reopening of the Louis Armstrong New Orleans International Airport, adhered to their primary mission by flying on 165 outbound flights containing evacuees, and screened approximately 25,000 evacuees prior to flights

The Federal Air Marshal Service (FAMS) played an important, even heroic role in the federal government's response to Hurricane Katrina. Securing the airport and transitioning it from a chaotic shelter of last resort back to a functioning airport is one of the success stories of Katrina. At end, FAMS covered approximately 165 outbound flights, carrying nearly 25,000 evacuees on almost every type of flight: commercial, charter, military and other government agency-operated aircraft.[205] In the process of screening these 25,000 evacuees, FAMS confiscated an enormous amount of weapons and ammunition — 68 firearms, 1,528 rounds of ammunition, 198 knives and machetes, several ballistic vests, and one Taser. This was accomplished without any apparent decrease in FAMS nationwide primary mission.[206]

A component of DHS' Transportation Security Administration (TSA), FAMS is responsible for the security of our nation's civilian aircraft.[207] FAMS' mission "is to be responsible for and protect air security and promote public confidence in our nation's civil aviation system through the effective deployment of air marshals in order to detect, deter and defeat hostile acts targeting U.S. air carriers, airports, passengers and crews."[208] At the time of the hurricane, the Director of FAMS was Thomas D. Quinn.[209] Director Quinn reported to Edmund S. "Kip" Hawley, Assistant Secretary of Homeland Security for TSA.[210]

FAMS' involvement with Hurricane Katrina began during the week of August 21, the week before Katrina made landfall.[211] As part of its normal operating procedures, FAMS was preparing for disruptions in flight coverage due to the impending severe weather conditions.[212] A day after Katrina made landfall, on August 30, FAMS was advised through TSA of deteriorating conditions at Louis Armstrong New Orleans International Airport.[213] The airport was starting to receive evacuees and was therefore becoming a shelter. On August 31, TSA's Federal Security Director for the airport, Michael Robinson, advised senior leadership at TSA that displaced victims of the Hurricane, including relocated hospital patients, were evacuating to the airport in significant numbers.[214] In response to these developments, FAMS sent personnel — drawing from FAMS' Houston Field Office — to the airport to assist the FSD as necessary.[215]

On September 1, as the effects of Katrina continued to mount, Director Quinn ordered the "stand-up" of the Katrina Crisis Incident Management Group (CIMG) for 24-hour oversight of the situation.[216] The CIMG, co-located with FAMS'

Mission Operations Center in Herndon, Virginia, is led by FAMS' Office of Flight Operations, and receives support from staff of other directorates. During FAMS' Katrina response, the CIMG was charged with identifying deployable personnel, ensuring sufficient assets and resources for the airport to enable onsite managers to fulfill their missions, and coordinating with FAMS' Director's staff, TSA, FEMA, and others to provide a common operating strategy for evacuation operations. Conditions at the airport continued to deteriorate as thousands of displaced persons sought refuge there.[217] The airport, however, was not prepared to be a shelter. There was no food, water, restroom facilities, or security. Consequently, when FAMS personnel began to arrive, they needed to help restore order.[218] By the late evening on September 1, FAMS began initial deployment, including 54 from the Houston Field Office, arriving by car. Also by late evening, evacuation flights out of the airport were fully operational.

By Friday, September 2, the CIMG authorized FAMS personnel at the airport to expand their mission to include interim law enforcement activities as well as all necessary activities to operate the airport.[219] Personnel ramp-ups continued and reached 215 FAMS by day's end.[220] By Saturday, September 3, evacuation flights were in full swing and FAMS personnel levels reached 508.

On Sunday, September 4, FAMS began rotating its personnel out of the airport and relieved them with marshals from field offices around the country.[221] It was on Sunday, also, that FAMS received reinforcements from command officers of the U.S. Army's 82nd Airborne Division as well as personnel from the U.S. Forestry Service. With the additional manpower, FAMS and the 82nd Airborne established a Joint Information Operations Center (JIOC) at the airport complete with a telephone bank/call center, laptops, internet connectivity, and other technical gear that permitted the JIOC to function as a command center.

The JIOC allowed FAMS to communicate with headquarters and throughout the region.[222] As the JIOC became fully operational, it permitted FAMS personnel to channel requests for help to the JIOC for tasking, most of which involved alerting the Jefferson Parish Sheriff's Department. As the JIOC evolved over time, FAMS' involvement decreased, permitting the 82nd Airborne to take the lead role in staffing this function.

FAMS' staffing ramped down starting Monday, September 5 going from 499 on the 4th to 196 on the 5th.[223] This number dropped to 111 on September 11.

The United States Secret Service provided protection to the President, Vice President, and other protectees traveling to the affected area and was responsible for securing the credentialing process for the New Orleans Police Department and other state and federal law enforcement personnel

As the President, Vice President, Mrs. Cheney and Cabinet Secretaries traveled to the New Orleans and Mississippi after the hurricane, the United States Secret Service provided protective details. In addition to this mission, the Secret Service used its prior expertise to assist state and local law enforcement in providing new credentials for Louisiana law enforcement agencies.

A component of DHS, the Secret Service is charged with providing protection to the President and Vice President, their families, heads of state, and other individuals, including some members of the President's Cabinet.[224] In addition to its protective duties, the Secret Service also has responsibilities relating to counterfeiting and wire fraud crimes.[225] The Secret Service also plans and implements security designs for designated National Special Security Events.[226]

The Secret Service's principal involvement in responding to Hurricane Katrina related to providing protection to five of its protectees during trips to the affected region.[227] In addition to these standard protective missions, between August 31 and September 15, the Secret Service provided 35 employees to the region to assist in implementing Continuity of Operations Plans for the New Orleans Field Office.[228] All Secret Service Field Offices have such contingency plans in the event the Field Office is compromised.[229]

Secret Service personnel were also deployed to assist the NOPD and the Louisiana State Police (LSP) with credentialing services for state and local law enforcement in the New Orleans area.[230] On September 3, the Secret Service was asked by the New Orleans Homeland Security Director, Terry Ebbert, and the Superintendent of the LSP, Colonel Henry Whitehorn, to take control of the credentialing process.[231] Louisiana and New Orleans officials had, during the 2002 Super Bowl,

worked with the Secret Service in implementing security. Having this experience, state officials were aware of the Secret Service's capabilities.[232] The 2002 Super Bowl was designated as a National Special Security Event, and accordingly, the Secret Service was responsible for all security operations, including the production and distribution of secure credentials. The need for secure credentials for NOPD was a primary concern, as many police officers had lost their official identification badges during the hurricane. Likewise, with large numbers of armed law enforcement officials — including officers from numerous states and federal agencies — deploying to New Orleans, there was a significant need to establish a uniform credentialing scheme.

The Secret Service also manned a desk at the Emergency OperationsCenter (EOC).[233] Having a presence at the EOC allowed the Secret Service to coordinate official visits by the President and other protectees, as well as serving as a central point of contact for credentialing questions.

The Bureau of Prisons transferred approximately 2,500 Louisiana inmates or detainees to facilities outside New Orleans and coordinated the delivery of clothing, water, and food to the affected area

The Bureau of Prisons (BOP) is "responsible for the custody and care of approximately 185,000 Federal offenders."[234] BOP "protects public safety by ensuring that Federal offenders serve their sentences of imprisonment in facilities that are safe, humane, cost-efficient, and appropriately secure." BOP provided assistance to state and local corrections officials after Hurricane Katrina by transporting and detaining inmates and detainees, as well as coordinating the delivery of clothing, food, and water to the affected area.[235]

In preparation for landfall, BOP personnel from the Office of Emergency Preparedness, located at BOP's Central Office in Washington, D.C. and BOP's South Central Regional Office in Dallas monitored Hurricane Katrina's path from August 26 to August 29.[236] The Office of Emergency Preparedness is responsible for coordinating the evacuation and for supporting correctional institutions in the areas affected by the hurricane.[237]

On August 29, the United States Marshal Service (USMS) requested assistance from BOP to transport USMS detainees from Harrison and Pearl River County jails in Mississippi.[238] BOP provided two buses and moved 70 USMS to jails in Grenada and Madison Counties in Mississippi.

On August 30, BOP opened a command center at its South Central Regional Office to assist the Louisiana Department of Public Safety and Corrections (LDPSC) with transporting inmates out of New Orleans.[239]

During the first week of September, BOP coordinated the delivery of inmate clothing, blankets, sheets, food, and water from a number of Texas institutions.[240] Trucks containing these supplies left Federal Correctional Institution Forth Worth and Federal Correction Complex (FCC) Oakdale on September 3 and arrived in Baton Rouge.[241] The same day, additional supplies were sent to the Louisiana State Police headquarters in Baton Rouge from FCC Beaumont, Texas and FCC Forrest City, Arkansas.

On September 5, the LDPSC Secretary requested that BOP provide 1,000 beds and transportation for Louisiana state inmates.[242] On September 8 and 9, BOP and USMS transferred 964 inmates to United States Penitentiary (USP) Coleman-II, Florida.[243] FCC Coleman houses low, medium, high security, and a female prison.[244] USP Coleman-II is a newly built part of the Coleman complex. As of December, 700 of these inmates remain incarcerated at USP Coleman.[245]

From August 30 to September 7, BOP transported approximately 2,500 inmates or detainees in Louisiana to facilities outside of New Orleans.[246] BOP used nine buses and one van provided from BOP facilities. Two BOP personnel from the BOP office that provided the vehicle accompanied the transport. The LDPSC supported BOP by providing security during the transports.

During this time, BOP also assisted in removing 200 additional USMS detainees from Hoyle Reception Center, St. Tammany Parish Jail, and the Dixon County Correctional Center to the Federal Detention Centers in Houston, and Oakdale and Pollock, Louisiana.[247] A total of 251 BOP personnel assisted in BOP's response to Hurricane Katrina.[248]

[1] Federal Bureau of Investigations [hereinafter FBI] Frequently Asked Questions, http://www.fbi.gov/aboutus/faqs/faqsone.htm (last visited Jan. 21, 2006).
[2] Letter from the U.S. Dep't of Justice, to Tom Davis, Chairman, Select Comm., and Charlie Melancon, U.S. Congressman (Nov. 23, 2005) [hereinafter Nov. 23 Dep't of Justice Response] (citing 42 U.S.C. § 10501).
[3] *Id.* (citing 42 U.S.C. § 5170).
[4] *Id.*
[5] Interview by Select Comm. Staff with FBI personnel, in Wash., D.C. (Nov. 28, 2005) [hereinafter Nov. 28 Interview with FBI]; E-mail correspondence from FBI personnel to Select Comm. Staff (Dec. 5, 2005) (6:10 p.m.)) [hereinafter Dec. 5 E-mail from FBI]. There are six satellite offices, called Resident Agencies, under the New Orleans Field Office. The LA Resident Agencies are located in: Shreveport, Monroe, Alexandria, Lake Charles, Baton Rouge, and Lafayette. (Dec. 5 E-mail from FBI).
[6] *Id.* The Jackson Field Office covers the entire state of MS and has ten Resident Agencies located in: Southaven, Oxford, Tupelo, Columbus, Greenville, Meridian, Hattiesburg, Macomb, Gulfport, and Pascagoula. The Mobile Field Office covers the entire state of AL and has nine Resident Agencies located in: Dothan, Monroeville, Montgomery, Selma, Opelika, Tuscaloosa, Gadsden, Huntsville, and Florence. (*Id.*).
[7] Nov. 28 Interview with FBI; Dec. 5 E-mail from FBI. The Pascagoula Resident Agency houses five agents, two to three FBI support staff, and five local police officers (Nov. 28 Interview with FBI).
[8] Telephone Interview by Select Comm. Staff with FBI personnel, in Wash., D.C. (Dec. 15, 2005) [hereinafter Dec. 15 Telephone Interview with FBI].
[9] *Id.*
[10] Nov. 28 Interview with FBI.
[11] Dec. 5 E-mail from FBI.
[12] Nov. 23 Dep't of Justice Response.
[13] Nov. 23 Dep't of Justice Response; Nov. 28 Interview with FBI.
[14] Dec. 15 Telephonic Interview with FBI.
[15] *Id.*
[16] Nov. 28 Interview with FBI.
[17] Nov. 23 Dep't of Justice Response.
[18] Nov. 23 Dep't of Justice Response; (LA State Police [hereinafter LSP] permitted FBI access to the LSP Headquarters by verbal agreement). (Dec. 5 E-mail from FBI).
[19] Nov. 28 Interview with FBI.
[20] Dec. 15 Telephone Interview with FBI.
[21] *Id.*
[22] Nov. 23 Dep't of Justice Response; Telephone call by Select Comm. Staff with FBI personnel (Jan. 27, 2006) [hereinafter Jan. 27 Telephone call with FBI].
[23] Nov. 23 Dep't of Justice Response; The Law Enforcement On-Line Internet site is not available to the general public. Law enforcement entities from around the country must have a password to access the FBI's information, Dec. 5 E-mail from FBI.
[24] Dec. 5 Telephone call with FBI.
[25] Nov. 23 Dep't of Justice Response; Nov. 28 Interview with FBI.
[26] Nov. 23 Dep't of Justice Response; Dec. 5 Telephone call with FBI; Dec. 5 E-mail from FBI; (The request for the fingerprinting assistance for the DMORT came via telephone from the Nat'l Disaster Medical Sys. Ctr. in Rockville, MD on Sept. 1. FBI Fly Teams are teams assembled to address specific incidents. The teams are typically pre-designated as Fly Teams and are issued personal equipment and receive medical evaluations that enable them to leave respond on short notice. In this case, the team was a group of individuals with a specialty in fingerprinting).
[27] Nov. 28 Interview with FBI.
[28] Nov. 23 Dep't of Justice Response.
[29] Nov. 28 Interview with FBI.
[30] Dec. 15 Telephone Interview with FBI.
[31] Jan. 27 Telephone call with FBI.
[32] Nov. 23 Dep't of Justice Response.
[33] *Id.*, Dec. 5 Telephone call with FBI. (There are four Rapid Deployment teams located in: New York City, Wash., D.C., Los Angeles, and Miami. The teams are comprised of 160 people with different specialties. They are equipped to respond and be self sufficient for seven days on their own).
[34] Dec. 5 E-mail from FBI.
[35] *Id.* (From Aug. 30 until Sept. 12, the FBI helicopters conducted 53 total flights, for a total of 163.1 flying hours).
[36] *Id.* (Fixed wing assets include larger cargo or passenger planes).
[37] Nov. 28 Interview with FBI.
[38] About the Bureau of Alcohol, Tobacco, Firearms and Explosives [hereinafter ATF], http://www.atf.gov/about/mission.htm (last visited Jan. 21, 2006).
[39] Nov. 23 Dep't of Justice Response.
[40] ATF Summary of Significant Activity (Nov. 18, 2005) [hereinafter ATF Summary of Significant Activity].
[41] ATF Summary of Significant Activity; Interview by Select Comm. Staff with ATF personnel, in Wash., D.C. (Nov. 29, 2005) [hereinafter Interview with ATF].
[42] Interview with ATF.
[43] ATF Summary of Significant Activity.
[44] Interview with ATF.
[45] ATF Summary of Significant Activity.

[46] Interview with ATF.
[47] ATF Summary of Significant Activity.
[48] Interview with ATF; E-mail correspondence from ATF personnel to Select Comm. Staff (Dec. 7, 2005) (11:47 a.m.) [hereinafter E-mail from ATF]; (E-mail from ATF) (The office in Shreveport oversaw the administrative functions of the Shreveport, Little Rock, Jackson, and Oxford, Miss. Field Offices).
[49] Interview with ATF.
[50] *Id*.
[51] Telephone call by Select Comm. Staff with ATF personnel, in Wash., D.C. (Dec. 1, 2005) [hereinafter Telephone call with ATF].
[52] ATF Summary of Significant Activity.
[53] Interview with ATF; Telephone call with ATF.
[54] Telephone call with ATF.
[55] Interview with ATF.
[56] *Id*.
[57] Telephone call with ATF.
[58] *Id*.; The Emergency Management Working Group was chaired by the Chief of Security and Emergency Programs Division (E-mail from ATF).
[59] Interview with ATF.
[60] ATF Summary of Significant Activity.
[61] Interview with ATF; Telephone call with ATF.
[62] ATF Summary of Significant Activity.
[63] *Id*.
[64] Interview with ATF.
[65] E-mail from ATF.
[66] ATF Summary of Significant Activity.
[67] Interview with ATF.
[68] ATF Summary of Significant Activity; Interview with ATF.
[69] Interview with ATF.
[70] *Id*.
[71] Telephone call by Select Comm. Staff with ATF personnel, in Wash., D.C. (Jan. 27, 2006).
[72] Interview with ATF; Interview by Select Comm. Staff with U.S. Immigration and Customs Enforcement [hereinafter ICE] personnel, in Wash., D.C. (Dec. 2, 2005) [hereinafter Dec. 2 Interview with ICE].
[73] Dec 2 Interview with ICE.
[74] Interview with ATF.
[75] ATF Summary of Significant Activity.
[76] *Id*.
[77] ATF Summary of Significant Activity; Interview with ATF.
[78] Interview with ATF.
[79] ATF Summary of Significant Activity.
[80] Interview with ATF.
[81] *Id*.
[82] ATF Summary of Significant Activity; Interview with ATF.
[83] ATF Summary of Significant Activity.
[84] E-mail from ATF.
[85] ATF Summary of Significant Activity.
[86] ATF Katrina Deployments Doc. (Nov. 29, 2005).
[87] Drug Enforcement Administration [hereinafter DEA] Mission Statement, http://www.usdoj.gov/dea/agency/mission.htm [hereinafter DEA website] (last visited Dec. 2, 2005).
[88] Response from the U.S. Dep't of Justice, to Chairman Tom Davis, Select Comm., and Charlie Melancon, U.S. Congressman (Dec. 8, 2005) [hereinafter Dec. 8 Dep't of Justice Response] (citing 21 U.S.C. §§ 801 et seq.).
[89] DEA website.
[90] Dec. 8 Dep't of Justice Response (citing 21 U.S.C. § 878 (a)(5)).
[91] Dec. 8 Dep't of Justice Response (citing 42 U.S.C. § 10501).
[92] Nov. 23 Dep't of Justice Response.
[93] *Id*.
[94] Hurricane Katrina Drug Enforcement Agency COOP Assessment (DAG000000223) (Jan. 26, 2006).
[95] Nov. 23 Dep't of Justice Response.
[96] Interview by Select Comm. Staff with DEA, in Wash., D.C. (Nov. 28, 2005) [hereinafter Interview with DEA].
[97] Interview with DEA.
[98] *Id*. From Aug. 30 through Sept. 28, DEA Special Agents assisted in over 3,400 search and rescues in LA and Miss. (*Id*.).
[99] Nov. 23 Dep't of Justice Response.
[100] *Id*.
[101] *Id*.
[102] Interview with DEA.
[103] Nov. 23 Dep't of Justice Response.
[104] *Id*.
[105] Interview with DEA.

[106] Letter from U.S. Dep't of Justice, to Chairman Tom Davis, Select Comm., and Charlie Melancon, U.S. Congressman (Dec. 21, 2005) [hereinafter Dec. 21 Dep't of Justice Response]. The day by day breakdown is as follows: Aug. 30 (24), Aug. 31 (17), Sept. 1 (32), Sept. 2 (16), Sept. 3 (33), Sept. 4 (38), Sept. 5 (11), Sept. 6 (13), Sept. 7 (39), Sept. 8 (10), Sept. 9 (6), Sept. 10 (5), Sept. 11 (4), Sept. 12 (4).
[107] Nov. 23 Dep't of Justice Response.
[108] Interview with DEA.
[109] Nov. 23 Dep't of Justice Response.
[110] *Id.*
[111] *Id.*
[112] *Id.*
[113] *Id.*
[114] *Id.*
[115] Dec. 8 Dep't of Justice Response (Wholesalers included: McKesson, Bergen/Amerisource and Cardinal Health).
[116] *Id.*
[117] United States Marshals Service [hereinafter USMS] Oldest Federal Law Enforcement Agency, http://www.usmarshals.gov/history/oldest.htm (last visited Jan. 21, 2006).
[118] USMS Major Responsibilities of the USMS, http://www.usmarshals.gov/duties/index.html (last visited Jan. 21, 2006).
[119] Nov. 23 Dep't of Justice Response.
[120] Dec. 8 Dep't of Justice Response; Interview by Select Comm. Staff with USMS personnel, in Wash., D.C. (Dec. 8, 2005) [hereinafter Interview with USMS]; (Interview with USMS. (An Operational Mgmt. Team (OMT) oversees USMS' national response. There are OMTs located throughout the United States. A Chief Deputy, the highest ranking career Marshal in the district is in charge of the OMT. Each OMT has a core group of eight personnel).
[121] Ctrs. for Disease Control and Prevention, Emergency Preparedness & Response, http://www.bt.cdc.gov/stockpile/ (last visited Jan 22, 2006).
[122] Dec. 8 Dep't of Justice Response.
[123] *Id.*
[124] Interview with USMS. The courthouses are located as follows: C-600 U.S. Courthouse, New Orleans, LA 70130; 2012 15th Street, Suite 302, Gulfport, MS 39501; and 331 Federal Building, 701 Main Street, Hattiesburg, MS 39401. (E-mail correspondence from U.S. Dep't of Justice personnel to Select Comm. Staff (Dec. 8, 2005) (5:16 p.m.)).
[125] Dec. 8 Dep't of Justice Response.
[126] *Id.*
[127] *Id.*
[128] Interview with USMS.
[129] Dec. 8 Dep't of Justice Response.
[130] Dec. 8 Dep't of Justice Response; Interview with USMS.
[131] Dec. 8 Dep't of Justice Response.
[132] Dec. 8 Dep't of Justice Response; Interview with USMS.
[133] Dec. 8 Dep't of Justice Response.
[134] *Id.*
[135] *Id.*; Dec. 21 Dep't of Justice Response. (The JPATS missions were conducted by 180 USMS personnel in 27 trips. The evacuees were moved to the following cities: Dallas, TX; San Antonio, TX; Corpus Christi, TX; Houston, TX; Smyrna, GA; Nashville, TN; Aurora, CO; Fort Smith, AR; and Phoenix, AZ. The evacuations cost a total of one million dollars. It took 3,216.7 work hours and 99.2 flight hours to complete the evacuations. 62 U.S. Air Force medics and 35 FAMS were transported to New Orleans on JPATS return trips).
[136] Dec. 8 Dep't of Justice Response. (JPATS flew the prisoners to Tampa, Florida for a total of 37.6 flight hours).
[137] Dec. 8 Dep't of Justice Response; Interview with USMS.
[138] Dec. 8 Dep't of Justice Response.
[139] *Id.* (There were eight FEMA Strike Teams, each consisting of: FEMA Executive, Pub. Info. Officer, U.S. Army Corp of Engineers Representative, and a Community Relations Specialist).
[140] *Id.*
[141] Dec. 8 Dep't of Justice Response; Interview with USMS.
[142] Dec. 8 Dep't of Justice Response.
[143] Dec. 8 Dep't of Justice Response; Interview with USMS.
[144] Dec. 8 Dep't of Justice Response.
[145] *Id.* (Police Dep'ts included: Pass Christian Police Dep't, Gulfport Police Dep't, Biloxi Police Dep't, Long Beach Police Dep't, and Harrison County Sheriff's Dep't).
[146] *Id.*
[147] ICE website, http://www.ice.gov/graphics/about/index.htm (last visited Jan. 21, 2006).
[148] Interview by Select Comm. Staff with ICE in Wash., D.C. (Nov. 16) [hereinafter Nov. 16 Interview with Interview with ICE]; E-mail from FAMS personnel to Select Comm. staff Dec. 5, 2005. (Oct. 16, 2005, FAMS was moved to the Transportation Security Administration (TSA) within DHS).
[149] Nov. 16 Interview with ICE; E-mail correspondence from ICE personnel to Select Comm. Staff (Dec. 8, 2005) (8:51 a.m.).
[150] Nov. 16 Interview with ICE.
[151] ICE website, Federal Protective Service, http://www.ice.gov/graphics /fps/index.htm (last visited Jan. 27, 2006); E-mail correspondence from ICE to Select Comm. Staff (Jan. 4, 2006) (11:31 a.m.) [hereinafter Jan. 4 E-mail from ICE].
[152] Jan. 4 E-mail from ICE.
[153] *Id.*
[154] *Id.*

[155] *Id.*
[156] *Id.*
[157] *Id.* (The five other GSA leased federal buildings were: Fisk Record Center, Dep't of Agric., Galleria/SSA, SSA, and the FBI Building).
[158] Telephone call by Select Comm. Staff with ICE personnel (Jan. 26, 2006).
[159] Dec. 2 Interview with ICE.
[160] *Id.*
[161] E-mail correspondence from Ronald R. Grimes, DHS to Gerald Garren, et al, (Sept. 6, 2005) (5:27 p.m.); Dec. 2 Interview with ICE. (Miss. entities assisted by ICE. Miss. Highway Patrol, Gulfport Police Dep't, Harrison County Sheriffs Office, Waveland Police Dep't, Bay St. Louis Police Dep't, Long Beach Police Dep't, Pass Christian Police Dep't, Hancock County Sheriffs Office, and Jackson County Sheriffs Office).
[162] Dec. 2 Interview with ICE.
[163] *Id.*
[164] *Id.*
[165] *Id.*
[166] *Id.*
[167] *Id.*
[168] *Id.*
[169] *Id.*
[170] U.S. Customs and Border Prot. [hereinafter CBP], Protecting Our Borders Against Terrorism, http://www.cbp.gov/xp/cgov/toolbox/about/mission/cbp.xml (last visited Jan 21, 2006).
[171] CBP Timeline Aug. 24-Aug. 30 (Dec. 8, 2005) [hereinafter CBP Timeline Aug. 24-Aug. 30].
[172] CBP Hurricane Katrina Support and Operations PowerPoint (Sept. 20, 2005) [hereinafter CBP PowerPoint]; CBP Timeline Aug. 24-Aug. 30.
[173] CBP PowerPoint. Each CBP Field Office has a MCT. An MCT is comprised of a core group of personnel, including Human Resource specialists who are responsible for running an office from a new location. (Telephone call by Select Comm. Staff with CBP personnel (Jan. 3, 2006) [hereinafter Telephone call with CBP]).
[174] CBP Timeline Aug. 24-Aug. 30. 249 CBP Border Patrol Agents were deployed to the affected area from Sept. 1-15, 2005. The Agents were deployed from the following Border Patrol Sectors/locations: Border Patrol Academy (2), Blaine (2), BORTAC HQ (9), Del Rio (46), Detroit (7), BP Air Ops HQ (10), El Centro (21), El Paso (23), Grand Forks (5), Houlton (3), OBP HQ (9), Havre (5), Laredo (28), Marfa (1), Miami (6), Rio Grande Valley (21), Ramey (3), San Diego (30), Spokane (6), Tucson (2), and Yuma (10). (*Id.*).
[175] Interview by Select Comm. Staff with CBP personnel, in Wash., D.C. (Dec. 6, 2005) [hereinafter Interview with CBP]; CBP Timeline Aug. 24-Aug. 30. (Thirty support personnel were part of the relief teams from the Miami and Tampa Field Offices. Twenty support personnel were part of the relief teams from the Atlanta and Houston Field Offices).
[176] CBP Timeline Aug. 24-Aug. 30.
[177] *Id.*
[178] Telephone call with CBP.
[179] CBP Timeline Aug. 30-Sept. 13.
[180] CBP PowerPoint; CBP Timeline Aug. 30-Sept. 13 (Dec. 21, 2005) [hereinafter CBP Timeline Aug. 30-Sept. 13]; E-mail correspondence to Select Comm. Staff from CBP personnel (Jan. 4, 2006) (1:13 p.m.).
[181] E-mail correspondence to Select Comm. Staff from CBP personnel (Jan. 10, 2006) (5:17 p.m.).
[182] CBP Timeline Aug. 30-Sept. 13.
[183] Interview with CBP.
[184] Interview with CBP; CBP Timeline Aug. 30-Sept. 13.
[185] CBP Protection PowerPoint.
[186] Interview with CBP.
[187] CBP Protection PowerPoint; CBP Timeline Aug. 24-Aug. 30.
[188] Interview with CBP.
[189] CBP Timeline Aug. 30-Sept. 13.
[190] CBP Timeline Aug. 24-Aug. 30.
[191] CBP Timeline Aug. 30-Sept. 13.
[192] CBP PowerPoint; CBP Timeline Aug. 30-Sept. 13.
[193] E-mail correspondence to Select Comm. Staff from CBP personnel (Jan. 26, 2006) (1:35 p.m.).
[194] Interview with CBP.
[195] CBP Timeline Aug. 30-Sept. 13; Telephone call with CBP.
[196] Telephone call with CBP.
[197] CBP Timeline Aug. 30-Sept. 13.
[198] CBP Protection PowerPoint; CBP Timeline Aug. 30-Sept. 13.
[199] CBP Timeline Aug. 30-Sept. 13.
[200] CBP Protection PowerPoint; CBP Timeline Aug. 30-Sept. 13.
[201] CBP Timeline Aug. 30-Sept. 13.
[202] Telephone call with CBP.
[203] E-mail correspondence to Select Comm. Staff from CBP personnel (Dec. 19, 2005) (4:17 p.m.).
[204] CBP Timeline Aug. 24-Aug. 30. The missions resulted in 328 rescues, 59 arrests, 77 recovered bodies, and humanitarian aid to approximately 5,951 individuals. (*Id.*).
[205] Fed. Air Marshal Serv. [hereinafter FAMS] Timeline prepared for Select Comm. Staff (Nov. 29, 2005) [hereinafter FAMS Timeline].

[206] Interview by Select Comm. Staff with FAMS personnel, in Wash., D.C. (Nov. 29, 2005) [hereinafter Interview with FAMS]. FAMS believes as little as 1% of its ordinarily staffed flights were not staffed as a result of FAMS' response to Katrina. The specific numbers of FAMS' staffed flights and related personnel is classified. (Id.).
[207] E-mail correspondence from FAMS personnel to Select Comm. Staff (Jan. 27, 2006) (1:51 p.m.).
[208] *Id.*
[209] Interview with FAMS; (E-mail correspondence from FAMS personnel to Select Comm. Staff (Jan. 5, 2006) (9:14 p.m.) (Dir. Quinn retired on Feb. 4, 2006).
[210] Interview with FAMS. At the time of Hurricane Katrina, FAMS was, as part of an overall DHS reorganization, being transitioned to TSA's authority from ICE, which is part of DHS' Border and Transportation Security component. The practical realities of the impending reorganization meant that FAMS leadership was, during times relevant, unofficially reporting into TSA and Assistant Secretary Hawley. Senior leadership at TSA was in operational command at all times during the Katrina response, holding conference calls every four hours from 6:00 a.m. to midnight with the field. That being said, since FAMS was officially reporting through ICE, official reports and personnel statistics have FAMS as part of ICE and not TSA. FAMS official transfer from ICE to TSA occurred on Oct. 16, 2005).
[211] *Id.*
[212] FAMS Timeline.
[213] Interview with FAMS.
[214] Interview with FAMS; FAMS Timeline.
[215] FAMS Timeline.
[216] *Id.*
[217] Interview with FAMS.
[218] FAMS Timeline.
[219] Interview with FAMS. (This included, meeting arriving buses, helicopters, trucks, and ambulances; canvassing evacuees for information on those left behind in New Orleans; handwriting manifests for the New Orleans International Airport departing flights; pre-screening and loading passengers; crowd control; baggage handling; air traffic control; operating heavy equipment to facilitate blocking and dispatching aircraft; hand-carrying hundreds of sick, injured and elderly passengers on to departing aircraft; working with FEMA triage personnel to carry patients on stretchers for medical evaluation; delivering patients to the "Expected to Die" and morgue holding areas; and assisting in other medical emergencies).
[220] FAMS Timeline.
[221] FAMS Timeline; Email correspondence from FAMS personnel to Select Comm. Staff (Nov. 29, 2005) (5:27 p.m.) [hereinafter Nov. 29 Email from FAMS]. (Eventually, personnel from every field office and headquarters would participate in FAMS' Katrina response. FAMS has offices in Boston, New York, Newark, Philadelphia, Wash., D.C., Charlotte, Orlando, Miami, Atlanta, Cincinnati, Pittsburgh, Cleveland, Detroit, Chicago, Minneapolis, Denver, Dallas, Houston, Las Vegas, Los Angeles, and Seattle).
[222] FAMS Timeline; Nov. 29 E-mail from FAMS.
[223] FAMS Timeline.
[224] 18 U.S.C. § 3056.
[225] 18 U.S.C. § 470 et seq.; 18 U.S.C. § 3056(b).
[226] 18 U.S.C. § 3056(e).
[227] Additional Info. Relating To Secret Service [hereinafter USSS] Contributions Toward Response and Recovery Efforts Associated With Hurricane Katrina (Dec. 5, 2005) [hereinafter Dec. 5 Additional Info. Relating to USSS]. (The five protectees were: President Bush, Vice President Cheney, Mrs. Cheney, Sec'y of Homeland Sec. Michael Chertoff, and Treasury Sec'y John Snow. President Bush visited the affected area three times between Aug. 23 and Sept. 13. On Sept. 2, the President visited Mobile, AL; Biloxi, Miss.; and New Orleans, LA. On Sept. 5, the President visited Baton Rouge, LA. On Sept. 11 and 12, the President visited New Orleans, and Gulfport, Miss. On Sept. 8, the Vice President and Mrs. Cheney visited Gulfport, New Orleans and Baton Rouge. Sec'y Chertoff made three trips to the affected region, visiting Mobile, Biloxi, and New Orleans on Sept. 2, New Orleans on Sept. 4 and 5, and Gulfport, New Orleans, and Baton Rouge on Sept. 8. Treasury Sec'y Snow visited Biloxi on Sept. 9).
[228] Additional Info. Relating To USSS Contributions Toward Response and Recovery Efforts Associated With Hurricane Katrina (Dec. 7, 2005) [hereinafter Dec. 7 Additional Info. Relating to USSS]. (The personnel deployment was divided into two phases, Aug. 31 through Sept. 9 as Phase I and Sept. 8 through Sept. 15 as Phase II. Seventeen employees were deployed for the first phase and 18 for the second phase. These employees were drawn from the following Secret Service offices: Dallas Field Office, Houston Field Office, Memphis Field Office, Charlotte Field Office, Chicago Field Office, Intelligence Div., Info. Res. Mgmt. Div., and Diplomatic Protective Div.. These offices each deployed one to three employees. The Houston Field Office deployed five employees for both phases).
[229] Dec. 5 Additional Info. Relating to USSS.
[230] *Id.* (Interview by Select Comm. Staff with FBI personnel, in Washington, D.C. (Dec. 6, 2005) (The FBI also was involved with credentialing law enforcement officers).
[231] Dec. 7 Additional Info. Relating to USSS; Dec. 5 Additional Info. Relating to USSS.
[232] Dec. 5 Additional Info. Relating to USSS.
[233] *Id.*
[234] Fed. Bureau of Prisons [hereinafter BOP] About BOP, http://www.bop.gov/about/index.jsp# (last visited Jan. 21, 2006).
[235] Dec. 8 Dep't of Justice Response (citing 42 U.S.C. § 5170 (a) and (b)).
[236] Dec. 8 Dep't of Justice Response; Interview by Select Comm. Staff with BOP personnel, in Wash., D.C. (Dec. 5, 2005) [hereinafter Interview with BOP].
[237] Interview with BOP.
[238] Dec. 8 Dep't of Justice Response.
[239] *Id.*
[240] Dec. 8 Dep't of Justice Response; Interview with BOP.

[241] Dec. 8 Dep't of Justice Response.
[242] *Id.*
[243] Interview with BOP; Dec. 8 Dep't of Justice Response.
[244] Interview with BOP.
[245] Dec. 8 Dep't of Justice Response.
[246] *Id.* (A total of 54 BOP personnel were responsible for the transportation. These personnel were detailed from the Fed. Correction Complex (FCC) in Beaumont, TX; FCC Forrest City, Arkansas; FCC Yazoo City, MS; FCC Oakdale, LA; the United States Penitentiary in Pollock, LA; the Fed. Det. Ctr. in Houston, TX).
[247] *Id.* A break down of the bus and van transports: Aug. 30 — 2 bus runs, 1 van run; Aug. 31 — 14 bus runs; Sept. 1 — 34 bus runs; Sept. 2 — 9 bus runs; Sept. 3 — 2 bus runs; Sept. 4 — 2 bus runs; Sept. 5— 2 bus runs, 1 van run; Sept. 6 — 7 bus runs, 1 van run; Sept. 7— 2 bus runs).
[248] Dec. 8 Dep't of Justice Response; Interview with BOP (54 staff for bus movements out of New Orleans; 26 staff worked from the South Central Region Command Center; 6 staff for bus movements in southern Miss.; 165 staff for transport and delivery of supplies and equipment, inspection and maintenance of vehicles, mechanical services, liaison with command center in Baton Rouge; and 52 Pub. Health Servs. Officers).

APPENDIX 6

United States Government Accountability Office
Washington, DC 20548

February 1, 2006

The Honorable Thomas Davis
Chairman
Select Bipartisan Committee to Investigate the
Preparation for and Response to Hurricane Katrina
House of Representatives

Subject: *Statement by Comptroller General David M. Walker on GAO's Preliminary Observations Regarding Preparedness and Response to Hurricanes Katrina and Rita*

Dear Mr. Chairman:

As you know, GAO has undertaken a body of work to address federal, state, and local preparations for, response to, and recovery from Hurricanes Katrina and Rita. Enclosed is a statement for the record of GAO's preliminary findings.

GAO will continue work on a wide range of issues relating to the preparation, response, recovery, and rebuilding efforts related to the hurricanes. We expect to provide Congress with more detailed findings, with a comprehensive summary of what went well and why, what did not go well and why, and what specific changes, if any, are called for in the National Response Plan. If you or your staff has any questions about this statement, please contact Norman J. Rabkin, Managing Director for Homeland Security and Justice Issues, at (202) 512-8777 or rabkinn@gao.gov.
Sincerely yours,

David M. Walker
Comptroller General
of the United States

Enclosure

GAO-06-365R Preliminary Observations on Hurricane Response

Enclosure I: Statement by Comptroller General David M. Walker on GAO's Preliminary Observations Regarding Preparedness and Response to Hurricanes Katrina and Rita

In recent months, GAO has undertaken a body of work to address federal, state, and local preparations for, response to, and recovery from Hurricanes Katrina and Rita. I am here today to provide some preliminary observations based on our work to date. GAO is supporting Congress through a range of strategic and integrated audit and evaluation engagements to determine what went well, what did not, and what lessons learned are critical to improving government's abilities to do better in the future. The Inspectors General of the various federal departments are conducting detailed Hurricane Katrina-related work on fraud, waste, and abuse in individual federal programs.

GAO staff has visited the affected areas. They have interviewed officials and analyzed information from the various involved federal agencies such as FEMA and the Department of Defense (DOD); state and local organizations, including state emergency management agencies; state adjutant generals; local officials; and representatives from nongovernmental agencies. I have also personally toured southern Mississippi, southern Louisiana, and the city of New Orleans. I have also had discussions with many governmental and other officials, including the governors of Alabama, Mississippi, Louisiana, and Texas; the mayor of New Orleans; the primary federal official on the scene; and the joint task force commander of active duty forces. In addition, GAO has done a great deal of work on prior disasters, including Hurricane Andrew in 1992 and the terrorist attacks in 2001.

Hurricane Katrina was one of the largest natural disasters in our nation's history and because of its size and strength, will have long standing effects for years to come. It exacted terrible human costs with the loss of significant numbers of lives and resulted in billions of dollars in property damage. At present, the Department of Homeland Security (DHS) reports that FEMA has distributed nearly $4.4 billion in federal aid to more than 1.4 million households. Forty-four states and the District of Columbia have been given emergency declarations to cover expenses related to sheltering millions of evacuees forced from their homes by Hurricanes Katrina and Rita. Furthermore, many who survived now face the disruption of being dislocated and separated from their normal way of life, the prospect of rebuilding their lives in other locations, and, for those who desire to return home, the continuing uncertainties regarding what kind of life the future may hold.

Significant local, state, and federal resources were mobilized to respond to the Hurricane Katrina disaster, along with significant participation from charitable and private sector organizations. However, the capabilities of

several federal, state, and local agencies were clearly overwhelmed in response to Hurricane Katrina, especially in Louisiana. Therefore, there was widespread dissatisfaction with the level of preparedness and the collective response. As events unfolded in the immediate aftermath and ensuing days after Hurricane Katrina's final landfall, responders at all levels of government—many victims themselves—encountered significant breakdowns in vital areas such as emergency communications as well as obtaining essential supplies and equipment.

The causes of these breakdowns must be well understood and addressed in order to strengthen the nation's ability to prepare for, respond to, and recover from major catastrophic events in the future—whether natural or man-made. Unfortunately, many of the lessons emerging from the most recent hurricanes in the Gulf are similar to those GAO identified more than a decade ago, in the aftermath of Hurricane Andrew, which leveled much of South Florida in the early 1990s. For example, in 1993, we recommended that the President designate a senior official in the White House to oversee federal preparedness for, and response to, major catastrophic disasters.

There are several key themes that, based on our current preliminary work, underpin many of the challenges encountered in the response to Hurricane Katrina and reflect certain lessons learned from past disasters. The following three key themes seem to be emerging.

Clear and Decisive Leadership

First, prior to a catastrophic event, the leadership roles, responsibilities, and lines of authority for the response at all levels must be clearly defined and effectively communicated in order to facilitate rapid and effective decision making, especially in preparing for and in the early hours and days after the event. As we recommended in 1993, we continue to believe that a single individual directly responsible and accountable to the President must be designated to act as the central focal point to lead and coordinate the overall federal response in the event of a major catastrophe. This person would work on behalf of the President to ensure that federal agencies treat the catastrophe as a top priority and that the federal government's response is both timely and effective. In cases where there is warning, such as the high probability of a major hurricane (e.g., a category 4 or 5), the senior official should be designated prior to the event, be deployed appropriately, and be ready to step forward as events unfold. Neither the DHS Secretary nor any of his designees, such as the Principal Federal Official (PFO), filled this leadership role during Hurricane Katrina, which serves to underscore the immaturity of and weaknesses relating to

the current national response framework. More specifically with regard to the lessons to be learned from Hurricane Katrina:

- No one was designated in advance to lead the overall federal response in anticipation of the event despite clear warnings from the National Hurricane Center. Furthermore, events unfolded both before and immediately after the landfall of Hurricane Katrina that made it clear that governmental entities did not act decisively or quickly enough to determine the catastrophic nature of the incident. For example, the DHS Secretary designated Hurricane Katrina as an incident of national significance on August 30th—the day after final landfall. However, he did not designate the storm as a catastrophic event, which would have triggered additional provisions of the National Response Plan (NRP), calling for a more proactive response.[1] As a result, the federal posture generally was to wait for the affected states to request assistance. At the same time, some federal responders such the Coast Guard and DOD did "lean forward" in proactive efforts anticipating a major disaster. Furthermore, other federal agencies took proactive steps to prepare for and respond to the disaster, such as the U.S. Postal Service and the National Finance Center.

- Although the DHS Secretary designated a PFO to be the federal government's representative under the NRP structure and to coordinate the federal response, the efforts of all federal agencies involved in the response remained disjointed because the PFO's leadership role was unclear. In the absence of timely and decisive action and clear leadership responsibility and accountability, there were multiple chains of command, a myriad of approaches and processes for requesting and providing assistance, and confusion about who should be advised of requests and what resources would be provided within specific time frames.

[1]As defined by the National Response Plan, an incident of national significance is an actual or potential high-impact event that requires a response by a combination of federal, state, and local governments and/or private sector entities in order to save lives and minimize damage, and provides the basis for long-term community recovery and mitigation activities. A catastrophic incident is one that results in extraordinary levels of mass casualties, damage, or disruption severely affecting the population, infrastructure, environment, economy, national morale, and/or government functions.

Strong Advance Planning, Training, and Exercise Programs

Second, to best position the nation to prepare for, respond to, and recover from major catastrophes like Hurricane Katrina, there must be strong advance planning, both within and among responder organizations, as well as robust training and exercise programs to test these plans in advance of a real disaster. Although the NRP framework envisions a proactive national response in the event of a catastrophe, the nation does not yet have the types of detailed plans needed to better delineate capabilities that might be required and how such assistance will be provided and coordinated. In addition, we observed that the training and exercises necessary to carry out these plans were not always developed or completed among the first responder community. The leadership to ensure these plans and exercises are in place must come from DHS in conjunction with other federal agencies, state and local authorities, and involved nongovernmental organizations. More specifically,

- By their very nature, major catastrophic events involve extraordinary levels of mass casualties, damage, or disruption that likely will immediately overwhelm state and local responders, circumstances that make sound planning for catastrophic events all the more crucial. Our previous work on Hurricane Andrew also highlighted the importance of such plans focused specifically on major catastrophic events. Our initial review of the NRP base plan and its supporting catastrophic provisions as well as lessons based on Hurricane Katrina suggest the need for these documents to be supported and supplemented by more detailed and robust implementation plans. Our previous work has also underscored the need to prepare for both natural disasters and man-made disasters such as terrorist events.

- Planning should also include further defining and leveraging any military capabilities as might be needed in a major catastrophe. Prior disasters and the actual experience of Hurricane Katrina show that DOD is likely to contribute substantial support to state and local authorities, including search and rescue assets, evacuation assistance, provision of supplies, damage assessment assets, and possibly helping to ensure public safety. In fact, military support to Hurricane Katrina-affected areas reflected an unprecedented domestic response of 70,000 personnel—far greater than in any other domestic disaster, including Hurricane Andrew. This response involved about 20,000 active duty troops and about 50,000 National Guard troops. More detailed planning would provide greater visibility and understanding of the types of support DOD will be expected to provide following a catastrophic incident, including the types of assistance and capabilities that might be provided, what might be done proactively and in response to specific requests, and how the efforts of the active duty and National

Guard would be integrated. It would also avoid the type of confusion that occurred in Louisiana regarding the types of military support needed and requested, and the respective contributions of active duty and National Guard forces.

- Planning also must explicitly consider the need for and management of the contractor community. In this regard, we found that agencies did not always have adequate plans for contracting in a major contingency situation. We also noted the competing tension between the selection of national contractors and the requirement under the Stafford Act for a preference for contractors from the affected area. Better planning could ameliorate those tensions.

- Regular training and periodic exercises provide a valuable way to test emergency management plans. In our previous work on Hurricanes Andrew and Hugo, we identified the need for the federal government to upgrade training and exercises for state and local governments specifically geared towards catastrophic disaster response. Hurricane Katrina demonstrated the benefits of applying lessons learned from training exercises and experiences with actual hurricanes as well as the dangers of ignoring them. FEMA's "Hurricane Pam" exercise—conducted between 2004 and 2005 to simulate the impacts of a category 3 hurricane—identified the impacts such as widespread flooding, extensive evacuations, sheltering thousands of individuals left homeless after a storm, and disposing of tons of debris similar to Hurricane Katrina's results. Not all capabilities-related issues identified in the Hurricane Pam exercise were addressed before Hurricane Katrina hit. In addition, we observed that an incomplete understanding of roles and responsibilities under the NRP lead to misunderstandings, problems, and delays, an area that training might be able to correct. One overall challenge is ensuring that key officials participate in training and exercises so that they are better prepared to deal with real life situations.

Capabilities for a Catastrophic Event

Response and recovery capabilities needed during a major catastrophic event differ significantly from those required to respond to and recover from a "normal disaster." Key capabilities such as emergency communications, continuity of essential government services, and logistics and distribution systems underpin citizen safety and security. In addition, as these capabilities are brought to bear, streamlining, simplifying, and expediting decision making must quickly replace "business as usual" approaches to doing business. The following provides examples of capabilities we have identified in our preliminary work. All of these areas require better contingency plans and the resources to carry them out.

- Hurricane Katrina exposed difficulties in continuing or rapidly restoring essential government operations, particularly at the local level. Local government infrastructure was destroyed and essential government employees, including many first responders, were evacuated or victimized themselves by the storms, resulting in limited continuity of operations for essential public safety and key service agencies. Also, because of storm damage, emergency communications to meet everyday internal and emergency communication requirements and interoperability needs were severely compromised and backup systems were often limited or nonexistent.

- The scope of the devastation, including the flooding in the New Orleans area, made a comprehensive damage assessment and an estimate of services victims might need very difficult. After Hurricane Andrew, similar to the aftermath of Hurricane Katrina, it was several days before local authorities had a full picture of the situation to determine how much and what types of assistance were needed. A catastrophic event will overwhelm the capacity of state and local officials to assess damage, and our preliminary work indicates that the military's significant capabilities in assessing damage—a capability used for Hurricanes Katrina and Rita, and other past disasters—should be an explicit part of future major catastrophic disaster plans.

- While there were aspects that worked well, it appeared that logistics systems for critical resources were often totally overwhelmed by Hurricane Katrina, with critical resources apparently not available, properly distributed, or provided in a timely manner. In addition, our preliminary work assessing agency acquisition practices for responding to the hurricanes indicates that those agencies needed additional capabilities to be able to: (1) adequately plan for and anticipate requirements for needed goods and services, (2) clearly communicate responsibilities across agencies and jurisdictions, and (3) deploy sufficient numbers of personnel to provide contractor oversight. These capabilities are critical to ensuring that agencies receive the goods and services needed to accomplish their missions in a timely manner and at fair and reasonable prices.

- The magnitude of the affected population in a major catastrophe also calls for greater capabilities in several areas. For example, evacuation capabilities must include evacuating special needs populations such as those in hospitals and nursing homes, coordinating transportation assets, and ensuring that receiving shelters are not overwhelmed. Search and rescue and mass care should work together in a seamless

transition so that victims are not just rescued, but can be taken to a place of shelter.

- Mass care—sheltering, feeding, and related services—following Hurricane Katrina required the integrated efforts of many organizations, including volunteer groups, charities and other nongovernmental groups, organizations providing mutual aid, and the military. Although many of these efforts were successful, it appeared that Hurricane Katrina seriously challenged the capacity of organizations such as the American Red Cross and FEMA to provide expected services to certain populations and in certain areas and at certain times. Housing beyond short-term shelters also became—and remains—a major problem, especially for victims who either cannot return to their community or require housing options in their community if they do return.

- Additional capability will be needed to effectively manage and deploy volunteers and unsolicited donations. Our early work indicates that because of the magnitude of the storms, volunteers and donations, including from the international community were not generally well integrated into the overall response and recovery activities. For example, there were challenges in integrating the efforts of the Salvation Army and smaller organizations, often local churches and other "faith-based" organizations. In addition, federal agencies involved in managing the international assistance were not prepared to coordinate, receive, distribute, or account for the assistance. Agency officials involved in the cash and in-kind international assistance told us the agencies had not planned for the acceptance of international assistance for use in the United States and, therefore, had not developed processes and procedures to address this scenario.

- Lastly, beginning and sustaining community and economic recovery, including restoring a viable tax base for essential services, calls for immediate steps so residents can restore their homes and businesses. Removing debris and restoring essential gas, electric, oil, communications, water, sewer, transportation and transportation infrastructure, other utilities, and services such as public health and medical support are vital to recovery and rebuilding. In less severe disasters, restoring these lifelines is easier. However, the magnitude and scope of Hurricane Katrina painfully makes visible the many challenges in effectively addressing these issues.

GAO will continue our work on a wide range of issues relating to the preparation, response, recovery, and reconstruction efforts related to the

hurricanes that I have discussed today. We have over 30 engagements underway and look forward to reporting on them throughout 2006. We will provide Congress and the American people with a comprehensive summary of what went well and why, what did not go well and why, and what, if any, specific changes are called for in the National Response Plan.

APPENDIX 7

General Counsel
U.S. Department of Homeland Security
Washington, DC 20528

Homeland Security

February 8, 2006

J. Keith Ausbrook, Esq.
Chief Counsel
House Select Bipartisan Committee on Katrina
2157 Rayburn House Office Building
Washington, DC 20515

Dear Keith:

We appreciated the opportunity to visit with you to discuss Mr. Walker's and the General Accountability Office's "preliminary observations" on the Department of Homeland Security's performance during Hurricane Katrina. As the Secretary has previously testified, the Department is not satisfied with many aspects of response for Hurricane Katrina and is working to remedy shortfalls in advance of the coming hurricane season. There are many appropriate criticisms regarding federal, state and local government entities involved in Katrina. Our meeting, however, addressed Mr. Walker's investigative methodology and the fact that several of his "preliminary observations" are not founded in any factual record. In the interest of brevity, we summarize certain of those issues below.

Premature Conclusions. First, Mr. Walker reached and announced conclusions regarding the Department without speaking with people in the Department actually involved in the decision-making process. Mr. Walker acknowledges this in his printed statement, which we understand to have been released to the press the day before his press conference: He states that he has "interviewed officials and analyzed information from the various involved federal agencies such as FEMA and the Department of Defense (DOD)"—but conspicuous by its omission is the interview of any officials from DHS headquarters. Indeed, Mr. Walker acknowledges that his report is only preliminary by qualifying his conclusions by describing them as "key themes . . . [that] *seem* to be emerging." (*See* Statement by Comptroller General, Feb. 1, 2006, at 3 (emphasis added)).

We do not believe it appropriate to reach conclusions regarding decisions purportedly made by top Department officials, *without* first speaking with the key personnel at DHS. For example, Mr. Walker opines on the Department's interpretation and use of the National Response Plan ("NRP") during Katrina. Robert Stephan, who is now our Assistant Secretary for Infrastructure Protection,

www.dhs.gov

was an author of the NRP and advised DHS leadership on the NRP during Katrina. Mr. Stephan was never consulted by Mr. Walker or his staff.[1]

Misunderstanding of Basic Roles and Responsibilities. Mr. Walker states that "no one was designated in advance to lead the overall federal response in anticipation of the event. . . ." The statement demonstrates a lack of understanding of the roles and responsibilities of the FEMA Director. Once the President declared an emergency, Mr. Brown had the authority necessary to direct the assets of the federal government under the Stafford Act. And he was doing so: the transcript of the FEMA video teleconference from the day before landfall, Sunday, August 28, reveals that the States, including Louisiana, along with our federal partners, were in fact coordinating through the FEMA Director and, indeed, expressed satisfaction at the level of pre-landfall federal support.[2] In fact, it is undisputed that unprecedented quantities of assets were indeed pre-positioned prior to landfall. *See* Attachment A (listing certain assets prepositioned before Hurricane Katrina).

Mr. Walker's conclusion also implies that there was some unmet need in the days prior to landfall—that DHS did not "lean forward." However, even a quick reading on the August 28, 2005 FEMA video teleconference transcript would have revealed that the States expressed satisfaction with the federal pre-positioning of assets, that Louisiana reported that the evacuation was going well, and that DOD was fully engaged, among other things. (In fact, Louisiana's Colonel Smith *directly refutes* Mr. Walker's conclusion that DHS was not leaning forward. *See* Attachment B for text of the Video Conference from August 28, 2005.)

Misunderstanding of the NRP. Mr. Walker also concludes that it was a mistake not to employ the NRP's Catastrophic Incident Annex (CIA), which he believes would have accelerated the response. First, as DHS NRP experts have advised, neither the CIA nor the Catastrophic Incident Supplement (CIS) was applicable—these documents were designed for no-notice or short-notice incidents where anticipatory preparation and coordination with the State under the Stafford Act are not practicable. Second, the implementation mechanism for the CIA, the CIS, was not in force, and had not been disseminated or trained on at the time of Katrina. Third, the Department already had authority to "push" assets to the field under the Stafford Act without formally utilizing the CIA or CIS. *See* Attachment B (Instruction from Mike Brown: "I want to see that supply chain jammed up just as much as possible. . . . Just keep jamming those [supply] lines full as much as you can with commodities.") As noted, Katrina has demonstrated certain weaknesses and ambiguities in the NRP, particularly with regard to the Federal response to catastrophic events where State and local response capabilities are severely affected. The Administration will be addressing these issues as part of its lessons learned process.

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[1] Just one example of a simple problem that could have been repaired: in his second paragraph, Mr. Walker states that he interviewed the "primary federal official." Of course, the NRP refers to a "*principal* federal official," or PFO, but not a "*primary* federal official." Additionally, as there were two PFOs named during Katrina response, it is unclear to whom he is referring.

[2] Mr. Walker did not request, and we have no indication that Mr. Walker has ever reviewed, this or any other FEMA VTC transcript.

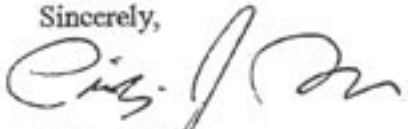
Finally, Mr. Walker raises the issue of the declaration of an incident of national significance. The language of the NRP provides that ". . . all Presidentially declared disasters and emergencies under the Stafford Act are Incidents of National Significance. . . ." Secretary Chertoff's prior testimony before your committee already explained the purpose of the August 30 memorandum naming Mr. Brown as PFO. Of course, the Administration is continuing to review the language of the NRP to address any ambiguities or uncertainties in the use of particular terms.

Coast Guard. Mr. Walker gives well-deserved credit to the Coast Guard as a "federal responder . . . [that] 'lean[ed] forward' in proactive efforts anticipating a major disaster." In criticizing DHS, he fails to recognize that the Coast Guard is indeed part of this Department, and that the Secretary was in communication with the Coast Guard about their important life-saving efforts during Katrina. We refer you to the Secretary's testimony on this point.[3]

Preparedness and Planning. Mr. Walker points out that "training and exercises necessary to carry out these plans were not always developed or completed among the first responder community." Upon taking the helm of the Department, the Secretary recognized that preparedness required retooling and proposed, in the Department's Second Stage Review, that a new preparedness directorate be established. Because of the statutory 60-day waiting period, these changes were not in place at the time Katrina struck. Mr. Walker's report does not mention the pre-hurricane fixes proposed by the Secretary in 2SR, and his report is lacking for that reason as well.

We would be pleased to discuss any of these critiques with you in greater detail.

Sincerely,



Philip J. Perry
General Counsel

[3] "[O]ne of the things that I spoke to the Coast Guard at one point about was the need to make sure we were mapping areas where people might have just spontaneously collected to make sure we could get them food and water." *See* Secretary's Testimony to Committee (Oct. 19, 2005).

Exhibit A

Water (1 trucks = (approximately) 18,000 liters)

5 trailers at Superdome = 90,000 liters of water

211 trailers pre-staged around region = 3,789,000 liters of water

39 trailers Beauregard, LA (702,000 liters)
40 trailers Meridian, MS (720,000 liters)
53 trailers Maxwell, AL (954,000 liters)
20 trailers Saufley Field, FL (360,000 liters)
29 trailers Homestead, FL (522,000 liters)
30 trailers Mc Entire, SC (540,000 liters)

Ice (1 truck = (approximately) 40,000 pounds)

114 trailers pre-staged around region = 4,560,000 pounds of ice

22 trailers Beauregard, LA (880,000 pounds)
16 trailers Maxwell AL (640,000 pounds)
21 trailers Meridian, MS (840,000 pounds)
54 trailers Craig Field/Selma AL (2,160,000 pounds)
1 trailer Barksdale, LA (40,000 pounds)

325 trailers in Cold Storage = 13,000,000 pounds ice in Cold Storage

230 trailers Thomasville, GA (9,200,000 pounds)
25 trailers Montgomery, AL (1,000,000 pounds)
17 trailers Alexandria, LA (680,000 pounds)
8 trailers Fort Worth, TX (320,000 pounds)
45 trailers San Antonio, TX (1,800,000 pounds)

Meals Ready to Eat (MREs) (1 trucks = (approximately) 21,888 MREs)

2 trailers Superdome (43,776)

85 trailers pre-staged around region = 1,860,480 MREs pre-staged

14 trailers Beauregard (306,432)
30 trailers Maxwell, AL (656,640)
10 trailers Meridian, MS (218,880)
10 trailers Saufley, FL (218,880)
15 trailers Homestead, FL (328,320)
6 trailers Mc Entire, SC (131,328)

97 trailers in Logistic Centers = 2,123,136 MREs pre-staged

5 trailers Atlanta, GA (109,440)
46 trailers Palmetto, GA (1,006,848)
42 trailers Ft. Worth, TX (919,296)
4 trailers Moffett, CA (87,552)

Logistics Center Rockville Shipments:

August 27th

Three staging areas identified: Houston, TX; Memphis, TN; and Anniston, AL

0800 hrs: Packaged and shipped 4 Patient Treatment Caches and 4 Pharmaceutical Caches to Houston, TX

1750 hrs: Packaged and shipped 2 Patient Treatment Caches and 2 Pharmaceutical Caches to Memphis, TN

2000 hrs: Packaged and shipped 3 Patient Treatment Caches, 3 Pharmaceutical Caches and one Veterinary Medical Assistance Team (VMAT) Cache to Anniston, AL

August 28th

1300 hrs: Management Support Team (MST) Cache left LC-Frederick

1800 hrs: Packaged and shipped 3 Patient Treatment Caches and 3 Pharmaceutical Caches to Ft. McClellan, AL

2000 hrs: Packaged and shipped 3 additional Patient Treatment Caches and 3 additional Pharmaceutical Caches to Memphis, TN

August 29th

0130 hrs: Packaged and shipped 3 additional Patient Treatment Caches and 3 Pharmaceutical Caches to Memphis, TN

1000 hrs: Loaded on trailers and shipped 1 Disaster Portable Mortuary Unit (DPMU)

MOBILE EMERGENCY COMMUNICATIONS SUPPORT FOR HURRICANE KATRINA

As of August 29th, 2005:

All available MERS assets committed to Hurricane Katrina

MERS Denton, TX
Staged at Barksdale AFB; RNA and JFO build out team in LA EOC, Baton Rouge, LA
MERS Denver, CO
Convoys continue
MERS Maynard, MA
Equipment staged at McGee-Tyson
MERS Thomasville, GA
NDMS supported in Jackson, MS, all other sites operational
MERS Bothell, WA
Deploys additional equipment en route to LA

2000 hrs: Packaged and shipped 3 Patient Treatment Caches, 3 Pharmaceutical Caches and one Veterinary Medical Assistance Team (VMAT) Cache to Anniston, AL

August 28th

1300 hrs: Management Support Team (MST) Cache left LC-Frederick

1800 hrs: Packaged and shipped 3 Patient Treatment Caches and 3 Pharmaceutical Caches to Ft. McClellan, AL

2000 hrs: Packaged and shipped 3 additional Patient Treatment Caches and 3 additional Pharmaceutical Caches to Memphis, TN

August 29th

0130 hrs: Packaged and shipped 3 additional Patient Treatment Caches and 3 Pharmaceutical Caches to Memphis, TN

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Staged at Barksdale AFB; RNA and JFO build out team in LA EOC, Baton Rouge, LA
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MERS Maynard, MA
Equipment staged at McGee-Tyson
MERS Thomasville, GA
NDMS supported in Jackson, MS, all other sites operational
MERS Bothell, WA
Deploys additional equipment en route to LA

Exhibit B

Excerpts from August 28, 2005 videoteleconference:

MIKE BROWN: Okay. We'll move on now to the states. Louisiana?

COLONEL SMITH: Good morning, Mike. This is Colonel Jeff Smith here in Louisiana. We certainly appreciate those comments from the President, because I can tell you that our Governor is very concerned about the potential loss of life here with our citizens, and **she is very appreciative of the federal resources that have come into the state and the willingness to give us everything you've got**, because, again, we're very concerned with this.

I'm going to turn the briefing over for a moment to our Operations Officer, just to kind of give you a quick laydown of things. This is Colonel Bill Doriant.

COLONEL DORIANT: The Emergency Operations Center is at a Level 1, which is the highest state of readiness. We've got currently 11 parishes with evacuations, and climbing. Eight are mandatory, including a first-ever mandatory for New Orleans. We've got 38 parish declarations of emergency; also the state declaration and the Presidential declaration of emergency.

Evacuations are underway currently. We're planning for a catastrophic event, which we have been planning for, thanks to the help of FEMA, when we did the Hurricane Pam exercises. So we're way ahead of the game there.

Our priorities right now are sheltering, and then planning for search and rescue and commodities distribution after recovery.

That's all I have at this time.

COLONEL SMITH: I'll just tell you that the evacuation process is going much better than it did during Hurricane Ivan. Nobody anticipated that it would be easy. Nobody anticipated that there wouldn't be traffic jams. But by and large, it has gone much better than it did with Ivan. And, of course, we still have a contraflow in effect at this particular point in time, and we do still have heavy traffic coming out of New Orleans, but by and large that process is going very well.

We have established a unified command here with our federal coordinating officer. Our ERD-A team, ERD-N team is on the ground here. And, again, as our Operations Officer pointed out, we're spending a lot of time right now with the search and rescue, making sure that we marry the appropriate state assets and the federal assets, so we can have an effective search and rescue effort just as quickly as possible.

We're also taking a look at our sheltering needs, long-term sheltering needs, looking at sites to start bringing in the temporary housing. So we're not only fighting the current battle, managing expectations here with our local parishes, but we are also working with FEMA and our other federal partners to have the most effective response and recovery that we possibly can during this time.

So, again, I want to say thank you very much for all that you're doing. I think that at this point in time our coordination is as good as it can be, and we just very much appreciate the President and your commitments to resourcing our needs down here.

Any questions that you have, we'd be glad to take them now, unless you want to hold that until later. That's your call, Mike.

MIKE BROWN: Any questions? Colonel, **do you have any unmet needs, anything that we're not getting to you that you need or --**

COLONEL SMITH: **Mike, no.** (Inaudible) resources that are en route, and it looks like those resources that are en route are going to -- to be a good first shot. Naturally, once we get into this thing, you know, neck deep here, unfortunately, or deeper, I'm sure that things are going to come up that maybe some of even our best planners hadn't even thought about. So I think flexibility is going to be the key.

And just as quickly as we can cut through any potential red tape when those things do arise, you know, we just need to look at it. **We appreciate your comments. I think they were to lean as far, far as you possibly can, you know, without falling, and your people here are doing that.** And that's the type of attitude that we need in an event like this.

So, again, thank you very much.

MIKE BROWN: All right. I'll be in Baton Rouge probably about 4:00 this afternoon, so I'll see you sometime this evening.

* * *

MIKE BROWN: Any questions? (Missing) on the commodities that **I want to see that supply chain jammed up just as much as possible**. I mean, I want stuff (missing) than we need. Just keep jamming those lines full as much as you can with commodities.

My gut tells me we're -- that's going to be one of our biggest needs. So just (missing) up tight.

* * *

SECRETARY CHERTOFF: (Inaudible.) Yes. Hi, this is Secretary Chertoff. And, again, as it relates to the entire department, **if there's anything that you need from Coast Guard or any other components that you're not getting, please let us know**. We'll do that for you, OK.

MIKE BROWN: I appreciate it. (Missing.) Having been through many of these, the Coast Guard and ICE and all of the others have been incredibly good to us. And I hope we never have to call you and tell you that I can't get help from the Coast Guard or somebody. Thank you for those comments.

SECRETARY CHERTOFF: Secondly, **are there any DOD assets that might be available**. Have we reached out to them, and have we I guess made any kind of arrangement in case we need some additional help from them?

MIKE BROWN: We have DOD assets over here at the EOC. They are fully engaged, and we are having those discussions with them now.

APPENDIX 8

Supplementary Report

to the Findings of the Select Bipartisan Committee to Investigate the Preparation for and Response to Hurricane Katrina

Presented by the Select Committee on behalf of
Rep. Cynthia A. McKinney

Submitted this Monday, February 6, 2006

"Struggle is a never ending process.
Freedom is never really won.
You earn it and win it in every generation."

~ Coretta Scott King (1927-2006)

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PREFACE

The corporate grip on opinion in the United States is one of the wonders of the Western world. No First World country has ever managed to eliminate so entirely from its media all objectivity - much less dissent.
~ Gore Vidal

What is particularly naïve and peculiarly vicious about the conservative behavioral outlook is that it tends to deny the lingering effect of black history —a history inseparable from though not reducible to victimization. In this way, crucial and indispensable themes of self-help and personal responsibility are wrenched out of historical context and contemporary circumstances —as if it is all just a matter of personal will.
~ Cornel West

The report you are reading comes about through my participation on the Select Bipartisan Committee to Investigate the Preparation for and Response to Hurricane Katrina as a "guest," since the Leadership of the Democratic Party chose to boycott the process. The Select Committee's Final Report calls this approach self-defeating, "given that the Select Committee's composition and minority subpoena authority would have given the Democrats more clout than they enjoy on any standing committee of the House." I chose to get my foot in the door on this Committee because I knew that time was urgent for the hurricane survivors, who needed our help and our answers, and who also needed to connect with Congress. In that spirit, I urged the Committee to take the time to listen directly to some of the hurricane survivors. I also did not concur with Members on my side of the aisle who were or are holding out for an investigation by an independent commission along the lines of the deeply flawed 9/11 Commission.[1]

In its Report the Select Committee expresses its gratitude for the participation of minority members, including myself. In return, I wish to express my gratitude to the Committee Members, the Committee Staff and especially to Chairman Tom Davis for creating an atmosphere of constructive dialogue, for taking the effort to arrange for a Congressional Delegation to the Gulf Coast on January 19th and 20th, and in particular for agreeing to hold a special hearing at my request. At that hearing on December 6th, we heard directly from some people who rarely get the opportunity to speak to Congress and the American people. Some of their personal testimonials were shocking and disturbing, and that is precisely why I believe that they needed to be heard. I thank the Members and Guests for taking the time to listen. From this I take away some hope, for the spirit of a representative democracy can only be sustained through a constant dialogue between citizens and their elected officials.

Finally, I wish to express to Representatives Jefferson and Melancon of Louisiana, and Representative Taylor of Mississippi, my appreciation for their involvement in the Committee. While I have been engaged with the problems faced by thousands of evacuees now reside in the fourth district of Georgia, I can only imagine the enormity of the political as well as emotional

challenge faced by those dealing directly with the aftermath of the greatest natural disaster in our nation's history.

Government failed the people of the Gulf Coast. That appears to be the overriding theme of the Report. It is not something we did not know. We all saw it on our television screens. But the Report of the Select Committee is stunning for presenting us with a laundry list of failures. This must be qualified, of course, to acknowledge two major successes of government in this catastrophe. First, the largest pre-storm evacuation in our nation's history went of splendidly well for the millions who had the means to evacuate. Second is the heroic performance of first responders, the Coast Guard in particular, in rescuing tens of thousands of residents stranded in their homes. Their courage and dedication is truly to be commended.

Yet putting these two successes together, we immediately see that because the evacuation plan simply did not encompass those without their own means to evacuate, namely those living near or below the poverty line, without this major failing of an otherwise stunningly successful plan, there would not have been such an urgent need for rescue teams to conduct their daring feats of bravery.

The greater failure was the government's delayed and confused response. In general, poor coordination, poor planning and execution, and inadequate efforts at communication are cited in the Select Committee Report as causes of this failure. On its own terms, the Report also does a fair job of balancing, on the one hand, the fact that Hurricane Katrina simply overwhelmed existing capacity of the Federal Emergency Management Agency (FEMA), as well as relief organizations such as the Red Cross to cope with the scale of the catastrophe, with the overall inadequacy of preparation and planning.

Even more pointed is the Committee's conclusion that the lessons learned from the "Hurricane Pam" planning and preparedness exercise conducted in July 2004 were not applied to the response to Hurricane Katrina. The Hurricane Pam exercise was specifically designed to develop planning and response to a catastrophic hurricane hitting the Louisiana coast. It anticipated a scenario even worse than what actually happened before and after Hurricane Katrina. Given "Pam's striking resemblance to Katrina in force and devastation," the Report concludes, "many have been left wondering at the failure to anticipate, and plan for…essentials." Going back further, at a recent press conference, David Walker, Comptroller and head of the Government Accountability Office (GAO) stated that the GAO had made recommendations in the wake of hurricane Andrew in 1992, and that to date most of those recommendations had not been followed up on.[2]

After so many tens of billions of dollars have been spent in establishing and maintaining a new super-agency, the Department of Homeland Security, attentive Americans must ask not only how such a stunning failure of government response to a natural disaster is possible, but also how it is possible that in the process of expending vast sums on new bureaucratic infrastructure charged with enhancing our safety we now learn that lessons of the past were ignored in a way that led directly to the scenario of the present failure. The Committee's Report offers at least a large part of the answer when it points repeatedly to a failure to take initiative, which can easily be interpreted as a failure of leadership. As we read in the Report:

> …a dispassionate review made it clear that even an extraordinary lack of situational awareness could not excuse the feckless, flailing, and organizational paralysis evident in the documents and communications the Committee reviewed.
>
> Leadership requires decisions to be made even when based on flawed and incomplete information. Too often during the immediate response to Katrina, sparse or conflicting information was used as an excuse for inaction rather than an imperative to step in and fill an obvious vacuum.

This brings us to the content of the present report. Surprising as the quote above may be, coming from the Majority Party, it remains in keeping with the overall approach of many previous investigations into government failures, because it seeks to address the problem in predominantly bureaucratic terms. Over the years, there has been an almost cyclical pattern of crises or scandals followed by investigations that point out failures, followed by calls for bureaucratic reform.[3] Just as the 9/11 Commission called for a new czar to fight terrorism and got it, the call has already gone out in response to the failure of Hurricane Katrina for the selection of a right-hand man or woman to be the President's point person in coordinating natural disasters.[4] Yet it becomes clear as we proceed that the Secretary of Homeland Security had this authority and failed to exercise it in this disaster.

In this report we are less interested in engaging in a debate about what bureaucratic reforms are needed to fix the problem for the future than we are in addressing areas of omission in the Select Committee Report. In general, the Select Committee Report does not seem to acknowledge the full ramifications of Hurricane Katrina, and the way in which it represents a watershed moment for our nation. The testimony taken by the Select Committee was overwhelmingly from public officials, and this gave undue place to issues of personal and bureaucratic success or failure. The hearings took place during a period of intense confusion and agony for displaced survivors, who often spoke of bewilderment at the *ongoing* failure of the government to act. Moreover, while the Report cites agencies at all levels of government for failure, it generally omits the failure of *the White House or Congress* to respond to the long-term crisis which, collectively, Hurricane Katrina, the levee failures, and the inadequate response have spawned.

The death toll from Katrina stands at over 1,300. But the more astonishing figure is the number of missing, which varies between 3,000 and 6,600 souls, depending upon the source. According to the U.S. Department of Health and Human Services, about 500,000 people, including survivors and those who came to their rescue, may need mental health services.[5] The term "Katrina Stress" has become current, and the level of suicide among survivors is reportedly very high. Calls to the National Suicide Prevention hot line more than doubled in September of 2005,[6] and have stayed high.

Tens of thousands of evacuees living in hotels and motels with their accommodations provided by FEMA face eviction on March 1, 2006. Many have already been evicted. Attorneys for the Lawyers' Committee on Civil Rights have expressed concern that unless urgent action is taken, we may soon see a new class of "Katrina Homeless" in America.

The current and pressing issues of ensuring or restoring survivors with their basic rights of access to housing, education, voting and the right of return may sit outside the narrow window of the ten days before and after the storm that the Select Committee was charged with investigating, but this should count as a major omission, for our government continues to fail the survivors, and at points in this report we will be stepping outside the box, as it were.

In a recent speech, President George W. Bush spoke of how reconstruction of the Gulf "would provide a 'fantastic opportunity' for private businesses and investment. 'There is going to be a building boom down here. It's going to be an exciting time,' he said. Bush suggested that the $85 billion in assistance already pledged by the Federal Government was sufficient. He added: "'I'm sure there's still concern about the future, but the eyes have cleared up'"[7] To suggest that none are still crying or in pain is an insult to the dignity of the survivors. A greater insult is the fact that while the Bush Administration seems unwilling to spend the sums necessary to prevent tens of thousands of poor, mostly African-American survivors from being turned out onto the streets, the reconstruction efforts he is excited about involve giving multi-billion dollar, sweetheart, no-bid contracts[8] to firms like Halliburton, a company currently facing multiple investigations of fraud. For example, a Pentagon audit of the giant firm is now calling into question more than a billion dollars' worth of the company's bills in Iraq.[9] The Select Committee Report steers clear of this scandal. The only conflict of interest involving contractors that is dealt with concerns companies pursuing contracts with both local and federal government at once.

Initially, less than three per cent of contracts went to minority-owned businesses, where the usual minimum was five per cent.[10] In a situation where minority businesses were hurt the worst, and where returning residents needed those contracts to help get their businesses up and running again, the favoritism towards big, outside contractors over local businesses added insult to injury. Harry Alford, President of the National Black Chamber of Commerce, testified before the Select Committee that, as he sees it, Washington has been in bed with a contractors' cartel since Desert Storm. Having hijacked the contracting process, this cartel controls the distribution of contracts regardless of price, quality or due diligence. Various mechanisms exist to make it too expensive for minority business owners to do business. We have also talked with experts and business owners who complain about the subcontracting system, whereby big companies like Bechtel or EEC get contracts to do cleanup work at between $24 and $44 per square yard, but subcontract this out to smaller contractors often hiring minimum wage workers at between $4 and $7 per yard. This is far too high a level of overhead to make sense. Additionally, reports indicate that the chain of subcontracting can result in delays of payments for workers, or one case involving Latino immigrant workers, no payment at all.[11] Arnold Baker, an African-American business owner in New Orleans, had $600,000 worth of sand confiscated from his premises by authorities to fix the breaches in the levees. He has yet to receive any promise of reimbursement.[12]

If our government can afford to ignore billions of dollars of waste to corrupt no-bid, sweetheart deal contractors, then certainly whatever the local, state and Federal authorities deem necessary for relief and reconstruction efforts should be supplied by the Federal Government, given its failure to respond adequately, in light of prior warnings.

Another extremely important aspect of Hurricane Katrina that the Select Committee Report effectively ignores is the range of releases of hazardous and toxic materials into the environment along the Gulf Coast. The Environmental Protection Agency (EPA) is basically shrugging off what may turn out to be the biggest environmental disaster in our nation's history. In the shadow of so many other controversies, this issue has received scant attention from any quarter.

Hurricane Katrina represents a watershed moment, as many have observed, because it has forced Americans to confront the taboo on discussions of race and poverty at home. The Select Committee's Report elected not to tangle with these issues in any depth. This supplementary report sees these as two major omissions, and it will begin by addressing them. We will look at these issues through some of the survivors' narratives of being evacuated or detained, including the abysmal state of prison conditions in New Orleans.

In his early work *The Theory of Moral Sentiments*, Adam Smith suggested that human beings are generally inclined to have great sympathy for those who have suffered great loss because they have fallen from a high to a low social condition, because they can imagine the magnitude of the loss, but are far less inclined to have much sympathy at all for those who, starting in a low position, fall a bit lower. Perhaps this explains how some Americans can be so callous as to travel to New Orleans to take bus tours of the devastated Lower Ninth Ward, without bringing material aid or volunteering to help in the clean-up. And perhaps Smith's observation sheds light on the current plight of survivors.

The issues that were washed ashore by Hurricane Katrina will continue to confront us many years to come. While driving through one neighborhood full of gutted houses after another in New Orleans, or along the Mississippi coast where piles of debris sit where so many old, antebellum houses once stood, or when confronting the harsh plight faced by so many evacuees in temporary and very tenuous housing, it can be easy to become simply overwhelmed at the thought of the task ahead. The work of the Select Committee ends on February 15. The enormous challenge of confronting the issues raised in these reports does not.

Cynthia A. McKinney
Member of Congress
February 6, 2006

Note: The focus of this report is on New Orleans, for reasons that should quickly become apparent to the reader. A broader and more balanced geographical approach was intended, and with more time, could have been achieved.

1. HURRICANE KATRINA, POVERTY AND RACISM

Poverty and Race in New Orleans

Before Hurricane Katrina, there was another hurricane, a slow-moving economic hurricane bringing greater levels of poverty to the working-class cities like New Orleans. 2005 was the fourth consecutive year of increasing poverty in America, with one million additional Americans falling below the poverty line.[13] Seventy per cent of employees in the New Orleans Metropolitan Area are (or were) working class, defined as "those people with relatively little power at work" and whose incomes are typically below $40,000 per year. Poverty is something that happens to working class people, not middle class or corporate elite people. Specifically, those employed in the lowest-paid occupations such as health support, "food preparation, building maintenance, personal care, and sales" may have "occupations that pay from $12,000 to around $18,000 a year—at best not enough to bring a family of four out of poverty."[14] Being poor does not mean someone is not working. It means that a family is not earning enough income to really get by.

Below is a table of the 2004 demographics for employed adults from selected parishes within Metro New Orleans:

New Orleans Metropolitan Area: White and Minority Working Adults[15]				
Parish	**White**	**%**	**Minority**	**%**
Jefferson	155,422	74%	54,654	26%
Orleans	**64,066**	**34%**	**123,689**	**66%**
Placquemines	8,030	77%	2,050	23%
St. Bernard	25,959	90%	2,787	10%
St. Charles	16,776	77%	5,072	23%
St. James	5,072	56%	3,997	44%
St. John the Baptist	11,358	59%	7,890	41%
St. Tammany	80,178	89%	9,838	11%

In the 2000 census, over 67 % of the population of the City of New Orleans (Orleans Parish) was African-American, 28% were white, 3% Latino and 1.28% "of two races," perhaps representing the "Creole" population. [16] Creoles have historically been a privileged group within New Orleans Society, and the Mayor of New Orleans since 1978 has been a person of color, or rather a "creole of color." Ernest Nathan Morial (1978-1986), Sidney Barthelemy (1986-1994), Marc Morial (1994-2002) and C. Ray Nagin (2002-) have all been light-skinned Creoles. But outside of New Orleans they are widely perceived as black. The percentage of minorities (most of whom are black) living below the poverty line in the City of New Orleans is of course higher than the number of poor whites. But it may be surprising to some to learn that ***for the Greater New Orleans Area in the wake of Katrina, a greater number of whites (85,000) live below the poverty line than do minorities (65,000).***

When the levees broke, the flooding in the City of New Orleans became the focus of media attention, and while other parishes experienced major flooding, Orleans Parish was hit the worst. With two thirds of the population of Orleans Parish being African-American, media cameras portrayed a situation where blacks were the primary victims. The drama unfolding in the City of New Orleans drew attention away from the complete destruction of Placquemines Parish which, stretching south along the Mississippi and surrounding wetlands, took the brunt of the storm surge, and the equally devastating flooding of St. Bernard's Parish.

Yet low income whites are not the only ones who experienced this invisibility. 124,000 Latinos made up three per cent of Louisiana's population. Throughout the Gulf Coast Region some 145,000 Mexicans live and work, and 40,000 Mexicans were displaced by Katrina out of New Orleans alone. Native Americans along the coast were hit terribly hard, including:

> the Parch Band Creek Indian Tribe in Alabama; the Coushatta Indian Tribe, Jena Band of Choctaw, and the Tunica-Biloxi Tribe in Mississippi. For one tribe near Chalmette, Louisiana, the local high school served as a tribal morgue, holding the bodies of Native American workers, including shrimpers and other fishermen, who were drowned in the flooding of New Orleans.[17]

Dr. Robin Rose of Oregon has been trying to get assistance for three small native groups in southern Mississippi had their communities literally washed away in the storm surge: the Pointe ou chien Tribe, the Iles des Jean-Charles Tribe and the Band of the Biloxi Chittamach are all tribes registered with the state, but because they have not been able to get Federal recognition, federal assistance has not been forthcoming.

Nearly 50,000 Vietnamese fisherman in Louisiana and the oldest community of Filipino shrimpers in the North America were displaced by the storm.[18] We heard very little about any of these peoples on *CNN* or *Fox* or *ABC*.

After the Select Committee Delegation stopped to visit the breach at the Industrial Canal along the western edge of the Lower Ninth Ward, where we witnessed the total destruction that was unleashed when the levee broke, releasing a twenty foot wall of water that leveled the immediate neighborhood (taking the highest death toll), our bus drove eastward to St. Bernard's Parish where the damage was basically just as severe. We were joined on the bus by St. Bernard Parish President, Junior Rodriguez, who told us that of over 6,000 homes in the parish, only four were not heavily damaged by the flood. Debris was everywhere and only a few homes were occupied. President Rodriguez did not mince words with our delegation, and he spelled out all the problems and runaround he was facing in dealing with FEMA, problems very similar to those facing the residents of Orleans Parish.[19]

The suffering of the residents of St. Bernard's parish, where 90% of the residents are white, draws to our attention to the fact that poverty is not racially specific, and nor is the vulnerability associated with it. When ex-FEMA Director Michael Brown testified before the Select Committee, Rep. Gene Taylor of Mississippi asked if he realized that Katrina hit at the end of the month, and that many of those living on fixed incomes, such as retirees, had already made their monthly purchases, and might not have foreseen the need to keep their gas tank full for the

possibility of an evacuation. Taylor suggested that FEMA did not take into consideration that many of those who stayed behind, black and white, were persons of limited means. Poverty increases a person's likelihood of being a victim during the storm, and after.

Income or class divisions in America increasingly cut across ethnic and racial divisions. Consider that while minorities make up 37% of the workforce in the New Orleans Metropolitan Area, minorities hold fully 26% of higher-paying managerial and professional jobs. ***Across the United States, 75% of minorities do NOT live below the poverty line***. Moreover, of the all those who do live below the poverty line in America, two-thirds are white. "Racism continues to operate and accounts for the fact that poverty is experienced *disproportionately* among blacks and Hispanics (and among women because of sexism). But we should not allow this comparatively heavy burden among minorities to blind us to the full realities of poverty in America."[20]

Racial Stereotyping and Racism

Hurricane Rita didn't care if you were rich or poor, as the equal destruction of the homes of the very wealthy and working class residents of the Mississippi coast will testify. But the flooding of New Orleans—because it hit predominantly African-American neighborhoods the worst, and because poverty *is* highest among blacks—seemed to reinforce widely held preconceptions that equate being "poor" with being "black." There was justifiable frustration expressed by many whites at the way the media shaped perceptions of the disaster by focusing on black poverty and black suffering while lower income whites in both rural and urban areas felt abandoned by emergency responders, as in many cases they were. Hurricane Rita, which struck the coasts of Texas and Louisiana on September 24, 2005, did little damage to cities or oil refineries, but it caused significant new flooding in rural areas and in other areas exacerbated rural flooding initially resulting from Hurricane Katrina, devastating many rural and mostly white communities and causing significant damage to hospitals. Undoubtedly part of the reason for a delay in meeting the needs of these communities was that responders were still overwhelmed by the magnitude of Katrina's impact.

At the same time, however, attributing black suffering primarily to poverty not only reinforces negative racial stereotypes of blacks, it also makes it very frustrating for blacks and other minority persons who have been the victims of treatment motivated by racial hatred if all of their suffering is simply attributed to their poverty, which is already assumed. The media coverage of the aftermath of the hurricane tended to reinforce such racial stereotypes of Blacks. For example, in one of his running commentaries, *CNN* anchor Wolf Blitzer stated: "You simply get the chills every time you see these poor individuals …so many of these people, almost all of them we see, are so poor and they are so black."[21]

Racial stereotyping was starkly evident in the use of the term "refugees" that was typically used to describe black residents seeking to evacuate. The term "refugee" denotes a person crossing a national border in search of security. Thus the use of the

term "refugee" to describe survivors may have served to create confusion in the minds of casual observers of television reports, by equating them with, for example, Haitian refugees seeking asylum in the United States, wave after wave of whom have been historically denied their requests for asylum. Workers and volunteers at evacuation shelters in Louisiana and Texas "heard loud and clear from those living there that the government, the media and everyone else should call them something other than refugees. 'We ain't refugees. I'm a citizen,' insists Annette Ellis." One day, after getting an earful from a crowd of 800 at the Bethany World Prayer Center in Baker, Louisiana, President Bush went live on television to urge the practice be stopped.[22] Usage of the term "refugee" fell precipitously. Here we must commend the President for at least taking some initiative.

Another area of apparent racial stereotyping involves reports of widespread looting. While blacks who commandeered supplies during the storm were called "looters", at least one television report showed white survivors "taking" supplies from a store. *USA Today* quoted one resident who compared the looters to cockroaches.[23] Most incidents of the goods taken during the storm were taken to address human needs in a crisis. Food and clothing were stolen for family and neighbors. Doctors who raided pharmacies for medicines to treat their patients are praised in the *Select Committee Report*. Dire circumstances make for dire methods. However, as one commentator writes, even violent crimes were undertaken for reasons that are understandable, given the circumstances. "Carjackers were looking for cars to get out. Pirates were looking for boats." Looting has occurred in many previous crises. Yet it was clear from their statements that neither none of the major players from Bush to Chertoff to Governor Blanco were prepared for Hurricane Katrina.

> I don't mean that they failed to anticipate the magnitude of the flooding; we knew that already. I mean that they have no idea how easily a natural disaster can turn human beings into a second-wave destructive force. They don't understand that disasters often bring out the worst in us, that the human dynamics are collective, and that 'responsibility' is quickly swamped. If you don't understand these dynamics, you can't plan for them. You end up pleading for 'personal responsibility' when what you needed was air drops and the National Guard.
>
> It's not like this hasn't happened before. The 1977 New York City blackout led to an epidemic of stealing. The mayor of Charleston, [South Carolina], during Hurricane Hugo says FEMA was clueless about law and order during that 1989 crisis. He thinks we need a military unit to take charge of these situations. That may be going a bit far, but we certainly need to think more systematically about the human dynamics of natural disasters. We run computer models of hurricanes, levee breaches, and flooding. What about isolation, desperation, looting, fighting, and shooting? It took the mayor of New Orleans three days to tell his cops to switch from rescue operations to controlling post-hurricane crime. Why? Because crime wasn't in the model.[24]

<u>Recommendation: When the *National Response Plan* and/or other disaster preparedness plans are revised, they need to be updated to anticipate looting as a highly probable and often rational</u>

<u>response to scarcity by individuals in an emergency. Rights of property must not supersede the right to food, water and medicine, i.e. the right to survive, especially not during a declared emergency.</u>

After Katrina, as the media hyped up reports of looting and presented black looting as mindless thuggery, an overall climate of fear was created, causing responders from both relief and law enforcement units, including the National Guard, to delay entry.

There still seem to be conflicting accounts of the level of street violence during the storm. The rumor of children being raped in the Superdome does indeed appear to have been just a wild rumor. But our office has received numerous calls claiming that some of the accounts that have now been dismissed as unsubstantiated by the media. One source says women at the Convention Center witnessed rapes, that women made sure to sit in groups, that inside the Convention Center, where it was pitch black, escaped prisoners roamed freely, and that at the height of it, only eight police officers were present before the rescue. During the Committee Delegation's meeting with first responders, the officer in charge of Special Forces at the Convention Center was asked how many people died. He could not say, he told us, but his men did remove any number of bodies, some with stab wounds. Survivors with direct experience who we have talked to are often loathe to get into the details, simply describing the conditions inside the Superdome or the Convention Center as "very bad."

Below we will also discuss below prisoners who had to escape from prisons in order to save their lives because they were left to die in the floodwaters. Regardless, the absence of any Federal forces on the ground in New Orleans for over a week, when National Guard forces were overstretched, left the situation in chaos.

Barbara Arnwine, President of the Lawyers Committee on Civil Rights, in testifying before the Select Committee, commented on the impact of rumors and stereotyping by saying that it is typical for rumors to spread in a crisis, but that in the case of Hurricane Katrina the rumors were racially charged. They amounted to allegations of massive criminal and subhuman activities by blacks. The rumors instilled fear and panic in aid workers, who then became reluctant to enter African-American communities to provide assistance. Ms. Arnwine believes that had their been a strong Federal presence sooner, providing security and communications, the rumors would have quickly died down.

Ms. Arnwine also noted that this did not apply only to New Orleans. Communities throughout the Gulf Coast Region saw no presence of staff from FEMA or its principal subcontractor, the Red Cross, for as long weeks after the storm in some cases. She pointed out that the majority African-American residents of Gulfport, Mississippi, a town whose majority of African-American residents have long been familiar with racial stereotyping and governmental indifference, were essentially overlooked by the Red Cross, which preferred to establish its operations either in white towns or in the white part of town. Thus African-American churches came to the rescue of those hardest hit by the storm, using their limited resources to provide food and medicine, as well as shelter and transportation.[25] Given the scale of need, some churches went bankrupt. Although a Federal policy was established to compensate the churches for their

losses, Arnwine told the Committee that poor communication and racist assumptions concerning the likelihood of fraud have made it virtually impossible for these churches to get reimbursed.

Recommendation: FEMA or any agency that replaces it must be directed to produce impact and implementation policy studies aimed at producing emergency preparedness and response policies that address the particular needs of minority communities.

Recommendation: Congress should pass legislation to set procedures for protecting the civil liberties of minorities during an emergency situation. Armed forces and police should be on notice that individual acts of blatant discrimination or abuse of minorities will result in serious punishments, and systemic abuse will result in loss of financial support. Private relief organizations with discriminatory relief practices should be subject to review and possible loss of contracts.

FEMA's website directs viewers to support Operation Blessing, a $66 million dollar relief organization founded by religious businessman Pat Robertson. Shortly after Hurricane Katrina hit, Operation Blessing was featured prominently on FEMA's list of charitable organizations taking donations.[26] Only a week before Katrina hit, Robertson was brazenly calling for the assassination of a sitting head of state: Hugo Chavez of Venezuela. "We have the ability to take [Chavez] out, and I think the time has come that we exercise that ability," said Robertson.[27] When Ariel Sharon suffered a stroke in January, Robertson expressed similar ill, suggesting God had smote the Israeli Prime Minister when he told his television viewers: "He was dividing God's land, and I would say, 'Woe unto any prime minister of Israel who takes a similar course to appease the [European Union], the United Nations or the United States of America.'"[28] How can FEMA in good conscience direct traumatized disaster survivors into the hands of an organization run by a man who so plainly advocates murder by assassination and wishes death upon the suffering? We have no idea what Mr. Robertson did with the money, but we know this: Operation Blessing didn't show up to help out in mostly African-American neighborhoods.

In fact, African-Americans in New Orleans were on their own, much as the *Times-Picayune* predicted they would be. Writing in July 2005 the paper wrote:

> City, state and federal emergency officials are preparing to give the poorest of New Orleans' poor a historically blunt message: In the event of a major hurricane, you're on your own. In scripted appearances being recorded now, officials such as Mayor Ray Nagin, local Red Cross Executive Director Kay Wilkins and City Council President Oliver Thomas drive home the word that the city does not have the resources to move out of harm's way an estimated 134,000 people without transportation.[29]

Recommendation: Future emergency preparedness planning must include the provision of transportation for the elderly, the infirm and those without their own means of locomotion, as well as the placing of Disaster Recovery Centers (DRCs) as near as is feasible, to enable these evacuees to return to their homes as quickly and easily as possible.

When the storm hit, residents of Algiers, a mostly African-American community just north of Gretna, and of the Lower Ninth Ward, formed their own relief organization: the Common Ground Relief Collective (CGRC), in the absence of private of public relief assistance. On September 5th, a week after Katrina made landfall, local Algiers activist Malik Rahim and three of his colleagues started their efforts with just $50.

Mr. Rahim's name was among those on a list of speakers which our office suggested speakers for hearings, should any be held during the Select Committee's Delegation to the Gulf Coast on January 19-20, 2006. As the Select Committee elected not to hold hearings, we arranged a community event at a local church to take the testimony of the speakers.[30]

Sakure Kone, a member of CGRC spoke on behalf of Mr. Rahim at our meeting, and the section that follows is draw from his comments.

In flooded Algiers, the needs of the people were vast. The only thing working was the telephone. No stores, hospitals or clinics were open and there was no presence by officials. Malik Rahim put out a call by phone to his contacts across the country. Initially, paramedics arrived and met immediate needs by making door-to-door house calls. Mr. Rahim belonged to a local mosque: Mosque Bilal. At Mr. Rahim's suggestion, the officials at the mosque opened its doors to the public to serve as a free medical clinic. As more doctors, nurses and med students showed up to volunteer, the clinic became fully operational, seeing between 120 and 125 patients per day. The call had also gone out for food and water and these began arriving from all over the country. Mr. Rahim then set up a distribution center in his own home. To meet the intense demand, another distribution center and clinic was established across the river in the Lower Ninth Ward.

CGRC held discussions with government officials, but no governmental assistance to these efforts was forthcoming, perhaps due to CGRC's "no strings attached" policy with regard to assistance. "We were there for one purpose and one purpose only," said Kone, "and that is to meet the health, food and water needs of the community." Since September 5th, CGRC's volunteers have numbered 800, with 350 on hand as of January 19th, and a thousand more expected during spring break. CGRC currently serves over 300 meals at a time to local residents, and its volunteers have gutted, sanitized and refurbished dozens of homes, including homes in the Lower Ninth Ward that the City of New Orleans says it intends to bulldoze, though a court injunction has put a temporary halt on this.[31]

Stephen Bradbury also spoke at our New Orleans community meeting on January 19th, 2006. Bradbury works with the Association of Community Organizations for Reform Now (ACORN), which like CGRC helped to fill the needs of residents in the absence of public and private assistance in mostly African-American communities. Like CGRC, ACORN has undertaken the task of organizing volunteers to gut mold-infested houses gutting, seeking to refurbish a thousand houses by March 31st, 2006 as a first step toward allowing people to come back.

According to Mr. Bradbury, ACORN's focus since Hurricane Katrina has been to address three areas in which the rights of hurricane survivors have been or are still being violated:

1. Right of access to information: Federal, state and local governments have not stepped in to assist survivors to keep abreast of what is going on in their home. To meet this need, ACORN has set up the ACORN Katrina Survivors' Association, with centers in many of the cities where survivors were evacuated to.

2. Right of return: Government has a responsibility to try and ensure that those displaced by a natural disaster are located as close to their homes as possible. Yet not only were Katrina survivors evacuated to 44 states, some as far away as Washington State, but there has been a lack of interest in getting people back home, and survivors are being enticed to remain where they have been evacuated with everything from housing vouchers, clothing vouchers, Wal-Mart cards and so on. People relocated within Louisiana had a hard time even locating the Red Cross, unless they were in a shelter.

3. Right to participate in decision-making: ACORN is working on a daily basis to try to ensure people can come home and have a voice in decision-making. Government has an obligation to ensure that people have a role in the decision-making around the re-building of their homes "and that has not occurred in any way, shape or form." Neither the Governor's Commission, nor the Mayor's Committee had input from residents from low and moderate income families or from people who were not in New Orleans. The School Board has recently flaunted this by going ahead and saying that we will just be an all-charter school system, without input from the majority of people who will be impacted by their decision.

Mama D (Dyan French Cole) testified to the Select Committee about how she stayed at her residence throughout the disaster. Throughout the ordeal, she took in large numbers of evacuees and setting up a makeshift clinic with a local nurse on call to address illnesses. For this she was recognized by *CNN* as one of "Katrina's Heroes."

Many Americans may imagine that the functions performed by African-American churches and community self-help groups were actually provided by FEMA or the Red Cross. Where African-American survivors did get real outside help was after relocation, as Mr. Bradbury pointed out above. But the rumors and stereotypes that had been played up in the media followed them, and some were met with racism as renters refused to rent to "New Orleanians." Attacks against survivors have been reported in several cities.[32]

Many African-Americans and others are skeptical about the way in which families were split up and put on planes without being told where they were going, sending the African-American community from New Orleans into Diaspora. We must ask *qui bono*? Who benefits? In its eagerness to bulldoze the Lower Ninth Ward even as bodies are still being discovered in the debris, the Government of the City of New Orleans has been in a running legal battle with lawyers representing the displaced. It appears as if the City can scarcely wait to wipe the slate clean, deprive long-standing residents of their property rights, declare eminent domain and hand the survivors' property over to developers. It also seems clear that African-American communities are primarily the ones being targeted.

Consider the sentiments of three white and male residents of Jefferson Parish talking with two journalists about the black community in New Orleans:

> **Resident 1:** I wonder how many will come back.
>
> **Resident 2:** Well, that's why when they shipped them to Texas, man…
>
> **Resident 1:** They'll be in New York next year.
>
> **Resident 2:** But I tell you what, you guys keep track of this, the governor of Texas right now is getting all of this great publicity.
>
> **Resident 3:** He getting federal money, that's why
>
> **Resident 2:** Six months from now, they're going to vote him out of office. The disaster that he's brought to Texas is incredible.
>
> **Resident 3:** Yeah, they're walking out with these little white jars, glass jars, so their crack cocaine won't get wet.
>
> **Resident 2:** It's unbelievable. Every single person is the same—sociology kind of person—Well, I tell you what, that's the only good thing. And the best thing before all of this started, my wife and I always used to say this: Declare Martial law here and the federal government needs to invade this place. And they really do. So they finally did. We have schools that don't exist. The feds are now going to come in and rebuild this whole place. It's going to be much better after than it is now. But you all have no idea what—you know, what kind of city this is. I mean, it's a fun place. Don't get me wrong. As long as you have enough money to live [*gesturing upward with his hand level*] up here. See ya.[33]

The last statement by Resident 2 is a clear example of equating being "black" with being "poor." But even more noteworthy is his mention of a pre-Katrina conversation with his wife about the need for the Federal government to "invade" New Orleans, declare martial law, apparently to drive out the black population so that wealthy whites could develop their property. This raises the question of the extent to which such conversations were also taking place within governmental circles or among private developers prior to Katrina.

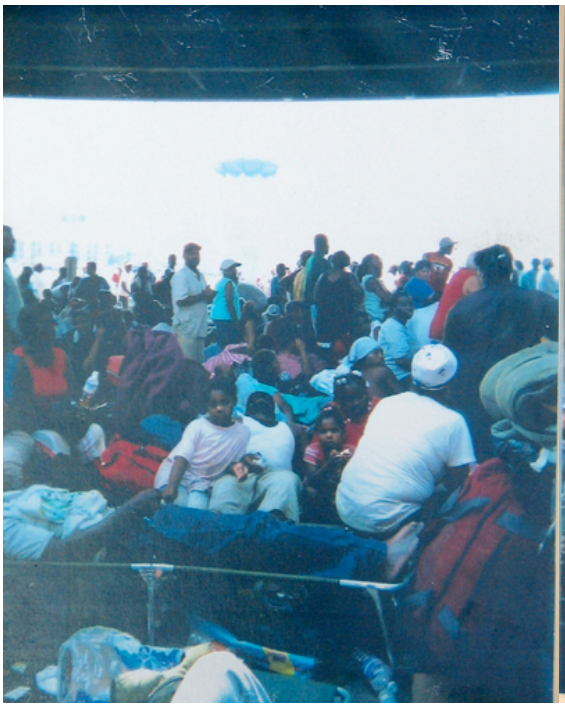
Testimonials from Evacuating New Orleans Residents

"There was a lot of racism down there in that City and a lot of people died because of it. And it's time for people to start telling the truth about it."

~ Linda Bowie, Hurricane Katrina survivor

The following testimonials make clear some of the problems with how the evacuation was handled by law enforcement.

Leah Hodges presented her story before the Committee, a story that one Member openly stated he could not believe. Having found five seniors abandoned at a nursing home, she and other members of her family transported them out and approached police more than once, but in each case the police refused to assist, one time responding with racial slurs and obscenities. "They cursed [my brother] and threatened to blow his brains out, and the other one said you should have, and my brother walked away." Later they met U.S. Coast Guard search and rescue team members who had been ordered to patrol the survivors with guns but who were furious, not at the survivors, but at their orders, since they wanted to be out rescuing people from the contaminated water. They directed the family to military trucks, to be moved to an evacuation point. Despite being promised immediate evacuation, they were detained under armed guard for several days at the I-10 Causeway junction bridge under conditions she described as inhumane. There were numerous deaths of elderly persons and others who did not receive medical treatment and the environmental conditions were entirely unsanitary. She claimed that whites were consistently bused out first, with blacks being left for days in what she describes as a "concentration camp." Ms. Hodges is collecting stories, and is pursuing the matter as a human rights violations issue. We here present photos showing the unsanitary conditions at the site that match her description of the conditions.



Patricia Thompson testified before the Select Committee that she was invited to evacuate before the storm but would not leave her daughters. During the flood, she gathered her children and grandchildren, fearing to lose them because some could not swim.

> We were told to go to the Superdome, the Convention Center, the interstate bridge for safety. We did this more than once. In fact, we tried them all for every day over a week. We saw buses, helicopters and FEMA trucks, but no one stopped to help us. We never felt so cut off in all our lives… We slept next to dead bodies, we slept on streets at least four times next to human feces and urine. There was garbage everywhere in the city. Panic and fear had taken over. The way we were treated by police was demoralizing and inhuman. We were cursed when we asked for help for our elderly, we had guns aimed at us by the police who are supposed to be there to protect and serve. They made everybody sit on the ground with their hands in the air, even babies… My 5-year-old granddaughter cried and asked her mama if she was doing right. I know the police were scared, but they had no right to treat everyone like hardened criminals.

Mama D asked the Committee why the responders showed up pulling guns on the survivors. "We had to hide. I didn't leave. We had to hide to save people," she said. "Police brutality? We are used to it."

Carla Nelson was a resident of Algiers, a mostly black community in Jefferson Parish. When lights and power were lost at her residence she and her family sought refuge. They learned on the radio that buses were being sent to evacuate people. Following these instructions, they went to the transport site only to be told that the buses there were there to transport residents of St. Bernard's Parish, which is 90% white. They were told to return at 6 p.m. Traveling in the dark, they sought out police who were flashing lights, but were told to return home, and threatened with jail if they did not have identification. They returned to the bus station as previously

instructed but were stopped by a police car and surrounded by police with guns drawn and spotlights shining on their faces. One of the children was a 14 year old with attention deficit hyperactivity disorder (ADHD) and he was "freaking out," as he had never experienced this kind of intimidation. They were sent home, and each day, for several days, they made attempts to reach the bus station only to be turned back by Gretna police with lights and guns drawn. This incident was repeated at least four times. One time they ventured out in the morning hours and were accosted by a robber, and had to run and hide.

Finally, they reached an evacuation point where there were thousands of mostly African-American survivors in long lines. They got in line, realizing that the Gretna Police would not turn back thousands. One police officer apologized, and stated that the Police had been wrong to turn them away before. As they stood in line for two hours in the rain, the Police accosted a young African-American man and put him on the ground, guns to the head. People cried out, pleading with the officer not to not shoot him. One of the officers drew his gun and fired his gun in the air. This made it seem like someone in the line fired a gun; but no one in the line was armed. "Had it not been for a news helicopter overhead taking pictures, we would never have been able to get on the bus, as they were telling us that we could not board the bus because someone had shot the gun."

The buses transported them to the I-10 Causeway. The description of conditions at the Causeway as told by Ms. Nelson, who has never met Ms. Hodges, basically corroborate Ms. Hodges' story. There were thousands of people there, sick and elderly people. "It was like a camp, like some kind of camp, trash and debris up to your knees, feces, pampers, trash…" Ms. Nelson and family were detained there for nine hours. Others had been there for as long as 72 hours. The elderly were not given priority. When they died in their wheelchairs, all the authorities did was push them aside. Dead bodies were lined up on the opposite side of the street in a straight row covered up in yellow sheets. "Had it not been for the people of Calfax, TX and their 10 buses, we wouldn't have been here in Texas to this day. That's how much people were fighting to get on the bus. No consideration, no order, if you didn't make the bus, you'd be there for a few more days. I was determined to get on the bus and I did." Upon reaching Calfax, Texas they were given water and food. After several transfers, they reached Plano, Texas where they were issued housing with vouchers. As of January 2006, she and her family had not been back home to assess the damage.

Kevin Bush was removed from his home in the Lower Ninth Ward after the levee system collapsed and flood waters rose to the rooftops. He is a paraplegic who lives in a wheelchair. He was taken to the Superdome by military helicopter. Once there he was placed in a wheelchair by authorities and left to languish without food, water or medical care for five days. He survived, but due to this neglect, Mr. Bush has had to undergo multiple major surgeries to correct complications arising from the incident. Additional surgeries may become necessary.

Linda Bowie was a resident of the Upper Ninth Ward in New Orleans. In previous hurricanes her three daughters would usually remain behind to care for her mother. Thus before Hurricane Katrina she went with her three grandchildren to her 82 year old mother's house on Canal Street in the Sixth Ward. Her mother was seriously ill. They did not believe that they would need to evacuate. But when the flooding came on August 29th, they decided to try to evacuate, and went

to the I-10 Bridge on Orleans Avenue at Durbanie.[34] There were thousands of people at this bridge, and at other bridges, dehydrating in the hot sun as helicopters flew overhead. When it got dark, they found a ride on a boat to a school that they had been told was an evacuation point. With helicopters everywhere, they expected to be evacuated, but they were not. They had paid the boat driver because they wanted to be sure he came back, which he did, taking them back to her mother's house. For the next several days, they repeated a similar pattern of travels. They disassembled her mother's hospital bed and traveled by boat to the bridge with the bed, her mother and a total of ten family members. But each time they reached the bridge, friends there would say that no one had come to evacuate them. Then she decided to try to reach the Superdome on her own, and found transport with the Fish and Wildlife Service staff.

At the Superdome there were military personnel everywhere, but they were mostly idle. "I am about to have a heart attack because my mother is dying on the bridge." She approached several of them and explained the situation. They gave her water because she was dehydrating. They explained that things would be okay because they had helicopters. So she returned to her mother's house and conveyed this message. The next day, she got into a confrontation with Homeland Security personnel who were blocking off the bridge at the North Claiburne overpass at I-10. Despite the presence of many responders, it did not seem as if anyone was getting any help. Her mother may have had a stroke that day. She tried calling a radio station for help. "After a hundred calls they assured us somebody was coming, helicopters will come. No helicopters came." The next day, they took the bed again the bridge, and once again she confronted the DHS personnel at the top of the bridge. After explaining the urgency of her mother's medical needs, one of them said "Well, let 'em die, that's one less nigger we gotta' worry about." "I got angry and they got angry and this nearly started a riot. We were told 'You niggers gotta' get outta' here or we're gonna' kill all y'all.'" She returned to her group lower down on the bridge and they pushed on to the Superdome.

> We were trying to gather people like Moses to get them to the Dome… On the way we saw all types of boats, trucks and official vehicles going everywhere, but no one stopped to check out our situation with the hospital bed. People were getting angry, starting to pitch things at the trucks. Seemed like everyone in the Guard had video cameras. It got ugly, with people screaming at the Guard.

At a stopping point, a helicopter landed nearby. She approached them and they called up a Humvee, loaded the mattress from the bed, and put her mother inside. One of Linda's sisters had to plead to be able to ride along. The Humvee drove off and she has not seen her mother since. Another of Linda's sisters is diabetic and had not had her medicine, so she was facing a diabetic coma without help. So once again she left her family behind and went to the Superdome. She had to fight her way up to the front to get inside. The first group they encountered very politely offered a police escort to go back and find her sister. Her sister was brought back to the infirmary, but since there was no medicine and there were no doctors:

> All we could do is pray for her. They did give her water, seven bottles, which was generous since there was no water inside or outside the Dome. There was no food. They said we had to go find a place inside. So we did. There was no

> military presence inside of the Dome itself. There was military presence outside for the searches. Down on the ground there could have been police. It was horrible. We were way at the top.

While inside, her sister fell ill, and had to be taken back to the infirmary, where she had a seizure. Meanwhile Linda was able to find electrical power at a cellular phone station to power the device she needed to treat her son's asthma. The next day the buses came. "This was a worst nightmare, because that was where the military had barricades everywhere with thousands trying to get on the buses with no order." Managing to get on one of the buses, they were taken to the Astrodome in Houston. After her experience at the Superdome, Linda refused to go inside. She bought a ticket to Lawrenceville to visit her niece.

In mid-January, Linda and her sister met Governor Blanco. *CNN* covered the meeting where the Governor made a phone call to inquire about their mother's plight. Two days later they were contacted by David Lappin, a FEMA medic who had seen the story on *CNN*, and who said he didn't think she would live, and that all the doctors they visited said she was going to die. She was either taken to LSU Hospital in Baton Rouge, Terrbone General in Homa or, he said, they took her to Louis Armstrong Airport, where there was a place set up for critically ill patients whom the doctors deemed untreatable to let them die peacefully. But the medic doesn't know if she died or not, because when he left her she was still alive. Later both *CNN* and Governor Blanco's office called to tell her that they were doing DNA testing at the morgue. The results will be known soon, but Linda is seeking a forensic scientist for independent verification.

CBS's 60 Minutes interviewed eight people survivors who attempted to cross the Crescent-City Connection Bridge into Gretna and were turned back the Gretna Police. Many of them had been told that there were buses awaiting them for evacuation on the Gretna side of the bridge.

> With that assurance, they joined hundreds of other people who were walking toward the bridge to Gretna. Images taken that day by a *CBS News* crew driving across the bridge show groups of evacuees approaching a line of policemen holding shotguns. The police car was marked Gretna Police. Cathey Golden told *60 Minutes* that when her group reached the police line, they were told there were no buses, and stopped with a shotgun blast.

They sought an explanation. Larry Bradshaw, a white member of the mostly African-American group, says:

> The only two explanations we ever received was, one, 'We're not going to have any Superdomes over here,' and 'This is not New Orleans,' Bradshaw says. 'To me, that was code language or code words for, 'We're not having black people coming into our neighborhood.'[35]

There were about 200 people in the group, which was slow-moving because within the group were individuals in wheelchairs, on crutches or using strollers. After being turned back, the group camped out in the middle of the bridge. But at dusk that night the Gretna Police came back and confiscated their food and water. Survivor Lorrie Beth Slonsky said that a policeman:

> Jumped out of his car with the gun aimed at us, screaming and cursing and yelling at us to get the blank-blank away. And just, just so rabidly angry. And we tried to reason, we tried to talk. And he was putting his gun in the face of young children and families. It said Gretna on the police car.[36]

These testimonials, and those relayed to the Select Committee by Attorney Ishmael Muhammed, reveal a consistent pattern of stranded African-American residents seeking evacuation points that they had been told about, only to be confronted with armed authorities who in many cases threatened them with weapons and used racial slurs. In two cases, we are told that white survivors were given priority status for getting onto transport vehicles being used for evacuation. There is a general pattern of military or police responders being idle and unresponsive to emergency requests, with the notable exceptions of several helpful and caring individuals.

We should also note that these survivors were not totally lacking means. Ms. Nelson had the money to hire a boat. Ms. Bowie had the money to buy a plane ticket.

In two of these cases, the Gretna Police are involved. Gretna Police Sheriff Harry Lee had set a policy back in the 1980s for his officers to observe special scrutiny for any blacks crossing the Crescent-City Connection bridge. The *New Orleans Gambit* quoted him as saying "It's obvious that two young blacks driving a rinky-dinky car in a predominantly white neighborhood, they'll be stopped." When blacks complained in April 2005 that Jefferson Parish police officers had a caricature of a young black man that they used for target practice, Sheriff Lee responded to questions by saying: "I've looked at it, I don't find it offensive, and I have no interest in correcting it."

Such blatant displays of racism are surely unworthy of officers in uniform. One means available to government to curb racial abuse is to establish procedures, because it is when procedures and regulations break down that individual authorities are left to act at their discretion, in which case the discriminatory judgment of those who harbor racial prejudices will come to the fore.

2. FEMA and DHS

FEMA Before 9/11

When the Federal Emergency Management Agency (FEMA) was established in 1979 by President Jimmy Carter's Executive Order 12148, it brought together a range of organizations involved in disaster relief and preparedness, such as the National Weather Service Community Preparedness Program or the National Fire Prevention and Control Administration, and placed them under one umbrella. FEMA took over responsibility for relief and recovery during and after natural disasters from the Department of Housing and Urban Development (HUD). FEMA also took over civil defense operations from the Pentagon. Under President Bill Clinton, the FEMA Director became cabinet-level post tasked specifically with providing relief and recovery oversight, with Clinton naming James Lee Witt as FEMA Director in 1993.

As an independent agency, FEMA had handled such emergencies as the toxic dumping into Love Canal (Niagara Falls, NY) in the 1970s, the partial core breach at the Three Mile Island nuclear reactor in 1978, the Bay Area Earthquake of 1991 and Hurricane Andrew in 1992. In the aftermath of Hurricane Andrew, an interim report by the US Congress called FEMA a "political dumping ground, a turkey farm, if you will, where large numbers of positions exits that can be conveniently and quietly filled by political appointment."[37]

When James Lee Witt took charge of FEMA under Clinton in 1993, he ended political patronage in the organization, and removed unnecessary layers of bureaucracy, and "instilled in the agency a spirit of preparedness, of service to the customer, of willingness to listen to ideas of local and state officials to make the system work better."[38]

The success achieved by 1996 prompted the *Atlanta Journal-Constitution* to remark that "FEMA has developed a sterling reputation for delivering disaster-relief services, a far cry from its abysmal standing before … 1993."[39] During Witt's term of office (April 1993-January 2001), FEMA handled "approximately 348 Presidential declared disaster areas in more than 6,500 counties and in all 50 states and territories. Witt supervised the response to the most costly flood disaster in the nation's history…the most costly earthquake, and a dozen serious hurricanes."[40]

<u>Recommendation: Congress should pass legislation to ban political patronage within Federal agencies; specifically within FEMA and DHS.</u>

Upon entering office in January 2001, President Bush chose Joe Allbaugh as the new man to head FEMA. Allbaugh had run Bush's 2000 election campaign. The first person hired by Allbaugh was his long-time friend Michael DeWayne Brown, whom he appointed as General Counsel. Political patronage at FEMA was back. Unlike Witt, Allbaugh had no disaster management experience. While the same is widely said of Brown, in his testimony before the Select Committee he protested that he *did* have disaster management experience. As an undergraduate, Brown had served as assistant to the city manager of Edmond, Oklahoma, a 68,000 strong suburb of Oklahoma City where he worked with the emergency operations center to draft the emergency operation plan. Then from 1989 to 2001 Brown served as Judges and

Stewards Commissioner of the International Arabian Horse Association (IAHA). He resigned in the face of multiple lawsuits against the IAHA.[41]

Incorporation into DHS

In June of 2002, FEMA Director Joe Allbaugh resigned immediately upon being told that FEMA was about to be incorporated as one of 22 agencies within the new super-agency, the Department of Homeland Security (DHS), which was being created in response to the terrorist attacks of September 11, 2001. Brown was promoted to—or "slipped through"[42] to become—Undersecretary for Emergency Preparedness in charge of FEMA in January 2003. Although the Homeland Security Act of 2002 tasked FEMA with developing a National Response Plan, FEMA was to be stripped of its control preparedness grants totaling billions of dollars. Brown resisted, and in the ensuing years became a kind of antihero taking up the concerns and "huge angst" of the experienced members of his staff who worried that the new focus on terrorism inside DHS would leave their expertise underutilized. His resistance was not appreciated either within DHS or at the White House. The plan for FEMA under DHS Secretary Tom Ridge was to absorb what remained of FEMA into DHS's new Emergency and Response Directorate, eliminating the name FEMA entirely.[43] Brown managed to preserve FEMA's name at least. But over his objections that FEMA already had one, DHS built its own emergency operations command center. "Everybody wants a toy," Brown grumbled, "fancy screens and all that stuff."[44]

Morale at FEMA was plummeting, and experienced veterans began to depart from FEMA in droves. FEMA, with a staff of 2,500, was now tasked with preparing for disaster relief in the wake of terrorist attacks and/or the use of weapons of mass destruction, on top of natural disasters. As a series of tornadoes ripped through the Midwest in May of 2003, FEMA personnel who would otherwise have responded were instead preoccupied while being engaged in anti-terror, anti-WMD training exercises.[45]

Ridge had earlier seized control of the Justice Department's 150-man operation known as the Office of Domestic Preparedness (OPD). Despite plans to merge ODP into FEMA, Ridge decided instead to move it into his office. Then he gave ODP control over the preparedness grants that had formerly been controlled by FEMA.

> Ridge and his aides now believed that FEMA should be a response and recovery agency, not a preparedness agency. In an age of terrorism, they argued, preparedness needed a law enforcement component, to prevent and protect as well as get ready to respond.[46]

On September 15, 2003, Brown fired off an angry memo to Ridge, protesting that subsuming FEMA into DHS was ruining morale. He voiced the key concern of his staff, which was that Ridge's plan would separate preparedness from response, disrupting key relationships with first responders and leading to "an ineffective and uncoordinated response" to another major disaster.[47] In retrospect, these words make Brown look seem like a prophet that a hapless horse judge.

Brown's memo only did more damage. Ridge now reassigned the writing of the National Response Plan (NRP) to Admiral James M. Loy of the Coast Guard, who was also in charge of the Transportation Security Administration. Once completed, the NRP sparked an uproar within FEMA, and "among local, state and rival federal agencies." To FEMA officials it was awful; simplistic and top-down. According to FEMA's union chief: "'The gist was: We'll give orders and everybody will jump and say, Sir, yes, sir!'"[48] FEMA, which previously reported directly to the President, would now report to a "principal federal officer" under DHS. "'It was just another dad-gummed layer of bureaucracy,' Brown said."[49]

Indeed, the NRP actually involves *five* layers of bureaucracy. The following diagram, titled "EOCs [Emergency Operations Centers] / Coordination Centers,"[50] shows the levels of multi-agency centers for information sharing under the NPR. What is of concern is the number of offices information would theoretically have to travel through to get DHS in touch with a Local Center.

Hurricane Katrina was the first catastrophic event to be declared an "Incident of National Significance" under the *National Response Plan* (NRP). The NRP was designed using Incident Command System (ICS) management concepts.[51] ICS is a highly effective approach for localized emergencies that can spread rapidly, such as forest fires or epidemics, because it allows for rapid expansion or contraction of command structures. However, an incident with the capacity to wipe out infrastructure, including communications networks and local operations centers, as Hurricane Katrina did, can create a situation where over-reliance on local ops centers that may be compromised or may no longer exist can slow the process of gaining situational awareness at the highest levels of command. When ICS management concepts are clearly understood at all levels, ICS should be able to cope, but when they are not understood, the system becomes ineffective.

This appears to have played a role in the delayed response to Katrina, as the Secretary of DHS did not appear to grasp his role as the primary Incident Commander of the first ever Incident of National Significance, since he delegated that role to the head of the overstretched and under-resourced FEMA, rather than immediately deploying the far greater assets under his own control.

Similarly, because the NRP operates on principles based more in theory than upon past precedent, the challenge of integrating State and Federal forces is made unnecessarily problematic. This was evidenced in Governor Blanco's rejection of a White House proposal to place State and Federal forces under a single "dual status commander." This incident will be treated in detail below. Here, we point to that episode as an example of what happens when one side (the White House) is seeking to apply, incorrectly, abstract ICS concepts whilst the other side (the Governor) is falling back upon long-established precedents that are not sufficiently addressed within the abstract model of the NRP. The White House was applying ICS concepts

incorrectly because it sought to create a two "mutually exclusive chains of command," which is precisely what ICS practices are meant to prevent.

Recommendation: The National Response Plan should either be overhauled or scrapped. A new plan should be developed that includes: 1) unambiguous command structures for military responders; 2) crystal clear clarification regarding the integration of the work of state and federal armed forces during an emergency to maximize the ability to deploy military assets in a pro-active manner; 3) pre-set standard operating procedures for non-military agencies operating in a crisis detailing what operations they can and should initiate without waiting for marching orders from a higher authority; 4) an integrated communications plan that puts all responders on the same page from the get-go, using Interoperable Communications technology.

Recommendation: The National Response Plan is color blind, and any future such national emergency response plans must include sensitivity training for *both* military and non-military responders so that responders are aware in advance of the specific needs and leadership patterns in communities of color.

Recommendation: Emergency response agencies like FEMA should offer diversity training to their employees, and establish direct working relationships with leadership figures in minority communities living in disaster prone areas such as flood planes so that those relationships are forged and ready to call upon *prior to* the emergency.

Brown's warnings that FEMA was falling apart were echoed in March of 2004 by James Lee Witt, who testified before Congress that "the ability of our nation to prepare and respond to disasters had been sharply eroded … I hear from emergency managers, local and state leaders and first-responders nearly every day that the FEMA they knew and worked well with has now disappeared." Aside from the issue of cronyism, and the lack of cabinet-level status for FEMA and disaster relief, two additional problems affected FEMA's ability to be an effective responder. The first of these was money. FEMA's budget was cut by nearly $80 million under the Bush Administration, and moreover "in 2005, nearly three of every four grant dollars from DHS to first responders went to programs exclusively focused on terrorism."[52] One expert calculates the ratio of DHS projects within focused on terrorism and WMD to those focused on hurricanes and natural disasters at over 28:1, commenting: "Surely as government bureaucrats write more documents and as commissions get underway in Washington, someone must recognize the corrosive effect of focusing on terrorism and WMD to the exclusion of more plausible, frequent, and frankly, more realistic scenarios."[53]

Upon the succession of Michael Chertoff, a man who is credited with authoring the Patriot Act, to replace Ridge as DHS Secretary on February 15, 2005, Brown bombarded Chertoff with memos seeking to undo what damage (in his view) Ridge had done to FEMA. "'I don't box in very easily,'" was Chertoff's cool response.[54] Chertoff proceeded with plans to strip FEMA of its preparedness mission. Chertoff:

> agreed with Brown's bureaucratic rivals that FEMA was too busy responding to daily disasters to focus on the long-term planning needed to prepare for a major catastrophe … Brown sent one last-ditch memo to Chertoff's deputy, warning that

> under the new plan, 'FEMA is doomed to failure and loss of mission.' But his appeal was rejected … On Sunday, Aug. 28, Brown was supposed to be finalizing his resignation letter. Instead he was on his way to Louisiana for Katrina and chuckling into his BlackBerry.[55]

At least Brown was taking the initiative, one day early.

Recommendation: Congress should re-establish FEMA as an independent Federal agency, removing it from DHS; but give housing oversight back to HUD.

Domestic Unpreparedness

"So far, all we've done is shovel money out the door to meet the humanitarian needs.
But henceforth we've got to be very careful how we spend the money,
and that means we're going to need a plan and somebody in charge."[56]
~ Sen. Charles E. Grassley, Chairman of the Senate Finance Committee

"With all due respect to the President, things are not going to bubble up from the bottom.
There has to be some leadership here."[57]
~ Jack Kemp, former HUD Secretary under Bush Sr.

"The director…of the National Hurricane Center said this was the big one,
but when this happened…Bush is in Texas, Card is in Maine,
the vice president is fly-fishing. I mean, who's in charge here?" [58]
—Rep. Tom Davis, Chairman of the Select Committee

Indeed, Mr. Chairman, so nonchalant were top officials in the aftermath of Katrina that they did not even break from their vacations to attend to the disaster. While Bush, Brown and Chertoff had all been briefed on August 28th of the possibility of a levee failure,[59] Secretary Chertoff made a trip to Atlanta to visit the CDC to discuss avian flu on the 29th, the day of landfall, and did not become fully aware of the levee failures until mid-day on August 30th, some 30 hours after the initial breach. Chertoff did not declare Katrina an Incident of National Significance until August 30th, 36 hours after landfall, when he also designated Brown "principal federal officer." It must be asked why this was not called before the storm struck and whether it contributed to the delay in the response.[60]

Secretary of Defense Rumsfeld was busy taking in a baseball game in San Diego on the night of the 29th, in anticipation of Bush's visit to deliver a speech on the war in Iraq the next day. The President returned to Crawford Texas that night (August 30th). The same President who had flown from Crawford to Washington to intervene in Terri Shiavo's medical case did not visit the devastated areas until his fly-over on September 2nd, the fifth day after landfall, delivering the message "I am satisfied with the response. I am not satisfied with all the results" at a press

conference. The next day, apparently forgetting what he had been told at the August 28th briefing, Bush stated: "I don't think anybody anticipated the breach of the levees."[61]

For her part, Secretary of State Rice was still taking in the sites on her New York City vacation two days after the storm when she took in a Broadway show, with some audience members booing her when the lights went up. She was reportedly accosted by angry citizens again the next day who found her buying thousands of dollars' worth of shoes. "A fellow shopper shouted, 'How dare you shop for shoes while thousands are dying and homeless!'"[62]

It certainly seems as if the folks over there at the White House have trouble reading:

1. "No one could have imagined them taking a plane, slamming it into the Pentagon… into the World Trade Center, using planes as a missile."
   –Condoleezza Rice, testifying before the 9/11 Commission, April 8, 2004.

   There were multiple and consistent warnings that Osama bin Laden was planning a major terrorist attack against the United States on or around September 11th, 2001 and that New York and Washington were likely targets. There had been warnings of threats to use planes as weapons since 1976. Rice actually joined President Bush in Genoa for the G-8 Summit in July of 2001 when Islamic terror groups had threatened to crash an airliner into the summit, prompting the closure of airspace over Genoa during the event.[63]

2. "Simply stated, there is no doubt that Saddam Hussein now has weapons of mass destruction."
   –Vice President Dick Cheney, August 26, 2002

   Former UN weapons inspectors accurately foretold that they had destroyed 95% and more of Iraq's WMD. US forces occupying Iraq for nearly three years now have not uncovered any conclusive evidence that Iraq continued to possess WMD in 2002.

3. "I don't think anybody anticipated the breach of the levees."
   –President Bush, September 2, 2005[64]

   There had been consistent warnings about the danger of a category 4 or 5 hurricane hitting New Orleans and flooding New Orleans since 1998,[65] and as noted above Bush, Brown and Chertoff were specifically briefed about this on August 28 2005.

The response to Hurricane Katrina by both DHS and the White House has been described as "staggeringly ineffectual" by one commentator writing days later, who pointed out that DHS Director Michael Chertoff seemed proud that only 2,800 National Guardsmen had reached New Orleans 72 hours after landfall, promising that the Army was "building capacity." DHS demonstrated that "it could organize an impressive press conference in Washington … But on the ground in Louisiana, where it counts … DHS is turning out to be the sum of its inefficient

parts. The department looks like what its biggest critics predicted: a new level of bureaucracy grafted onto a collection of largely ineffectual under-agencies."[66]

DHS and FEMA unpreparedness and ineptness in the face of the hurricane-flood disaster was also apparent in the face of offers of international assistance. More than 90 countries and international organizations offered assistance in the first week following the disaster. But nearly all of these offers were "mired … in bureaucratic entanglements." Although the State Department announced that no offers of aid were being turned away, a Swedish transport at the ready with water purification systems and a cellular network sat waiting for take-off orders for four days. A Canadian search-and-rescue team sat waiting for directions.[67] Actually, not all offers of aid were accepted. When Cuba volunteered a medical brigade with disaster relief experience in post-tsunami Sri Lanka, White House spokesman Scott McClellan answered with the message that Fidel Castro "needs to offer the people of Cuba their freedom." But the team members themselves continued to stand at the ready, and team member Dr. Delvis Marta Fernandez, a veteran hurricane responder at age 32, told reporters: "Let's get going. This is not political. This is a humanitarian emergency. People are dying and they need our help."[68]

<u>Recommendation: Congress should take international politics out of disaster relief efforts by establishing a policy that no legitimate offers of foreign assistance will be refused.</u>

Warnings of Levee Failure Since at Least 1998

The dramatic testimony of Mama D (Dyan French Cole) before the Select Committee concerning the failure of the levees attracted nationwide attention. She testified that the Seventeenth Street Canal was within a mile of her home and when the levee broke she heard two huge explosions. Reacting to this, major networks ran some rather patronizing stories on how a people who have suffered generations of oppression can develop a certain psychology of paranoia. But Mama D was not the only one who heard the explosions, many residents did.

> One such individual is Mr. Joe Edwards, Jr. who was interviewed by *ABC News* anchor and correspondent David Muir. He tells Mr. Muir, 'I heard something go boom! ...I know it happened. They blew it.' In addition to local New Orleans residents, like Mr. Edwards, Eugene Robinson of The Washington Post said on the September 18th edition of *Meet The Press*, 'I was stunned in New Orleans at how many black New Orleanians would tell me with real conviction that somehow the levee breaks had been engineered in order to save the French Quarter and the Garden District at the expense of the Lower Ninth Ward, which is almost all black...But these are not wild-eyed people. These are reasonable, sober people who really believe that.'

Commenting, author Cedric Muhammad's call for openness of mind on this issue:

> I think any reasonable and rational person with an open mind – not bound by ideology – would have to conclude that there is justification and various forms of evidence for considering the possibility that the levees were breached and the

> Ninth Ward flooded for reasons other than that provided by the mainstream media and local, state and federal government including the Army Corps of Engineers.[69]

Moreover, as Mama D told MSNBC's Tucker Carlson, there were intentional levee breaches in 1927 and in the aftermath of Hurricane Betsy in 1965. In other words, New Orleans residents have historical precedents of intentional levee breaching to point to.

During the Great Mississippi Flood of 1927, which began on April 16th of that year, communities on both sides of the Mississippi River knew that their community would be spared if the other side broke. Levee patrols with shoot-to-kill orders were actually set up by both sides to catch any intruders who might be trying to dynamite their side of the levee. This was serious business. In Greenville, Washington County, Mississippi, the flood overtook the town, flooding an area 60 by 90 miles wide. Boaters rescued thousands of mostly poor African-American persons from rooftops and trees. They were deposited at the crown of the river levee. By April 25th:

> The situation in Greenville is dire. Thirteen thousand African Americans are stranded on the levee with nothing but blankets and makeshift tents for shelter. There is no food for them. The city's water supply is contaminated. The railway has been washed away, and sanitation is non-existent. An outbreak of cholera or typhoid is imminent.[70]

Local cotton magnate LeRoy Percy appointed his son Will to head the relief effort. But when Will arranged for the evacuation of the stranded survivors, the local whites feared that if the blacks were rescued, they wouldn't work the crops come harvest time. The steamboats that came to rescue the survivors removed only 33 whites. Will later tried to save face with the blacks who were stranded by employing them with the Red Cross in its relief effort.

> Red Cross relief provisions arrive in Greenville, but the best provisions go to the whites in town. Only African Americans wearing tags around their necks marked 'laborer' receive rations. National Guard is called in to patrol the refugee camps in Greenville. Word filters out of the camps that guardsmen are robbing, assaulting, raping and even murdering African Americans held on the levee.[71]

Later that summer African Americans began leaving, and over half left within the year. LeRoy Percy's cotton empire fell into ruin.

During the flood, as the waters moved south along the Mississippi, the decision was made to save the downtown businesses of New Orleans by blowing a 1,500-foot break in the Poydras levee, flooding St. Bernard and Placquemines Parishes. According to one expert, race did not play a factor in the decision to blow the Poydras levee, and in fact the decision was made following advice given five years earlier by the Army Corps of Engineers that if the city was ever seriously threatened, the levee should be blown.[72]

Historical memory has a tendency to turn events into legend. Since the flood of 1927 was a turning point for many black families in the south, the bitterness of those experiences are no doubt still associated with the flood, and the flood as we know is associated with the blowing of

the levees. For the mostly white residents of St. Bernard and Placquemines Parishes who were intentionally flooded, the flood of 1927 was all about the blowing of the levees.

Hurricane Betsy in 1965 overtopped levees and led to the breaching of the Florida Avenue Levee, leading in turn to the flooding of the Lower Ninth Ward and neighboring Chalmette. While the Florida Avenue Levee was initially breached by the storm, it is our understanding that the Corps later intentionally breached some levee points in attempting to manage the drainage process.

Hurricane Katrina surely conjured up the haunting memories of these two events. As in the aftermath of Katrina, residents of the Lower Ninth died in their attics as waters rose above the eaves.

Mama D told the Select Committee said a former military official happened to be in the house at the same time and that he told her that what he had heard were two bombs. Our office has received numerous reports of others who claim to have heard explosions that sounded like bombs. We also were told that two young men reported being asked to step down from the levees so that they could be dynamited, but we were unable to get in contact with them. While one engineer we spoke with stated he could not explain how the levees failed, others we spoke to said that the intensity of the storm surge could certainly overtop the levees and possibly breach them. When asked if they could explain how all the four or more breaches occurred almost at the same time, we were told that uniformity of water pressure across the levee system could have reached critical levels at around the same time for all the levees that breached.

Dr. Iver Van Heerden[73] at the LSU Hurricane Center told us he was out at the levee breaches within 24 hours of landfall, taking samples and measurements. He found no evidence of any explosives. According to Van Heerden, researchers from the four separate investigations into the levee breaches that are mentioned in the Select Committee Report have met and have privately concluded that the reason the levees were breached was not due to poor maintenance but poor construction.[74] Specifically, the loose topsoil was not taken into consideration. Thus water was able at several of the sites to push out the loose topsoil under the levees, causing pressure bursts and breaching them starting from underneath. At one site the flood walls slid 45 feet. At each of the sites where there were levee breaches, the noise of the breach would have sounded like a huge explosion.

It is Minister Louis Farrakhan who may have initiated the controversy about intentional breaches. He noted that craters were seen at the breach sites where the walls had been. [75] The cratering he witnessed could have been caused by the water pushing out the earth underneath the levee wall before breaching the entire wall.

Probably the most suspicious fact about the Katrina levee breaches is that their water flow was aimed directly at African American communities (Orleans Parish at the 17th Street Canal; the Lower Ninth Ward at the Industrial Canal). As the Congressional Delegation Tour bus stopped on the bridge over the 17th Street Canal just up from the breach, we could see that the Jefferson Parish side of the canal, the side that didn't breach, had a built up earthen foundation with only a few feet of wall exposed. But on the Orleans Parish side (see photo, right), there was no earthen foundation surrounding the wall, which stood over 12 feet high from the ground. The thickness of the wall was only 11 inches. Each levee is maintained by the local parish government. The relative wealth of Jefferson Parish, a mostly white community, would have enabled it to invest in a much safer structure than what the Orleans Parish could afford. This would explain why the Orleans Parish side failed first.

One thing is certain about the levee breaches: there was amble discussion of the possibility of a levee failure prior to Katrina. Since 1998, the *Times Picayune* has run articles expressing concern about the possibility of a levee failure:

- October 4, 1998:[76] "[National Hurricane Center Director Jerry Jarrell] has two recurring nightmares of the worst-case hurricane that could hit the United States, and New Orleans is central to both. The first is a category 4 or 5 storm with winds as high as 150 mph that follows a path very similar to [Hurricane] Georges. After slamming into island after island in the Caribbean, creating havoc and killing hundreds of people, it moves northwest and cuts across the Miami metropolitan area, leaving damage similar to that caused by Hurricane Andrew in 1992. After clobbering Tampa Bay on a trek across Florida, it enters the Gulf, where it reintensifies before assailing New Orleans with a storm surge that overwhelms the city's levee system."

- June 1, 1999:[77] "New Orleans Office of Emergency Preparedness Director Frank Hijuelos said city residents should try to evacuate in advance of the first official evacuation requests, if they have the ability to leave and a place to go. He said that recommendation is based in part on computer modeling by Louisiana State University engineering professor Joe Suhayda and federal agencies that indicates a slow-moving Category 3, and Category 4 and 5 hurricanes cutting northwest over the metropolitan area will push a wall of water before it that will overtop the area's hurricane protection levees."

- June 2, 1999:[78] "The state's official hurricane emergency plan calls for the Superdome to be a staging area for National Guard and other emergency personnel in the hours after evacuation routes have been shut down and before a hurricane hits. Residents with special needs, such as medical patients with no transportation, are to be moved to the Dome and, if possible, evacuated by air or other means from the city. Once a hurricane is about to hit, the Superdome would be transformed into a 'refuge of last resort,' a bare-bones area where people caught on the street downtown could survive until the storm's fury subsided and they could be evacuated, Purpera said… New Orleans Office of Emergency Preparedness Director Frank Hijuelos said such an assumption by the public could be dangerous. If a major hurricane does hit, Hijuelos said, the accompanying storm

surge could easily top hurricane protection levees, flooding streets with 17 feet of water or more. It could take weeks to remove the water, he said."

- June 23-27, 2002:[79] In a five part-series, the *Times-Picayune* offered its readers a comprehensive look at the dangers faced by the city. "It's only a matter of time before South Louisiana takes a direct hit from a major hurricane. Billions have been spent to protect us, but we grow more vulnerable every day."

- July 20, 2004: "Walt Zileski, warning coordination meteorologist for the National Weather Service's Southern Region headquarters in Forth Worth, Texas, said Hurricane Pam was fashioned after Hurricane Georges, which in 1998 turned east only hours before it would have followed for Pam… The water would be high enough in parts of New Orleans to top 17-foot levees, including some along Lake Pontchartrain and the Mississippi River-Gulf Outlet, Zileski said. Some of the water pushed into Lake Pontchartrain would flow through a gap in the hurricane levee in St. Charles Parish, flow across land to the Mississippi River levee and be funneled south into Jefferson and Orleans Parishes."

Additionally, in early 2001, FEMA had published its own report, ranking the possibility of a major hurricane hitting New Orleans as one of the three most likely catastrophes facing the country, alongside a terrorist attack in New York City and a major earthquake in San Francisco.[80] If President Bush did was not aware of the levee issue in New Orleans before he was briefed on the subject on August 28, 2005, somebody at the White House was not doing their job.

Not all Hurricanes are Treated Equal

We have seen above how FEMA's funding was cut, its staff demoralized and its mission called into question. Yet even in the midst of its being absorbed into DHS, FEMA did continue to have the ability to respond quickly and efficiently to a hurricane. Little more than a year prior to Katrina, Hurricane Charley crossed Florida from West to East on August 12, 2004. By Noon of August 16th, less than 4 days since landfall and 24 hours after the Hurricane dissipated off of Cape Cod, the White House website reported that the following resources had been mobilized:

- One hundred trucks of water, 280 trucks of ice, and 900,000 Meals-Ready-to-Eat for Jacksonville.

- 7,000 cases of food for Winter Haven.

- Urban Search and Rescue Teams and Disaster Medical Assistance Teams (DMATs) on the ground and setting up comfort stations, coordinating with FEMA community relations personnel.

- 4,100 National Guard troops in Florida, as well as thousands in nearby states.

- Tarps provided by the Army Corps of Engineers for "tens of thousands of owners of homes and buildings that have seen damage to their roofs."

- 300 medical personnel to be on standby.

- 1,000 additional community relations personnel deployed to Atlanta "for training and further assignment in Florida."

Additionally, survivors were notified that:

- "FEMA is coordinating with the Department of Energy and the state to ensure that necessary fuel supplies can be distributed throughout the state, with a special focus on hospitals and other emergency facilities that are running on generators.

- "FEMA is coordinating public information messages with Georgia, Tennessee, Alabama, and North Carolina so that evacuees from Florida can be informed when it is safe to return."

By August 15th, the White House web site boasted the following:

- "Registering approximately 136,000 assistance applicants;

- "Approving over 13,500 applications for more than $59 million in housing assistance;

- "Establishing 12 disaster recovery centers, which have assisted nearly 19,000 disaster victims;

- "Deploying medical teams that have seen nearly 3,000 patients;

- "Disbursing 1.2 million liters of water, 8.1 million pounds of ice, and 2 million meals and snacks;

- "Delivering over 20,000 rolls of plastic sheeting and nearly 170 generators; and

- "Treating more than 2,900 individuals through FEMA Disaster Medical Assistance Teams, supporting damaged hospitals"

FEMA appears to have responded in a timely and effective manner three months before an election in Florida, a state governed by Jeb Bush, the President's brother. ***"Disaster relief checks were in the mail within a week."***[81] Additionally, after Hurricane Frances, FEMA was "very generous… especially in Miami-Dade [County] giving people money for…broken televisions, washers, driers, whole new wardrobes and rooms full of clothing… [and rooms] full of furniture."[82]

Let us contrast this with FEMA's dismal performance in the aftermath of Hurricane Katrina. Two days after landfall:

- White House pressure on FEMA to set up an interagency crisis management group in the days leading up to the storm were chided by FEMA staff. One staffer wrote to Brown: "Let them play their reindeer games as long as they are not turning around and tasking us with their stupid questions. None of them have a clue about emergency management."[83]

- FEMA regional director Marty Bahamonde wrote in an office e-mail: "The leadership from top down in our agency is unprepared and out of touch… I am horrified at some of the cluelessness and self concern that persists…"[84]

Three days after landfall:

- Secretary Chertoff told *NPR* that he had "'not heard a report of thousands of people in the Convention Center who don't have food and water,' even though every television viewer in the country had been hearing of those 25,000 stranded refugees for at least a day."[85]

Five days after landfall:

- FEMA Director Michael Brown notified an aide by e-mail that "no action from us" to use planes made available by airlines to evacuate victims had been made. But 30 minutes later he was informed that in fact FEMA had been "flying planes all afternoon and evening." Brown also mused that he wished Jeb Bush were Governor of Louisiana.[86]

- 9 stockpiles of fire-and-rescue equipment that had been "strategically placed around the country to be used in the event of a catastrophe" had still not been pressed into service.[87]

Additionally, FEMA's contracting was in disarray:

- FEMA had no plan for cleaning up the bodies, which after the storm were left decomposing in homes and on the streets. One week after the storm, FEMA asked Texas firm Kenyon International Emergency Services, Inc. to deliver mobile morgues (the morgue in New Orleans was flooded). But after several days of waiting, Kenyon decided to forget FEMA and signed a contract directly with the state of Louisiana.[88]

- FEMA ordered 1.6 million cases of meals-ready-to-eat (MREs) from the Pentagon, but demand rose to 2 million, but the Pentagon cut them off at 1.6: "We're happy that we're able to help the folks, [but]…we have to feed our troops too," said a Pentagon spokesperson.[89]

With FEMA officials themselves admitting that FEMA was nowhere near ready for Hurricane Katrina, and given Brown's unsuccessful attempts to protect FEMA's integrity as the authority on natural disaster response within DHS, FEMA was set up to fail when the big one hit. Nevertheless, we cannot ignore the disparities between the lavish treatment by FEMA of survivors of hurricanes Charley and Frances. FEMA, after all, speaks to a higher power, and that higher power was not only slow on the uptake, but slow on the delivery as well. If the nightmare

were over for Katrina survivors, this would be a matter for policy debate. But the nightmare for the survivors continues.

"Duped" by FEMA: The Housing Fiasco

Many survivors who were aware of what was being offered and what assistance other survivors were receiving from FEMA, found themselves caught up in a second nightmare: the bureaucratic red tape that in many cases made it extremely difficult or even impossible to get assistance.

Jan Campbell[90] is a former FEMA employee who worked out of FEMA's operations center in Hyattsville, Maryland. She worked the phones on FEMA's regional intake and helpline. With hundreds of experienced employees having left FEMA over previous years, after Katrina hit FEMA was desperate to hire workers who could handle the phones for hundreds of thousands of survivors' calls. They were offered $15 per hour. "If you were alive they hired you," says Campbell. People were hired who later flunked criminal background checks. Well over a hundred in the Hyattsville office alone had already been on the job when they were fired over background checks. During their employment, these individuals had access to social security numbers. Training, which was supposed to take 10 days, was trimmed to 8 hours. Every day employees were threatened with firing. Most of the employees were African-American and many were single mothers.

For survivors who weren't in a hotel or in a shelter but not in their own home, the policy stated that they were entitled to an initial $2,000. But thousands of survivors could not access this entitlement because of *duplicate registrations*. Many of the survivors were low income minority persons from extended families, but those families had been split up in the mass evacuation into diaspora. The first thing entered into the computer was the person's telephone number. But what happened when a family of 2 or 3 or more adults were separated? The first to call in would typically receive the $2,000 of assistance, but the second or third to call in would give the same telephone number. They found themselves in "dupe status." Now they were stranded. The Red Cross might offer $300 and other services, but this would not last for long. Next, this survivor goes to apply for rental assistance. FEMA can't help them, because they're in dupe status.

There were other ways for survivors to find themselves in dupe status. The application process was available on the internet. But as often happens with online forms, many survivors were uncertain whether or not their form had been accepted after pressing the send button. So they reloaded the page and hit send a second time. Now they had unwittingly submitted a second application, and this landed them into dupe status.

Over 70,000 applicants landed in dupe status, and over half of these were New Orleans residents. FEMA management discouraged those on the phone from telling survivors why they were not eligible for checks. Five months after landfall, FEMA was still cleaning these applications up. But since the $2,000 assistance program was terminated in mid Fall of 2005, virtually anyone in dupe status did not receive the check unless their case was solved before the deadline.

Survivors were asked to provide proof of the residence they were living in at the time the hurricane hit. This required a lot of paperwork, especially for people who were far away from their residences. Sixty per cent of residents in the Lower Ninth Ward were illiterate, but no steps were taken to meet their special needs. FEMA employees had no social service background. Campbell's boss was a former warehouse worker. FEMA used satellite imaging to identify homes, but with so many homes destroyed they had to turn to other methods of verification such as checking phone books. If residences could not be verified, then the computer would display the words: "unable to verify," holding the application up. Survivors were not informed if there was a problem, and if they called in, staff could tell them about it, but there was no outreach so if they did not call in they did not know there was a problem. In November, a batch of faxes was lost in the mail system. But management instructed operators not to explain to survivors why their application had not yet been received or processed, but only to say: "Your case is still pending," and to ask them to send it back in.

A climate of suspicion pervaded the office. If someone called in and reported that they were unemployed, the computer showed: "refused to give income," which basically meant that FEMA thinks you are a crook. Office colleagues would hang up the phone proudly declaring "busted another crook." Applicants in the "refused to give income" category were sent to the Small Business Administration (SBA) for an SBA Loan, which requires filling out a 6 page form. Many elderly and disabled persons who did not have an employer found themselves in this situation, and were basically getting cheated out of any assistance. There were "so many ways to put people up a creek."

One man from East New Orleans had helped rescue 800 survivors, but then found himself forced to get on a plane to Tucson. He had no money. He could not get home. Since he could not prove that he lived in New Orleans, he then got hung up in asking for assistance when he was asked to provide proof of residency.

Phone operators were instructed not to spend more than 15 minutes on each call with the "customer." Staff were basically being told: "be quick, answer just what you're asked," and do not go over peoples' applications to be sure they get what they're entitled to. Because 15 minutes was often not enough to help someone solve a problem, unless you took time to go over the application with them, or to ask a Special Matters Expert (SME) for specific assistance, they were unlikely to receive everything to which they were legally entitled.

When rental assistance was obtained, survivors were told that it was good for 18 months. What they often weren't told was that they had to re-apply every 3 months. After the first three months, if they missed a rent payment, many landlords would turn them out in six weeks or less. Many checks were sent to the wrong address. Survivors had to apply for FEMA to reissue the check. ***But FEMA can take up to nine months to reissue a check.***

Finally, people from New Orleans were the last to get trailers. 40,000 or more were needed, but only several thousands were made available. Every day, FEMA phone operators were instructed not to tell anybody about trailers. There was a systemic bias. There were 41,000 trailers along the Mississippi Coast and calls came in all the time from Mississippi residents asking for instructions on how to hook up their trailers. But Louisiana only got 1,700 trailers. [By the end

of January, according to the *Washington Post*, Mississippi had 33,378 trailers, meeting 89% of the demand, where as Louisiana had only 37% of its trailer needs met.][91] And there were memos all the time giving phone numbers that survivors of Hurricane Rita in Texas, a hurricane that came a month after Katrina, could call to get a trailer, or get service for their trailer. The staff were grumbling among themselves: "How 'come these people in Texas are getting Cadillac treatment?"

"Most of the survivors were suffering from post-traumatic stress disorder (PTSD). I tried to help them when I could. We got yelled at routinely for 'having too much compassion… You're not here to do casework,' we were told." In November, Campbell raised a fuss at a meeting when survivors were about to be evicted from hotels. Staff phones had a button to transfer callers facing eviction to another program. But three quarters of the transfers did not go through, and staff were not provided a number to give directly to the callers who called back in. A day later, the number was provided to staff, but during that 24 hours most transferred calls got cut off.

One day, 20 employees passed out cold on two separate floors of the Hyattsville office. This event got coverage by *CNN*. The official explanation was that a gas can with a paper rag on it on the roof had caused the incident. Campbell didn't buy it. Campbell's co-workers told her she had gotten herself into trouble when she called the Hyattsville Fire Department to report that cartloads of paper were blocking exit doors in the building, which was against the fire code. She was terminated in early December because she "talked too long on the phone." She had shown too much compassion.

Ms. Campbell's story gives us a peek at the chaos inside of unhappy FEMA. This was not an organization that stood ready to deal with a hurricane of the magnitude of Katrina. This meant that as new policy was needed to cope, it had to be made on the run. That opened the door to all kinds of problems and irregularities, such as out of control spending with credit cards to purchase sleeping bags ($60,000 for 3,000); flip-flops ($223,000 worth in one purchase); and golf cart rentals at $1500 per month.[92] As well, FEMA trailers are said to be priced at up to $120,000 each in New Orleans, which is more than it would take to renovate an average house. One FEMA employee has been charged with looting from a client survivor.[93] Two others were indicted in scheme where they were taking kickbacks from food services contractors.[94]

But the clearest sign of chaos within FEMA has been its rolling deadline for evictions for tens of thousands of survivors who have been living in FEMA-subsidized hotels: from December 15th, to January 7th, to February 7th, and now to March 1st. The expensive hotel scheme itself was a stop-gap measure. But here again, we need to ask why the President or the Secretary of DHS did not step in to take charge. There have been options on the table, such as opening tens of thousands of existing dry housing units in New Orleans to survivors. After five months, FEMA finally announced at the end of January that it was in fact setting up a pilot program to relocate 20,000 survivors into government sponsored, rent-free apartments in New Orleans for 18 months (starting from August 29th, the day of landfall).[95] This was welcome news, but will FEMA's promise hold good? A FEMA official is said to have told the Subcommittee on Housing that the hotel deadline would be lifted altogether, but this did not turn out to be true. William Lokey, a field director for FEMA, told the Select Committee on December 14th that all survivors would be

given return tickets to get back to their Gulf Coast homes, but FEMA has published no explicit policy and survivors we've talked to say they cannot access this program.

The other major option open to the government is to provide section 8 housing vouchers for survivors so that they can get established, find work, and start to rebuild their lives. Local and state government along the Gulf Coast needs to re-establish a tax base, but this will be very hard to do if residents don't return.

Tens of thousands of mostly African-American survivors face eviction on March 1st with no further promises of assistance.

3. KATRINA AND THE CRIMINAL JUSTICE SYSTM

Law Enforcement

Governor Blanco's "shoot to kill" order was an extreme measure. Many survivors have expressed their bewilderment or dismay at being subject to curfews under armed patrols in the wake of the hurricane. Had there not been a failure of planning and coordination prior to the storm, would this extreme step have been taken? As suggested above, had disaster planning *anticipated* looting, it may have been possible for responding law enforcement officials, including National Guard, to be on the ground to ensure law and order sooner. But the problem in New Orleans goes deeper than that. Attorney Ishmael Muhammed made the following comment about Governor Blanco's decision during his testimony before the Committee:

> We know that there was a shoot-to-kill order given in an environment that already was problematic in terms of black people being killed by authorities. So, just using your common sense—the sense we all got a little bit of, at least—you give someone raring to go, before Katrina, in a disaster situation, a shoot-to-kill order and create an environment where everybody is a potential looter, you are going to have people getting shot down by police, by law enforcement authorities. And then you have account after account after account of people being killed. Then you have statements being made by law enforcement officials and government officials that the only—that all deaths are going to be identified as happening August 29th as the date and no identification is going to be made of what actually killed anyone, what actually made people—what actually was the reason that people died. Why is that? And then you have reports that 10,000 people may be dead, and all of a sudden we have a body count of a little over 1,000.

There were in fact numerous reports of actual and alleged police shootings and police brutality following Hurricane Katrina, including the following:

- "On the street right in front of the Convention Center, I see a circle of chairs around a black tarp. A body lies underneath it. It's been there since the night before. I pull the tarp back and see a black man lying in a pool of blood… Witnesses tell me what happened. Dwight Williams… says the night before, a New Orleans Police Department vehicle pulled up. 'For whatever reason, the gentleman made a move to the car,' he says. 'It took five seconds, the entire incident. The cop opened the door, shot him, and that was it."

- "Near the former St. Thomas housing development, a squadron of police, some in tactical gear, were clustered in an intersection… [A] man who appeared to be dead from a gunshot wound lay on the ground. It was unclear what had occurred. Police said there had been a shootout as they forced a reporter and a photographer out of a passing car at gunpoint… They took away a reporter's notebook and tossed the photographer's camera on the ground before returning and telling the pair to leave" (*Times-Picayune*, September 1, 2005).

- "New Orleans police shot and killed four men and wounded one on Sunday after looters fired on officers, a policeman said. The incident on Sunday morning, as the city began to clean up from the devastation of hurricane Katrina, resulted in four fatalities and one person in critical condition, said one policeman who asked not to be named. No police were wounded. 'Five men who were looting exchanged gunfire with police. The officers engaged the looters when they were fired upon,' said superintendent of New Orleans police, Steven Nichols. Asked for more details, he said only, 'The incident is under police investigation'" (Reuters, September 4, 2005).

- "Two New Orleans police officers repeatedly punched a 64-year-old man accused of public intoxication, and another city officer assaulted an Associated Press Television News producer as a cameraman taped the confrontations. After being questioned, officers Stuart Smith, Lance Schilling and Robert Evangelist were arrested late Sunday and charged with battery. They were also suspended without pay, released and ordered to appear in court at a later date, Capt. Marlon Defillo said." (Associated Press, October 10, 2005).

- "Police shot and killed a 38-year-old man who had been waving a knife Monday in New Orleans, witnesses said. The killing occurred about 4 p.m. on St. Charles Avenue in the south Garden District near downtown, after the man -- who has not been publicly identified -- left a Walgreens pharmacy carrying a knife, witnesses said. Some witnesses said they heard five or six shots, but 10 red cones were placed on the street. The cones are typically used to indicate where shell casings are found. The city's police force has been under increased scrutiny and strain in the wake of last summer's Hurricane Katrina, when some officers left their jobs and others continued to work long hours despite losing nearly everything in the storm. Since then, police have come under investigation for allegations of looting, stealing cars from a Cadillac dealership and the videotaped beating of a man that resulted in two officers being fired last week." (*CNN*, December 27, 2005)

The most controversial report involves conflicting stories of what happened on the Danziger Bridge on September 4, 2005. Here are some early accounts:

- "Police shot eight people carrying guns on a New Orleans bridge Sunday, killing five or six of them, a deputy chief said. A spokesman or the Army Corps of Engineers said the victims were contractors on their way to repair a canal." (*Associated Press*, September 4, 2005)

- "At least five people shot dead by police as they walked across a New Orleans bridge yesterday were contractors working for the US Defense department, according to a report by the Associated Press. A spokesman for the Army Corps of Engineer said the victims were contractors on their way to repair a canal, the news agency said, quoting a Defense Department spokesman. The contractors [were] crossing the bridge to launch barges into Lake Pontchartrain, in an operation to fix the 17th Street Canal, according to the spokesman" (*The Australian*, September 5, 2005).

New Orleans Police claim they caught eight snipers on a bridge who were shooting at relief contractors. There was a gun battle and five or six of the snipers were killed. Three months later, however, two families came forward with stories radically different from that of the police:

- "A teenager critically wounded that day, speaking about the incident for the first time, said in an interview that police shot him for no reason, delivering a final bullet at point-blank range with what he thought was an assault rifle. Members of another family said one of those killed was mentally disabled, a childlike innocent who made a rare foray from home in a desperate effort to find relief from the flood. The two families — one from New Orleans East and solidly middle class, the other poorer and rooted in the Lower 9th Ward — have offered only preliminary information about what they say happened that day. Large gaps remain in the police and civilian accounts of the incident." (*Los Angeles Times*, 11/24/05)

We anticipate additional stories and allegations about shootings to come forward. We have heard from many survivors with missing family members who fear that their loved ones were shot by police, National Guard, other military, or private contractors during the flood. Frank Minyard, Orleans Parish Coroner says: "If you murdered somebody in those days, you are probably going to get away with it."[96] In addition, there are countless reports of persons being arrested arbitrarily, or of children as young as twelve being taken off to prison for allegedly being in violation of curfew. This placed enormous strain on families seeking to reunite before evacuation when there was a child unaccounted for who later turned out to be in prison. One of the most egregious arrests was that of a 73-year old church deaconess with diabetes who had never in her long life been charged with a crime. She was charged with attempting to loot $63.50 worth of groceries at a deli. Eyewitnesses claim that she had paid for her groceries with a credit card and that the OPP officers were tied and frustrated because they were unable to apprehend young looters at a nearby store. "Not even the deli owner wants her charged," read the story. She was transferred form the parish jail to a state prison and a judge set her bail at $50,000, "100 times the maximum $500 fine under state law for minor thefts." She was released on September 16, 2005 after two weeks in jail, facing a court date in October.[97]

The New Orleans Police Department (NOPD) has a history marred by incidents of racist police brutality:

- In 1980, following the killing of a white police officer, police went on a rampage Algiers, a mostly African-American community, killing four citizens and injuring many more. "Some of the victims were tortured, including two who were dragged to swamps where the officers carried out mock executions."[98]

- In 1991, a Justice Department ranked citizen complaints of police brutality in New Orleans as the highest in the country.

- Between 1993 and 1998 over 50 NOPD officers were arrested for felonies including homicide, rape, and robberies.

- In 1995, an NOPD officer was convicted of robbery and an execution-style murdering three people at the restaurant: two employees and "an off-duty officer from her precinct working at the restaurant."

- In 1996 an NOPD officer was convicted of hiring a hit man to assassinate a woman who had filed a complaint of police brutality against him. He is currently serving a life sentence on death row. New Orleans is the only police department in the country with an officer on death row. In fact, two NOPD officers are currently on death row.

- In 1998 two NOPD officers were indicted "for allegedly beating two handcuffed men in custody."

- In the mid-1990s the pattern of violations by NOPD officers was so apparent that the Justice Department threatened a civil action. A reform process ensued, resulting in the arrest of 110 officers for a variety of criminal charges, the suspension of 600 officers for misconduct, the firing of 117 officers and 18 resignations—all this from a force with just 1,700 active duty officers.

- In 2004, despite attempts at reform, 8 officers were arrested on charges including aggravated assault, extortion and conspiracy to commit a robbery.

Experts report that the majority of those killed since Hurricane Katrina were killed by police. Given this pattern, Governor Blanco's "shoot-to-kill" directive during Hurricane Katrina must be called into question. It created conditions under which complaints against police brutality could be dismissed more arbitrarily than before.

To date, parts of the city are still patrolled by private mercenaries working for Blackwater. About 150 heavily armed mercenaries working for Blackwater made their appearance in New Orleans alongside other military responders after the hurricane. They are still there, and residents complain that their presence is a nuisance and intimidates residents. During her testimony before the Select Committee Governor Blanco denied having authorized the hire of mercenaries to join the relief effort. One Blackhawk employee stated that his company had been contracted by the Department of Homeland Security. He also claimed his comrade had been deputized by Governor Blanco's office. The report says: "The man then held up the gold Louisiana law enforcement badge he wore around his neck. Blackwater spokesperson Anne Duke also said the company has a letter from Louisiana officials authorizing its forces to carry loaded weapons."[99] Blackwater employees have demonstrated explicit examples of racial prejudices.

> Blackwater is not alone. As business leaders and government officials talk openly of changing the demographics of what was one of the most culturally vibrant of America's cities, mercenaries from companies like DynCorp, Intercon, American Security Group, Blackhawk, Wackenhut and an Israeli company called Instinctive Shooting International (ISI) are fanning out to guard private businesses and homes, as well as government projects and institutions.[100]

All of this office's requests for more information about who hired Blackwater, and for what reason, have gone unanswered. However, one official of the City of New Orleans told Congresswoman McKinney that DHS sent them to the city.

It is nearly impossible to imagine "shoot-to-kill" orders and the hiring of private mercenaries to patrol the streets of wealthy or mostly white cities and neighborhoods. As we saw in some of the testimonials above, unarmed and non-violent African-American residents of New Orleans faced explicit acts of racial discrimination by the very forces sent to oversee their rescue.

Left to Die: The Plight of Prisoners

The now widely-publicized story of prisoners at the Orleans Parish Prison (OPP) who were abandoned in locked cells during the hurricane, with those on the lower floor facing floodwaters up to their necks, is actually just one more chapter to a long and sad story of prisoner abuse. Interviews with prisoners tell of open and pervasive drug use and beatings of prisoners by officers, or indifference by officers to prisoners beating other prisoners. The federal court has been monitoring Orleans Parish Prison ever since the 1969 filing of the lawsuit *Hamilton v. Morial*. Yet the conditions of the prison remain abysmal:

- In 1999, a pregnant female prisoner "reported being left in shackles during labor and another claimed she was denied an examination by a gynecologist despite bleeding immediately after childbirth."[101]

- In 2001, Shawn Duncan, being held on traffic charges, died of dehydration after he was held in restraints for 42 hours.[102]

- In 2003, two OPP guards were indicted after beating to death a prisoner who had been arrested on charges of public drunkenness.[103]

- "In 2004 OPP was one of the top five prisons with substantiated reports of sexual violence in the nation."[104]

- In each of the three months prior to Hurricane Katrina a prisoner died, two while under medical observation, one who committed suicide whilst under suicide watch.[105]

The Orleans Parish Prison is exceptional in a number of ways. Averaging around 7,000 prisoners on any given day (pre-Katrina), the OPP is the 8th largest local jail in the country. Only county jails in cities like New York, with populations many times that of New Orleans, house more prisoners. The OPP holds more prisoners than the largest state prison in Louisiana.[106] The cost of housing this many prisoners exceeds $100,000 *per day*, a bill that is currently being picked up by FEMA, according to experts. The irony of this is that while FEMA is preparing to evict needy survivors on March 1st, it is meanwhile paying top dollar to keep in jail many prisoners whose release dates have passed as well as many more who are only in on petty offenses.

Arrests in New Orleans are up from 48,000 per year in 1995 to 114,000 per year in 2004.[107] These numbers do not reflect an increase in violent crime in the city. In fact arrests for violent arrests are below half the rate for cities in the United States. The vast increase in arrests reflects a new policy of stopping at nothing to arrest citizens for petty crimes such as "public drunkenness, drug possession, disturbing the peace," obstructing a sidewalk, traffic violations or missed child support payments. Already the target of police harassment, most of these petty arrests target young African-American men, who often complain of being arrested on false charges. Under police sentencing rules, the arrested must spend at least 45 days in jail before sentencing. If prisoners are too poor to post bail, they languish in prison, saddled with court costs that can total $2,400 per year. Although the prison offers little by way of rehabilitation programs, prisoners are put to work for minimum wage at an aquaculture facility built by the prison.[108]

When Hurricane Katrina hit, the OPP had just completed a round of street sweeps, picking up people for petty crimes such as loitering. It had also taken in an influx of prisoners evacuated from other jails. When the city flooded, the prison was inundated with water and prisoners were trapped in cells with water up to their necks. Human Rights Watch researcher Corinne Carey commented that "Of all the nightmares during Hurricane Katrina, this must be one of the worst. Prisoners were abandoned in their cells without food or water for days as floodwaters rose toward the ceiling." Power went out early in the storm, and the toilets backed up, creating an unbearable stench. To let in air, inmates broke jail windows. Some set fire to blankets and shirts to hang outside as a cry for help. Inmates on the first floor had to get up onto the second bunk of their beds, but then the water rose to the ceiling and the female prisoners were then taken to the males' side of the dorm, but there the smoke from the fires that had been started meant that they remained in smoke-filled rooms for nearly two days.[109] Gas lines also broke and the women became nauseous.[110]

Some managed to escape, but many who did approached law enforcement officials at sites where people were congregating on bridges and turned themselves in. Some prisoners reported that dead bodies were seen floating in the floodwaters inside the prison. The prison was finally evacuated on September 2nd, five days after the storm. 450 of the inmates were taken to Jena Correctional Facility, and there have been many "extremely credible" complaints that once there they were tortured and abused, and were refused access to telephones.[111]

Corinne Carey researched the prison and at the end of September had reported that 517 prisoners remained unaccounted for.[112] It is hoped that further investigations by civil and human rights groups will clarify what became of the missing prisoners, though for some that may never be known.

It is shocking to learn that prisoners were evacuated from other jails prior to the storm into a jail that sat below the flood plain. The failure to evacuate the Orleans Parish Prison put prisoners and guards in serious jeopardy. At our community meeting in New Orleans, we heard from a man who had his jaw broken while being attacked by other prisoners during his ordeal of being caught in the flooded prison. He could barely endure the pain long enough to speak to us.[113] He had been arrested on a petty marijuana possession charge. Experts have reported that the OPP jail population has now swelled to 9,000, with 85 per cent of prisoners being held for petty

offences. Many of these are being held *past their release date*, on the excuse that their paperwork was lost during the storm, or because their case has been backlogged. Anyone who endured the horrors of being trapped inside a flooded prison during a hurricane has already served a penalty far in excess of what any petty offense merits. More than that, their abandonment is an insult to their dignity as human beings.

It is beyond the pale that these prisoners are still incarcerated.[114] Six weeks after the storm, Human Rights Watch reported that many of those rounded up in the sweeps before the storm had not yet been brought before a judge.[115] OPP funding is based upon prison population, and if they were dismissed, the $100,000 daily allowance, currently supplied through FEMA, would immediately shrivel, resulting in lay-offs. It has been reported that the Louisiana State Legislature passed a law that sanctioned the detention of prisoners past their release date. Federal officials overseeing disaster relief need to take cognizance of this deplorable situation in which a city now desperate for funds and jobs has allowed its prison to even more pro-actively than before seek to incarcerate massive numbers of young African-American males as a means to the end of contributing to the local job market, and take action to remedy this travesty of justice.[116]

Let us end this gruesome tale on a positive note of recognition of the heroism of one of the guards. One of the women who suffered through this ordeal writes that "one woman … stayed with the inmates to the bitter end. Her name is: Colonel Joseph. She was a god sent Angel. So many deputies abandoned us."[117]

<u>Recommendation: Future hurricane response plans should include evacuations for prisons susceptible to flooding.</u>

4. KATRINA, FEMA AND MARTIAL LAW

The Governor Rebuffs the President's Proposal

The term *posse comitatus* translates as "the formation of a posse." The experience of the founding fathers with the British model that combined the functions was enough to cause them to set that division sharply in administrative powers and civilian command of the military. This principle began to be eroded in the period following the end of the Civil War, and the effective occupation of areas of the south by federal troops who were holding military tribunals, carrying out executions of citizens and usurping local police and judicial control. Their excesses came to the attention of the post-war Congress and they passed the Posse Comitatus Act under the 45th Congress in 1878. The Act makes unlawful:

> …to employ any part of the Army of the United States, as a posse comitatus, or otherwise, for the purpose of executing laws, except in such cases and under such circumstances as such employment of said force may be expressly authorized by the Constitution or by act of Congress…[118]

Louisiana State Governor Kathleen Babineaux Blanco declared a State of Emergency for New Orleans on August 26, 2005, three days before Hurricane Katrina made landfall, extending until September 25. State Attorney General Charles Foti's office issued a clarification about Martial Law claims in the media, stating that no such term exists in state law. However the declaration of a state of emergency "gives authorities wide latitude to suspend civil liberties as they try to restore order and bring victims to safety"[119] Louisiana law does not have a martial law provision.

The declaration of a State of Emergency in Louisiana was equivalent to the suspension of pos*se comitatus* and the establishment of martial law while the Guard was under state control. It allows the National Guard to perform police functions if there is a threat to life or property, or breakdown of law and order. Thus the early State of Emergency declared by Governor Blanco overcame *posse comitatus* considerations. The standard operating procedure has been that only when local Guard forces and police are unable to control the situation or when it is beyond their capabilities will federal armed forces be called in under 32 CFR 50i and 10 USC 331 seq.

There were numerous reports of National Guard troops being used in place of police and enforcing orders with the use of weapons. This was potentially legal under Louisiana law, which suspends the distinction between local police and state-commanded National Guard in restoring order and saving life and property once a formal emergency is declared.

On September 2, 2005, Governor Blanco was presented with a contract proposal from the White House that would have established "Mutually Exclusive Chains of Command." Governor Blanco refused to sign the Memorandum. Had the contract been signed, a "dual status commander" would have been designated to serve as commander of the Louisiana National Guard, subject to the orders of Governor Blanco, and *simultaneously* to provide "command and control over supporting Federal forces," including federalized National Guard units. "Such

Federal forces are required to act in accordance with the Posse Comitatus Act," the document declares.[120]

It is easy to see why this was a non-starter for the Governor. On paper, this was effectively a proposal for dual or shared command between the Governor and the Commander-in-Chief. Such a Y-shaped chain of command would work fine so long as the "dual status commander" handled directives for State Guard and Federal forces separately. But what would happen in the event that a problem arose that concerned both forces over which the Governor and the President disagreed? Surely Blanco knew that she would be holding the weaker stem of the wishbone. Moreover, and as noted past precedent, as well as the *National Response Plan* make it clear that the role of Federal forces is to play a supporting role. According to the NRP:

> Federal departments and agencies are expected to provide their full and prompt cooperation, available resources, and support, as appropriate and consistent with their own responsibilities for protecting national security.[121]

Within that framework, it is the Secretary of Homeland Security who is "responsible for coordinating Federal operations within the United States." In her response, dated September 3, 2005, Blanco said she agreed that a single military commander for Joint Task Force Katrina should be named. But she deflected the dual status commander proposal, suggesting instead that the President "direct the assigned Federal Coordinating Officer of Homeland Security (FEMA) to co-locate with my Homeland Security and Emergency and Preparedness Office at the Federal Joint Task Force headquarters."[122] This is effectively what the National Response Plan calls for.

According to reports this led to a behind-the-scenes power struggle:

> The administration sought unified control over all local police and state National Guard units reporting to the governor. Louisiana officials rejected the request after talks throughout the night, concerned that such a move would be comparable to a federal declaration of martial law. Some officials in the state suspected a political motive behind the request. "Quite frankly, if they'd been able to pull off taking it away from the locals, they then could have blamed everything on the locals," said the source, who does not have the authority to speak publicly.[123]

In the days that followed, there was plenty of posturing: "The president will not let any form of bureaucracy get in the way of protecting the citizens of Louisiana," said White House spokesman Dan Bartlett. Seeking to shore up her independence, and in the face of DHS/FEMA laxity, Blanco hired former FEMA director James Lee Witt to advise her in the relief effort.[124] Bush placed the blame for failures in the response on local government in his weekly radio address, stating that the magnitude of the crisis "has created tremendous problems that have strained state and local capabilities." Chertoff followed suit, claiming that the reason why federal assets were not moved in more quickly was "because our constitutional system really places the primary authority in each state with the governor."[125]

Bush Already Enjoyed Ample Authority

President Bush had ample authority under provisions of existing laws on disaster response to mobilize and command any and all federal assets, including military forces. As already noted, State-directed National Guard units have always worked in conjunction with federal troops and are authorized under federal and state laws to use force to protect lives, property and public safety during a declared emergency. Police functions have been wisely left to local police and state National Guard forces, except when the situation was so dire they could not function. On September 5, 2005, Admiral Timothy J. Keating, speaking on *CNN*, discussed *posse comitatus*. Keating affirmed that the *Posse Comitatus Act* does not limit the use of active duty military for involvement in law enforcement activities during disaster relief efforts. Keating also mentioned that from his perspective, military command had no issue with State Governors exercising their duties to command their guards.

Yet Bush did not need any unified command structure to move troops and federal assets into New Orleans and the Gulf States in the wake of Hurricane Katrina, and he does not need them for other public health emergencies. Existing law is sufficient. Under the *National Response Plan*, a Governor may call upon the President to declare a "major disaster or emergency" (which Blanco did), should the "findings of a joint Federal-State-local Preliminary Damage Assessment (PDA)" warrant this. In extreme cases (which Katrina certainly was), the PDA can be waived. Once the President declares the incident a federal emergency, he "may unilaterally direct the provision of assistance under the act and will, if practicable, consult with the Governor of the State."[126]

Other legislation confirms that the Commander-in-Chief has such powers. The President can order in active troops or call on volunteering Reserve units in civil disturbance (10 USC 672). Federal troops are expected to stay under their own command, and not be placed under National Guard or state officials (32 CFR 501.3). The Robert T. Stafford Disaster Relief Act of 1984 (42USC5121 et seq [amended 1988]) gives the President power in declared states of emergency to mobilize federal troops to respond under the direction of FEMA. There is no need for additional Martial Law authority to authorize civilian law enforcement or to federalize state troops.

There may have been other issues at play. There is certainly a regional precedent that would give any state governor pause before allowing the federalizing of State National Guard troops. In 2004, the deployment of Mississippi and Louisiana Guard units to Iraq reportedly weakened local disaster response efforts. Moreover, in a kind of de-federalization of Louisiana Guard units were recalled from Iraq to assist in the relief efforts after Katrina. It may have looked to Blanco that the President seeking to exert his control over the Guard to be able to command greater resources for his war effort, or Bush may have been dismayed that those assets were not put at his disposal.

Martial Law is Declared

A declaration of martial law generally comes from the President, but in an extreme situation, a local commander can impose martial law (32 CFR 501.2 and .4). The Army decides when it is no longer needed, though it should end as soon as necessity ceases (501.6).

Pre-empting both the Governor and the President, City of New Orleans Mayor Ray Nagin declared Martial Law to crack down on looters and told 1,500 police to do "whatever it takes" to regain control of the city. Nagin said that Martial Law means that officers don't have to worry about civil rights and Miranda rights in stopping the looters… "We will restore law and order," Blanco said, apparently confirming Nagin's decision.[127]

- "Martial law has been declared in New Orleans as conditions continued to deteriorate." (*CBS News*, August 30, 2005).

- "Martial law has been declared in Mississippi and Louisiana" (White House Spokesman Scott McClelland, August 31, 2005).

Despite these reports, the *Times-Picayune* noted that there is no such term as martial law in Louisiana State Law, adding however that when a state of emergency has been declared it provides powers similar to martial law.

Martial law replaces civilian control with military control. A Supreme Court case in 1946 lifted martial law declared in Hawaii during the attack on Pearl Harbor in 1941, forcing civil criminal cases into military courts. The decision ruled that the only legal basis for martial law rests on the complete breakdown of the functions of civil control. Additionally, an 1866 Supreme Court ruling on martial law held that it couldn't be instituted within the US when its civilian courts are in operation.[128]

On the surface of things, it would appear that *both* the President and the DHS were unclear about their roles and responsibilities, and the length and breadth of federal or executive powers. But this incident requires further study.

<u>Recommendation: Congress should direct the Government Accountability office to investigate:</u>

1) <u>the degree to which confusion over roles, responsibilities and powers contributed to the tragic and unnecessary delay in dispatching Federal forces to the incident site; and</u>

2) <u>the Bush administration's claims that the Commander-in-Chief needs more power than the Constitution envisions or allows.</u>

We now turn to the first of these issues.

Why the Delay?

Since governing legislation is clear, the question remains as to the source of the delay. The *Washington Post* ran the following story on September 3, 2005:

> NEW ORLEANS, Sept. 3 -- Tens of thousands of people spent a fifth day awaiting evacuation from this ruined city, as Bush administration officials blamed state and local authorities for what leaders at all levels have called a failure of the country's emergency management. Louisiana did not reach out to a multi-state mutual aid compact for assistance until Wednesday, three state and federal officials said. As of Saturday, Blanco still had not declared a state of emergency, the senior Bush official said**.**

But this claim by the White House official was false. Governor Blanco had declared a State of Emergency ten days earlier on August 26th. On September 3rd—five days after landfall—the President finally authorized federal assets to move:

> President Bush authorized the dispatch of 7,200 active-duty ground troops to the area—the first major commitment of regular ground forces in the crisis—and the Pentagon announced that an additional 10,000 National Guard troops will be sent to Louisiana and Mississippi, raising the total Guard contingent to about 40,000. At a Pentagon news conference Saturday, Lt. Gen. Joseph Inge, the deputy commander of the Northern Command, said the active-duty ground forces would be used mainly to protect sites and perform other functions not considered law enforcement.[129]

From some of the statements made, however, it would appear that some intended to go *beyond* law enforcement:

> 'This place is going to look like a Little Somalia' stated Brigadier General Gary Jones, Commander of the Louisiana National Guard's Joint Task Force. 'We're going to go out and take this city back. This will be a combat operation to get this city under control.' (*Army Times*, Friday, September 2, 2005)

The mobilization was the largest military mobilization on US soil since the Civil War, with nearly 65,000 military personnel deployed to the region. In the absence of early federal support to stabilize the situation, State assets did not or could not restore law and order. The *Army Times* reported September 2nd that the National Guard began a massive operation to "fight insurgents in the city."

All indications suggest that it was only after receiving Blanco's letter on September 3rd that the President decided to act, and that the confusion over the unnecessary and unsigned Memorandum of Agreement lay at the heart of the situation.

Martial Law and FEMA

Aaron Broussard, President of Jefferson Parish, accused FEMA of deliberately sabotaging relief efforts. "New Orleans City Council President Oliver Thomas acknowledged that the city was

surprised by the number of refugees left behind, but he said FEMA should have been prepared to assist. "Everybody shares the blame here," said Thomas. "But when you talk about the mightiest government in the world, that's a ludicrous and lame excuse. You're FEMA, and you're the big dog. And you weren't prepared either."[130]

The Memorandum of Understanding which the White House presented to Blanco did not seek to Federalize the Guard *directly*, but by placing Louisiana State Guard and Federal forces under one commander loyal to two sovereigns, it would have achieved virtually the same result, since ultimate authority rests with the Commander-in-Chief. The insistence on achieving a result tantamount to federalizing the Louisiana National Guard and other resources might be explained by examining martial law and readiness exercise planning involving FEMA.

The types of martial law planning that FEMA had been involved in from the 1980s forward will be found shocking to some. FEMA in those years was headed by Louis Guiffrida. Guiffrida had earlier helped to develop a plan at the National War College that included provisions for the "detention of at least 21 million American Negroes" in "assembly centers or relocation camps."[131]

In 1981, President Reagan had put Guiffrida in charge of the California Specialized Training Institute for Counterterrorism with funding from Federal Law Enforcement Assistance Administration (LEAA) of $425,000. Guiffrida designed plans for martial law with names like "Cable Splicer" and "Garden Plot," martial law plans that would have legitimized the arrest and detention of dissidents such as activists opposed to the war in Vietnam. In 1981, Guiffrida took charge of FEMA and created the Civil Security Division and a center for training civil defense personnel in military police methods. President Reagan also set up an Emergency Mobilization Planning Board (EMPB) to put National Security Council in charge of civil defense policy. This plan combined FEMA, the Pentagon and 10 federal agencies. Lt. Col. Oliver North served on the EMPB from 1982-1984 under Robert McFarlane, Assistant to the President for National Security Affairs.

When Attorney General William French Smith got wind of the plans to round up dissenters after being asked to review Executive Order 11490 (a sweeping order giving near dictatorial powers to the President during an emergency), he admonished McFarlane, writing: "I believe that the role assigned to [FEMA] on the revised Executive Order exceeds its proper function as a coordinating agency for emergency preparedness."[132]

North assisted FEMA in making martial law plans to counter civil unrest, according to his testimony during the 1987 Iran-Contra scandal.[133] Giuffrida's tenure FEMA did not last long. He resigned in 1985 under charges of mismanagement and embezzlement. The EMPB was dissolved soon thereafter. Yet one planning concept that was initiated in that period and which survives is Continuity of Government (COG). Continuity of Government essentially replaces Congress with appointed officials. During an emergency, COG replaces federal government with pre-selected executive agency teams that run affairs from secure locations, as Vice President Dick Cheney was reported to be doing well after 9/11. Command was said to rest with the National Security Council (NSC), FEMA and the Department of Defense.[134] We know of no clear indication that Continuity of Government has been lifted since September 11, 2001.

The obvious concern about the various plans just mentioned is that most of these plans appear to move in the direction of suspending the Posse Comitatus Act *indefinitely*. Moreover, both President Bush and Senator Mark Warner (VA) have recently renewed calls to undermine or reverse the *Posse Comitatus Act* of 1878.

Whatever his reasons, President Bush should be the one held responsible for the delay in deploying federal forces to the stricken region of the Gulf Coast. The President has no leg to stand on if he wishes to place blame for the delay on Governor Blanco, as we have seen above, for he did not need her consent in order to move forces. "Existing law is sufficient, and the Congress needs to investigate the New Orleans response by FEMA and government troops, as well as examine and reject the Bush administration's claims that they need more power than the Constitution envisions or allows."[135]

<u>Recommendation: The Constitutional principle and practice of separating military and police functions has become a cornerstone of our democracy. Congress should re-affirm the Posse Comitatus Act in light of proposals to amend or overturn it being made by our President.</u>

5. ENVIRONMENTAL CONCERNS

"Toxic Gumbo"

Hurricane Katrina left behind an environmental nightmare. In addition to scooping up and depositing toxic sediment sludge from the bottom of lakes, rivers and the Gulf of Mexico (as discussed below), Katrina struck 466 facilities handling large quantities of dangerous chemicals, and 31 hazardous waste sites along the Gulf Coast. Among the known contaminants and toxins that mixed with the floodwaters in New Orleans, are: oil, gasoline, hexavalent chromium, mercury, arsenic, chloroacetic acid, fecal bacteria from flooded sewage facilities (including E. coli),[136] household hazardous wastes,[137] pesticides and unattended corpses of the dead.

The United States Coast Guard reported more than 7 million gallons of oil and between 1 and 2 million gallons of gasoline from plants and depots in southeast Louisiana were spilled as a result of the hurricane. Spills of oil and other toxic chemicals pose a particularly serious public health threat when they dry and become airborne as invisible, breathable particulates. One of the first spill reports to come in was that of an oil tanker that had run aground and was leaking fuel.[138] Among the multiple oil spills from above-ground tanks was a tank breach at the Meraux Murphy Oil Refinery where over a million gallons of oil leaked into the floodwaters. Residents whose homes were flooded are being told not to return.[139]

Under the Resource Conservation and Recovery Act (RCRA) facilities that manage hazardous materials are required to have emergency plans to prevent waste or toxins from being released into the environment. The multiple spills suggest that adequate containment mechanisms were not constructed by the owners and companies of the leaking facilities.

The decision to pump the contaminated floodwaters out into Lake Pontchartrain will seriously compromise the fish and other organisms of the lake, and "will also undo the hard-won success of cleaning up Lake Pontchartrain to the point that portions were recently deemed safe for swimming."[140]

Superfund Sites Hit

Hurricane Katrina struck 16 superfund toxic waste sites, 3 of which were flooded, being in the environs of the City of New Orleans, one of them totally submerged. The flooded Superfund sites in Louisiana and Mississippi contained contaminants that include heavy metals associated with developmental problems and increased risk of cancer, and polycyclic aeromatic hydrocarbons, which are known carcinogens. These dangerous materials joined the rest of the dangerous contents of the "toxic gumbo" that mixed in the floodwaters and were then pumped into the Gulf of Mexico and Lake Pontchartrain. Here we have an example of a disaster compounding a disaster, as the toxic spills that created superfund sites (and there is nothing 'super' about them) should never have been allowed to happen in the first place and should have been cleaned up years ago.

In 1995, Congress allowed the taxation of crude oil and chemical feedstocks that provided revenue for the Superfund program to expire. Now comes an environmental catastrophe on the scale of Katrina and while the Superfund in its earlier incantation would have been the perfect vehicle for cleaning up the toxic mess in the Gulf, the work of cleaning up thousands of Superfund sites across the United States of America has come to a virtual standstill. The residents of the Gulf region thus face an uphill battle in getting federal assistance for clean-up, for if there is no money to restore local government, to get people housing so they can return and get jobs and rebuild the tax base, there is unlikely to be any money left for environmental cleanup. This is tragic, since the scale of the problem is simply too vast for local self-help groups or even for state and local government.

Testimonials from Independent Researchers

Independent researchers have reported environmental contaminants such as arsenic, benzo(a)pyrene and petroleum hydrocarbons exceeding Environmental Protection Agency and Louisiana Department of Environmental Quality Standards present in a one eighth inch layer of visibly distinct sediment covering most ground surfaces after the removal of floodwaters from New Orleans and environs.

Wilma Subra, President of Subra Company, an environmental research firm which she founded in 1981, is perhaps the foremost independent expert on this issue. A resident of Iberia, Louisiana, Subra has earned enormous respect in Louisiana and the Gulf Coast, even before Hurricane Katrina. Within 48 hours of Katrina's landfall, she was in the field, assessing the damage, taking test samples and assessing them, figuring out what community members would need to deal with resulting environmental hazards, working with other organizations to get necessary supplies to affected residents.

She has shared her data with the Environmental Protection Agency (EPA), and the EPA has shared its sampling data with her. Both sets of data matched perfectly. Where there is a disagreement is in the *interpretation* of the data. The EPA finds there is no long-term health risk, and has excused itself from the enormous task of removing the sediment sludge.

Wilma also spoke at the New Orleans community event.[141] The section that follows is drawn from Subra's presentation.

The key term to understand about why Hurricane Katrina has created an environmental emergency for the Gulf Coast is "sediment sludge." What is this? All of the historical discharges into the Gulf of Mexico and other water bodies throughout the 1900s wound up in the sediment layer at the bottom of these water bodies. These discharges included issue from untreated wastewater from treatment plants. The last time there was a storm surge even comparable to that of Hurricane Katrina was when Hurricane Betsy hit New Orleans in 1965.

Since that time, the degree of concentration of new chemical effluents in the sediment sludge is far greater than what it was at the time of Betsy.

The storm surge from Hurricane Katrina "scooped up" all this contaminated sediment in these water bodies, carrying it over land and spreading it all over everything. It was not deposited only in New Orleans. The line of contamination extends from Mobile Bay to the Louisiana-Texas line. On top of this, Hurricane Rita's storm surge deposited more contaminated sediment on areas already hit by Katrina and other areas. Wherever a storm surge came ashore *and* where there were breaches in the levees, the sediment sludge was spread all over. In some areas it is very sandy, like at the London Avenue Canal, and in other areas it is more silty, as at the Seventeenth Street and Industrial Canals.

What makes this sediment sludge dangerous is that it contains high levels of dangerous chemical such as:

- arsenic: a heavy metal and a suspected cancer-causing agent;
- polynuclear aeromatic hydrocarbons (PAHs): a big word, but the reader may be more familiar with the danger of waste from creosote facilities—PAHs comprise one of the chemical compounds in creosote that makes it toxic; and
- benzo(a)pyrene: a probable carcinogen, and the most toxic of these three.

Added to these chemicals are such organisms as:

- fecal choliforms: from untreated sewage;
- Staphylococcus aureus ("Staph"): an organism that gives you sore throat and skin infections; and
- salmonella: another bug that gives you food poisoning.

All of these organisms are alive and well in the sediment sludge. The sludge is very available, it is on the surface, and has been spread all over the yards and sidewalks. It is easy to kick up. When the organisms enter the lungs, and the affected person visits the doctor, the physician typically assumes that he is dealing with only one of these types of organisms, not more than one type. Hence the treatment typically fails because multiple types of organisms are causing the problem.

Exposure to these toxins can come through skin contact, resulting in skin rashes that do not respond to normal antibiotics; and inhalation, which can result in persistent respiratory problems and what local doctors are calling "Katrina cough."[142] While all the health agencies dispute this claim, all the medical doctors who have treated the responders, who have treated the people who return to their houses, say it is real, and it results mostly from recurrent, long-term exposure.

The local government has declared that in most areas it is safe for residents to return to their homes. But in reality, the presence of sediment sludge inside houses and on the yard means that returning residents are at risk of exposure to very toxic substances and contamination where the organisms are concerned.

In the aftermath of the Hurricane, Wilma Subra worked with the Louisiana Environmental Action Network (LEAN), a grassroots organization which at the time had very limited resources. Together with the Southern Mutual Health Association and Oxfam America, they assembled and began distributing kits for returning residents that included tybec suits, respirators, gloves, booties and essential cleaning supplies, advising residents to use the kits to avoid contact with the hazardous materials. They encouraged small children, pregnant women and the elderly not to go in until the hazardous material was cleaned up and addressed.

They approached FEMA and asked FEMA to take over and distribute the kits. FEMA declined. They asked the EPA. The EPA declined. So it was left up to LEAN, a local grassroots organization, to spearhead the enormous effort of providing these safety kits to returning residents. The kits were distributed through local community self-help groups like the Common Ground Relief Collective, and through local Churches, who in turn distributed them to their constituents.

The sediment sludge varies in depth. At the various sites of the levee breaches, the layer of sediment sludge deposited into residential areas could range from four to even as much as twelve feet. In most other affected areas away from these breaches the layer could be as thick as three to six feet, but once it dries it becomes a thin, dry layer of hazardous material that can easily become airborne upon contact. Over time, this material will travel. The delay in addressing this problem, with the refusal of the EPA to do the clean-up in spite of the fact that the EPA is the Incident Command agency responsible for clean-up, will mean that any clean-up effort will become more difficult over time, because the material will have gotten more spread around. Thus there is an urgent need for action at the federal level to get the clean-up effort started.

Monique Harden serves as International Policy Counsel for the National Black Environmental Justice Network. Ms. Harden also spoke at our community meeting, and below is a summary of her presentation.

What we are seeing in the Gulf Coast is a repeat of 9/11. In the aftermath of the attack on the World Trade Center the EPA was there saying the air quality was good when in fact it wasn't. And just recently we heard the news about a 9/11 rescue worker who died of black lung at the age of 34. Is this the future for New Orleans?

The Hurricane Relief Bill which was passed by Congress in the name of providing immediate aid to the affected region waived all public health and environmental laws. This was the opposite of what was needed to protect residents from harmful exposure. Since Katrina, the EPA has been going through this process of "assessing." This sounds good but means very little. Wilma Subra discovered the presence of arsenic and diesel fuel substances at levels above safety limits. Both of these materials can cause cancers in the long term. The presence of these toxic hazards on

streets and sidewalks would, under existing regulations, qualify the entire region affected by the sediment sludge to be declared a Superfund site.

One would think that since we can easily demonstrate the presence of toxins at levels that would qualify our neighborhoods to get on the Superfund list, that we should be able to get the EPA interested in doing the clean-up. But so far, this has not been the case.

Recommendation: Congress should revive the Superfund program, which taxes polluters to pay for the environmental cleanup they are responsible for creating in the first place.

Looking at the data for arsenic, the EPA sets the screening level at 0.39 milligrams per kilogram. The screening level means further study is required. The Mississippi Department of Environmental Quality (DEQ) has a screening level of 0.4 milligrams, but the Louisiana DEQ sets the screening level at *12.0* milligrams per kilogram. There are states that will not allow children to play on soil with arsenic levels above 5.0 milligrams per kilogram. But in New Orleans and in places along the Gulf Coast, *average* levels of arsenic widely exceed 12 milligrams per kilogram. Now it is important for Members of Congress to understand how inadequate our system of environmental protection is. It's fine if you don't need it, but once you need it, you're in trouble. This is because the EPA sets no levels above which clean-up would be required. What's the *clean-up* level? No one can say. Even in terms of screening levels there is a problem, because in the case of Hurricane Katrina, the EPA has abandoned its own standards in favor of the more lax standards of States. So in Mississippi, arsenic samples above 0.4 milligrams per kilogram will merit further study. But in Louisiana the EPA only does further study if samples reach 12.0 milligrams per kilogram or higher.

The EPA and the Army Corps of Engineers have also declined so far to undertake the task of cleaning up the sediment sludge. Wilma Subra has been quoted as saying: "I get the impression that they don't want to remove anything, because if they do start removing, they set a precedent."[143]

The Failure of the EPA to Act

As soon as residents began returning to the region, returning residents and responders began reporting widespread cases of respiratory problems, asthmas and skin rashes. Law enforcement and emergency service personnel who waded for hours or days in the toxic floodwaters are now reporting medical problems that doctors are having a hard time diagnosing. These problems are being given names like "Katrina Rash" and "New Orleans Crud." Symptoms include terrible itching on the skin, abdominal cramps, high fevers. Says one responder: "They dumped us in New Orleans without the right equipment and they didn't give us shots or respirators." "I'm tired of my chest hurting," says a another.[144]

The Environmental Protection Agency failed to develop any broad strategic plan for dealing with the post-hurricane environmental clean-up and public safety, detailing goals and methods of achieving them. Tens of thousands of disaster responders and returning residents were allowed into damaged areas without receiving sufficient warnings or

information about levels of contamination, health risks or necessary precautions. Given the comparatively enormous resources at their disposal, the refusal by the both the EPA and FEMA to assist in local efforts to protect residents and responders from exposure to toxins and contaminants that the EPA's own data shows are present in quantities exceeding safety limits is an outright scandal.

There is still time to act. With sufficient government testing, warning and support, the people of the Gulf Coast region could be protected from similar dangers arising from the above-mentioned post-hurricane environmental hazards.

Recommendation: Congress must pass legislation directing the Environmental Protection Agency to establish a comprehensive assessment and protection plan for the citizens of the Gulf Coast to protect the public from environmental contaminants and infectious materials that pose a threat to public health and safety in the aftermath of Hurricane Katrina.

The wetlands of the Gulf Coast are eroding. It took thousands of years for the sediments of the Mississippi River to build up the healthy marshes and barrier islands of the coastal wetlands. These wetlands serve as a natural shield, buffering the impact of storms. Yet over a million acres or 25% of the total number of acres of wetlands have disappeared since 1930 due to the diversion of the replenishing sediment and fresh water with the building of shipping canals and flood control works, among other causes. Every hour, a piece of land the size of two football fields is lost to the open water.[145] The "Coast 2050" plan envisions redesigning the flood control and shipping system to restore healthy sedimentation and replenish the wetlands. The price tag is usually estimated at between $14 and $25 billion for a 50 year project. One expert suggests that for every mile of wetlands passed by a storm surge, flooding would be reduced by a foot.[146] Congress needs to get involved and play a facilitating role in local efforts to restore one of America's greatest natural treasures.

Recommendation: Congress should establish a commission to work with scientists, engineers and state and local governments to explore the feasibility of the "Coast 2050"[147] plan to restore the coastal wetlands.

5. Conclusion: Bridges to Nowhere

A single weather event, Hurricane Katrina, has brought about the greatest population dislocation in the United States since the Great Depression of the 1930s. Katrina was not the strongest hurricane ever to hit the Gulf Coast, but it was perhaps the most destructive ever due to its extraordinary storm surge on the one hand, and due to human failures on the other. These failures are many and profound: the inadequacy of levees, the inadequacy of the evacuation plan, the inadequacy of the governmental response and a social environment characterized by widespread poverty, racial inequities and a history of racial discrimination. Without these failures, Hurricane Katrina, whose effect was compounded in mostly rural areas by Hurricane Rita, might have had an impact much more in keeping with most other hurricanes. Instead, Katrina's impact will be permanent and irreversible for many families and communities. The cleanup and reconstruction effort alone will likely take no less than a decade to accomplish, but the speed of that effort will also be determined by whether the American people step forward and exert sufficient pressure on their government to speed up the relief and reconstruction effort, or whether that effort is also shaped by human failure and a lack of compassion. President Bush has made a lot of easy promises, but has failed to live up to his words.[148]

As our tour bus for the Congressional Delegation made up of Select Committee Members, guest Members and their staff drove through the devastated Lower Ninth Ward of New Orleans, not far from downtown, one could still get a sense of the charm. Aside from the roads having been cleared, little had changed in four and a half months since a twenty foot wall of water was unleashed upon the is community of lower-income, mostly African-American residents. As we passed by heaps of debris, we were reminded that there were likely to be found more dead bodies (as indeed several have been even since our visit), it was possible to imagine the lifestyle of the residents of these cozy square wood houses.

Fourteen per cent of residents in the Lower Ninth were senior citizens. Another fourteen percent were handicapped. A full sixty percent owned their own homes, ranking the home ownership rate in this community among the highest in the country. At the same time, only forty per cent of residents were literate. These astonishing figures tell a tale of a community that was industrious, frugal and ill-served by the educational system. But most of all, you could tell just by looking that in spite of the fact that their homes were small, the people who lived here were proud of their community, and proud to contribute their part to the culture of New Orleans.

Another dramatic fact is that few of these residents left New Orleans very often. But now they are scattered to the four winds and 44 states, and of all the residents of New Orleans they face the longest odds of ever returning to their homes, most of which are beyond repair, let alone ever receiving compensation for the loss of their property. Numbers and dollar figures cannot begin to calculate the loss experienced by, say, a senior in her 80s who had rarely ever set foot outside New Orleans, but who now faces the challenge of starting a new life all over again in a strange community far away, separated from family and friends.

Hurricane Katrina, which struck the coasts of Louisiana, Mississippi and Alabama on August 29, 2005, was the first event to be declared an "Incident of National Significance" by the Secretary of Homeland Security, as empowered to do so under the NRP. The first priority listed in the

event of an Incident of National Significance is "to save lives and protect the health and safety of the public, resources and recovery workers."

A mandatory evacuation was declared for the City of New Orleans in the aftermath of Hurricane Katrina. Yet more than 100,000 residents of New Orleans simply lacked the means to evacuate upon demand. There are many reasons why. The elderly, the disabled and the infirm required special assistance. Most self-supporting residents were low income earners and did not have their own means of transport to get out. Before the Hurricane Pam exercise in 2004, this issue seriously addressed, but funds for hurricane disaster planning were cut by the DHS.

For the low income, mostly black residents of Orleans Parish who had not heeded or could not heed evacuation calls, the order to evacuate was effectively meaningless. How would our 82 year-old grandmother with no care, living on a fixed income, and whose only family was based in the area about to be hit, get up and relocate out of the city. For starters, how would she pay for the hotel bills? For as many as five days after Hurricane Katrina, many of the bridges of New Orleans became bridges to nowhere, most with floodwaters on both ends. Thousands of survivors spent days stranded on a bridge, hopeful and expectant that one of the many helicopters flying overhead would stop and rescue them from the toxic floodwaters and the searing hot sun. Some black survivors report helicopters teasing them at the prospect of rescue and then leaving them and moving on to white neighborhoods. The conditions at the Convention Center, the Superdome, the I-10 / Causeway Cloverleaf resembled concentration camps—days of internment without adequate food, water or sanitation, and a growing sense of hopelessness. Yet all this wasn't all just about poor coordination. The Gretna Police *turned back* survivors seeking a way out by crossing the Crescent City Connection bridge, and subsequently confiscated their food and water—bridge to nowhere.

What we are left with is a spectacular failure of government. Prior to the flooding of New Orleans, Grover Norquist, President of Americans for Tax Reform and a close associated of indicted lobbyist Jack Abramoff, has publicly stated the following: "I don't want to abolish government. I simply want to reduce it to the size where I can drag it into the bathroom and drown it in the bathtub." It seems he got his wish, at least for the people of New Orleans. Hurricane Katrina should and undoubtedly will force us to reexamine prevalent notions of the market fundamentalists, who are ready and willing to fund any wars the government takes on, but who loathe paying for social programs or public infrastructure. It was under-funding that contributed to the flooding of New Orleans, and to the delinquent response. It may be under-funding that cripples the ability of tens of thousands of residents to return home and rebuild their lives.

Americans are generous when it comes to disaster. The $3 billion that has been raised by private entities for the relief effort eclipses the $2.2 raised for victims of 9/11. "But charity is episodic and driven by disaster. What is needed are structures of justice that perpetuate the goodwill intended in charity."[149]

The Gulf Coast provides America with a significant share of its energy supplies. This should be kept in mind as Congress and the White House decide how much relief and reconstruction monies are to be given, and in what form. Making a strong investment may pay greater

dividends later. We can choose to leave New Orleans to the Donald Trumps and Prince Charles's of the world, who are already busy buying up property and planning their casinos and condominiums for the rich. In doing so we may be depriving tens of thousands of working people of their right of return, of their voting rights, of their property rights and yes, of their civil rights.

We can also choose to go half-way and assist only enough to restore things to the way they were before Katrina. But many working class survivors don't want to go back to how it was before. They see Katrina as an opportunity to fix what was broken. They dream of a New Orleans with its racial diversity restored, free of grinding poverty and crowded prisons, with strong levees[150] and comprehensive evacuation plans for future hurricanes. The Federal government should seek creative ways to assist in such a noble endeavor.

Summary of Recommendations:

- When the National Response Plan and/or other disaster preparedness plans are revised, they need to be updated to anticipate looting as a highly probable and often rational response to scarcity by individuals in an emergency. Rights of property must not supersede the right to food, water and medicine, i.e. the right to survive, especially not during a declared emergency.

- FEMA or any agency that replaces it must be directed to produce impact and implementation policy studies aimed at producing emergency preparedness and response policies that address the particular needs of minority communities.

- Congress should pass legislation to set procedures for protecting the civil liberties of minorities during an emergency situation. Armed forces and police should be on notice that individual acts of blatant discrimination or abuse of minorities will result in serious punishments, and systemic abuse will result in loss of financial support. Private relief organizations with discriminatory relief practices should be subject to review and possible loss of contracts.

- Recommendation: Future emergency preparedness planning must include the provision of transportation for the elderly, the infirm and those without their own means of locomotion, as well as the placing of Disaster Recovery Centers (DRCs) as near as is feasible, to enable these evacuees to return to their homes as quickly and easily as possible.

- Congress should pass legislation to ban political patronage within Federal agencies; specifically within FEMA and DHS.

- Recommendation: The National Response Plan should either be overhauled or scrapped. A new plan should be developed that includes: 1) unambiguous command structures for military responders; 2) crystal clear clarification regarding the integration of the work of state and federal armed forces during an emergency to maximize the ability to deploy military assets in a pro-active manner; 3) pre-set standard operating procedures for non-military agencies operating in a crisis detailing what operations they can and should initiate without waiting for marching orders from a higher authority; 4) an integrated communications plan that puts all responders on the same page from the get-go, using Interoperable Communications technology.

- Recommendation: The National Response Plan is color blind, and any future such national emergency response plans must include sensitivity training for both military and non-military responders so that responders are aware in advance of the specific needs and leadership patterns in communities of color.

- Recommendation: Emergency response agencies like FEMA should offer diversity training to their employees, and establish direct working relationships with leadership

figures in minority communities living in disaster prone areas such as flood planes so that those relationships are forged and ready to call upon prior to the emergency.

- Congress should re-establish FEMA as an independent Federal agency, removing it from DHS; but give housing oversight back to HUD.

- Take international politics out of disaster relief efforts by establishing a policy that no legitimate offers of foreign assistance will be refused.

- Future hurricane response plans should include evacuations for prisons susceptible to flooding.

- Congress should direct the Government Accountability office to investigate:

  1) the degree to which confusion over roles, responsibilities and powers contributed to the tragic and unnecessary delay in dispatching Federal forces to the incident site; and

  2) the Bush administration's claims that the Commander-in-Chief needs more power than the Constitution envisions or allows.

- Recommendation: The Constitutional principle and practice of separating military and police functions has become a cornerstone of our democracy. Congress should re-affirm the Posse Comitatus Act in light of proposals to amend or overturn it being made by our President.

- Congress should revive the Superfund program, which taxes polluters to pay for the environmental cleanup they are responsible for creating in the first place.

- Congress must pass legislation directing the Environmental Protection Agency to establish a comprehensive assessment and protection plan for the citizens of the Gulf Coast to protect the public from environmental contaminants and infectious materials that pose a threat to public health and safety in the aftermath of Hurricane Katrina.

- The Federal government should establish a commission to work with scientists, engineers and state and local governments to explore the feasibility of the "Coast 2050" plan to restore the coastal wetlands.

SOURCE NOTES

Cover Art: by Ricardo Levins Morales, distributed by the Northland Poster Collective, who offered the Hurricane Katrina Poster and raise funds for the relief efforts. For More Information: Northland Poster: 1-800-627-3082; [http://www.northlandposter.com] (accessed February 6, 2006); Southern Partners Fund: [http://www.spfund.org] (accessed February 6, 2006).

[1] On July 22, 2005, on the anniversary of the release of the *9/11 Commission Report*, Rep. Cynthia McKinney hosted a Congressional Briefing entitled "The 9/11 Commission Report One Year Later: Did the Commission Get it Right?" at which over 30 independent experts discussed the omissions, errors and false premises of the Report.

[2] David Walker, Comptroller General of the United States made this observation at a press conference held jointly with Select Committee Chairman Tom Davis on Wednesday, February 1st, 2006.

[3] "…for those even slightly familiar with the current intelligence reform proposals, there is a more than vague sense, to use Yogi Berra's immortal phrase, '*Deja vu* all over again.' There has been a failure. Pearl Harbor. The unpredicted Soviet development of the Atomic Bomb, the Chinese Communist victory in 1949. Remember who lost China. The equally unpredicted North Korean invasion in 1950. The Bay of Pigs failure. Vietnam. The overthrow of the Shah in 1978. Samosa and Nicaragua a year later, not only unpredicted, but confidently declared by our intelligence estimates as impossible, or a scandal, and Iran-Contra comes to mind inevitably here, and some others in the 1970s. What happens next? A commission will be appointed, usually by the Executive, but post-Vietnam, often by the Congress. You will recall the Hoover Commission in the 1950s, the Church and Pike Commissions of the 1970s, and the Iran-Contra Joint Congressional Committee in the 1980s. Often forgotten are the Senate hearings of 1992, which tried to learn how we were so unprepared for Iraq's evasion of Kuwait, and led among other things to the late Senator Moynihan's very serious proposal for doing away with the CIA altogether, and Senator Arlen Spector's repeated and now accepted idea that the post of National Director of Intelligence and Director of the CIA be separated. The Committee, talking of this generic committee here, will labor long and hard and recommend inevitably that the agencies concerned coordinate their activities better and share their information" --David MacMichael, former CIA officer, speaking at the Congressional Briefing "The 9/11 Commission Report One Year Later: Did the Commission Get it Right?", July 22, 2005. While this quote concerns intelligence form, the conclusions of the Select Committee Report do tend to fit the pattern described.

[4] David Walker, Comptroller General of the United States, called for the appointment of one person to be the President's point person on disaster relief at a press conference held jointly with Select Committee Chairman Tom Davis on Wednesday, February 1st, 2006. Chairman Tom Davis joined this press conference and expressed overall consensus between the Select Committee and the GAO's report, although not necessarily on this specific point.

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