

# WILDLAND FIRE'S TOOLBOX FOR HURRICANES



---

‘THE GREENPANTS’ GUIDE

# The Wildland Fire Community In All-Hazard Response

---

Disaster requires response not because of its Natural element, but because of its human element.

*Paraphrased from a 2005 Hurricane AAR Rollup*

---

In 2004, about 1,900 personnel from the wildland fire community were committed to the response efforts for Hurricanes Charlie, Frances and Ivan. In 2005, more than 5,000 wildland fire community personnel responded in the aftermath of Hurricanes Katrina, Rita and Wilma. Incident Management Teams along with thousands of personnel from hand crews and single resource status all participated in the response efforts. These disasters were sweeping and politically charged. We must learn from our experiences and prepare as best we can for the next.

“Response in this realm is driven as much by personalities and luck as they are guided by standardization,” one IMT member said after an event. “There is little in the way of procedures, systems or processes.” Another team member noted, “Nearly every place where success is reported, it was preceded by a series of failures and frustrations.”

Relief workers came from both government and nongovernment sectors. Few of these agency personnel had experience with each other or each others’ roles. As a result, differing policies and doctrines clashed under undefined or poorly reconciled mission assignments. It became widely understood among wildland fire community members that building and maintaining positive relationships was a

core competency and the key to any level of success during their mission. Their experiences echoed the importance of what retired Phoenix Fire Chief Alan Brunacini calls a firefighter’s standard response to any situation: “***Respond quickly, solve the problem and be nice about it.***”

This toolbox is a collection of effective practices and lessons we extracted from the AAR Rollups and Reports and compiled in the simplest format possible. Many came from IMTs that had re-invented or improved a wheel several times. Simplicity is key, because when we are in response mode on an all-hazard event, we are not going to have a lot of time to absorb the intricacies of complex new tasks and methods. They may not be perfect, but we believe that if someone has never been to an all-hazard event, or are being assigned to a new mission, having something in your hand is at least one step above having nothing to refer to.

We have neither seen nor can we imagine every possible challenge ahead of us. Even the usually reliable systems can fail in unimaginable ways. We need to remain aware of our vulnerabilities and pay close attention to opportunities for learning resilient behavior responses. Karl Weick and Kathleen Sutcliffe write in “Managing the Unexpected: Assuring High Performance in an Age of Complexity,” that new situations have components of old situations – making your past experience partly relevant and partly irrelevant.

Continue to learn and share your lessons with your wildland fire community.

*by Jonetta T. Holt*

# Keep in Mind:

As you are mobilized to a hurricane or all-hazard event, there are a number of things to remember and realize. These include:

- \* This will not be a normal assignment in an organizational sense. The team and all single resources ordered will be working for a FEMA representative.
- \* The organizational structure for this type of organization would be similar in our experience to the FEMA manager being an Agency Administrator. There may be an assistant who works for the on-site manager who would represent the Agency Administrator's or Line Officer's Representative.
- \* A Department of Transportation Official, an Army Corps of Engineers lead, and private contracting representatives (Landstar, Lockheed-Martin, etc) would be in liaison functions within the ICS organization.
- \* The Incident Commander could fill the role traditionally filled by IMTs, or the role of a Deputy Incident Commander if the FEMA on-site manager is filling the Incident Commander role.
- \* Be flexible in dealing with the organization you find yourself in, but seek for ways to smooth the organizational levels to where all players have an equal stake.
- \* Integrate all supply ordering, check-ins, equipment assignments (E-numbers) and other procedures as quickly as possible to the team. This will establish both cost tracking and cost accountability for the Forest Service through the ESF-4 and for FEMA for billing, payment processing and cost tracking.
- \* One ordering process for all agencies involved in the operation of

the incident will alleviate duplication of orders and duplication of billing.

\* Be certain that within the established JOINT FIELD OFFICE, all agencies that require daily information for cost tracking are talking to one another, and that one reporting format is used. It is frustrating to an IMT and the other agencies to report the same information ten times a day in ten formats.

\* Carefully review the mission statements that have been prepared for the incident, especially if you are on a military base, and make sure that the IMT, FEMA, DOT and USACE are within what was initially developed. If there is a need to make changes to reflect the needs of the incident, contact the JFO and update the mission statements. This will probably need concurrence and input from the Department of Defense and FEMA representatives at the JFO level.

As you support a mobilization center, a receiving and distribution center, or a base camp for responders or evacuees, remember that you are outside the normal “wildland world.” This operation will be very similar to a (for lack of a better analogy) Wal Mart distribution center where like commodities arrive from the supplier and are cross-docked and reloaded for distribution to “customers” down the line. If you haven’t experienced this type of assignment, be ready to learn, absorb, and offer help where appropriate. The Incident Command System may not be what you are familiar with.

The assignments will be in unusual locations with little infrastructure left. Find out what support there is at your location and what you may need to bring: Satellite phones, cell phones with car chargers, computer support, and other team support needs may need to be air freighted or driven to the incident. Batteries, MREs, drinking water, radios, cell phones, etc. might be necessary. Don’t hesitate to ask questions. Get all the information you can before departing.

*Adapted from the IMT-IC Narrative*



Trucks carrying fresh water, ice and MREs are mobilized in the first phase of disaster response. Photo from 2005 hurricane response.

## ~ Hurricane Toolbox ~

Posted in the Incident Toolbox section at  
[www.wildfirelessons.net](http://www.wildfirelessons.net)

Welcome to the tactical level hurricane toolbox. This simple and straight forward database provides you with the easiest access to templates and samples created by wildland fire community members who have experienced hurricane and other all-risk assignments. The following templates are offered with the idea that you will download and change them to fit your situation.

As the wildland fire community becomes aware of the toolbox, we hope that more of its members will take a few moments to share their latest masterpiece by sending it to the staff at the Lessons Learned Center where it can be edited for names (we generally don't include them) and added to the tools. **Please participate.**

# Share your ideas - watch this grow!

**\*\*Organized by potential Mission Assignments\*\***

**AHRG Quick Guide** – The All Hazard Response Guide developed by the Southern Region of the USDA Forest Service provides several tools that will benefit wildland fire personnel called to an all-hazard incident. The Quick Guide posted here contains only the overview. In order to pick up the tools in the guide you will need to go to the references page for each section of the overview at the actual website: [www.fs.fed.us/r8/allhazardresponse](http://www.fs.fed.us/r8/allhazardresponse). The guide has several items available in Sect. 3 Safety including several JHAs and risk awareness documents. Team members may want to review the references in Sect. 4 ESF #4 Function because that is where operating procedures and pre-scripted mission statements are posted. For finance personnel, Sect. 7 contains a Desk Guide for Incident Business Operations and many more questions are addressed on the FAQs page.

**WFSTAR Topics: All-Hazard Incident Assignments** – [http://www.nifc.gov/wfstar/hottopics/all\\_hazard\\_incidents.html](http://www.nifc.gov/wfstar/hottopics/all_hazard_incidents.html) is another resource for wildland fire personnel who anticipate they may be called to an all-hazard incident. This page contains an All-Hazard Assignment Toolkit with two documents not included in either the AHRG Quick Guide or the Lessons Learned Center’s Hurricane Toolbox below. The two documents are “*Managing the Unexpected on Hurricane Assignments*” which addresses setting expectations, discipline, perspective and identity; and “*Incident Management Team Activities on Hurricanes*” which addresses people management, staging, ordering, IMT organization, unified command, plans and logistics, information, fatigue, FEMA and ICS.

# Home Unit Preparedness

**Mississippi National Forests Hurricane Plan** – If your home unit is located in an area that may be impacted by hurricane activity, consider looking at this unit plan to make one of your own.

**Mississippi Forests Hurricane Supply List** – This list will enable your team to build a basic supply cache for either international or U.S. assignments.

**USDA Employee Emergency Response Guide** – This guide contains plans for a multitude of scenarios and several website addresses for additional information.

**Aviation Crash Rescue and Response Plan** – This fill-in-the-blank template was developed to support a clear and rapid response to aviation emergencies.

**Project Aviation Safety Plan** – This template form is easily modified to use during home unit and off-home unit assignments.

**Hurricane Katrina Anderson’s PNW IMT-AAR Rollup** – Read this team’s experience as they provided support for the New Orleans Fire Department while the home unit regained its strength to respond to fires.

**County Staging Operations Organization PowerPoint Presentation** – Optimum organization of Points of Distribution (aka PODs) is illustrated in this presentation that explains and simplifies the process of delivering ice, water and food to the public.

**Hurricane Isabel: The National Park Service Response** – At the outset of the National Park Service response to the damage inflicted on a host of Eastern parks by Hurricane Isabel in September 2003, a decision was made to prepare a report on that response. Read about how these units prepared and what they de-

cided to do differently the next time.

**Hurricanes Katrina/Rita Area Command-Final Narrative-10/11-11/01/05** – Area Command Teams have had multiple all-hazard assignments. In this report ACT #3 records recommendations on the use of wildfire management teams on all-hazard incidents.

**2004 Florida Traffic Volumes** – In this 19-page PowerPoint Presentation, Florida’s Department of Transportation depicts the challenges of evacuation planning on a multi-state level of routes that could include already damaged infrastructure.

**Georgia Department of Transportation Hurricane Plan** – In preparation for the 2005 hurricane season, this state agency shared their plan for contra-flow directions to assist motorists evacuating the area.

**Long Term Action Planning Guide** – While assigned to the Exotic Newcastle Disease Incident, members of this California Incident Management Team took a hard look at long term planning producing this white paper and worksheet to guide their process. If your incident has unexpected complications or duration, this tool may help you.

**Region 8 Continuity of Operations Plan** – The Washington Office has recommended that all units, including Regional Offices, Research Stations and the Forest Products Laboratory, create a Continuity of Operations Plan (COOP). This file contains a detailed outline of a COOP that will assist you in organizing for an incident requiring evacuation and re-establishment of your home unit office and personnel. An example of this COOP is also filed on Region 8’s All Hazard Response Guide pages.

**Severe Weather Contingency Planning In-brief Packet** – This package compiles four products used to plan for violent weather during incidents. Combining the task list, a contingency planning

model, a revised version of the PopPro Assessment checklist and an example of an ACT summary sheet, this one document will be able to help you work through the myriad of details involved in planning on this scale.

**Area Command Team Severe Weather Evacuation Plan –** Planning for multiple teams to evacuate or shelter-in-place requires intensive planning. This document produced by an ACT during Hurricane Katrina, may help you to plan more quickly should severe weather be heading your way.

**Special Incident Safety Plan –** This document prepared by the Georgia Forestry Commission Incident Management Team was completed to meet the specific hazards of a unique assignment. This team was assigned to provide management of the logistical support for Law Enforcement assigned to the G 8 Summit. A comprehensive safety plan was introduced at the initiation of their assignment.



A Community Point of Distribution set up at a church in Pearl River County Mississippi in the aftermath of Hurricane Katrina.

**Rhodes Area Command Team AAR Rollup** – This document, done in table format, depicts the specific challenges, solutions and lessons recorded by several teams. The document includes mission assignments by group and comments. An excellent overview of what you may be involved in, this table provides a comprehensive “big picture” outlook.

**Region 5 Lessons Learned 2005** – Fire and Aviation Management officials met in November 2005 to discuss successes, challenges, unresolved issues and training needs stemming from their experiences during the U.S. Forest Service’s support during hurricanes Dennis, Katrina, Rita and Wilma. For the most compelling points arising from that meeting, read this comprehensive report.

**American National Red Cross** – The Red Cross is “a humanitarian organization led by volunteers and guided by its Congressional Charter and the Fundamental Principles of the International Red Cross Movement, (that) will provide relief to victims of disasters and help people prevent, prepare for and respond to emergencies.” Read more about how we work with Red Cross volunteers during all-hazard events.

# What to Take / What to Expect

**What to Bring to an All-Hazard Assignment** – This letter from the National Multi Agency Coordinating Group dated Sept. 3, gave valuable direction to those being assigned to the Hurricane support effort in 2005.

**Job Hazard Analysis for Hurricane Support** – Review the general hazards and abatement actions for hurricane support assignments.

**Fatigue Awareness and Management PowerPoint Presentation** – This presentation done by the Missoula Technology & Development Center addresses the myths and realities of fatigue and techniques for managing it.

**Fatigue and Resistance to Disease** – The *Wildland Firefighter Health & Safety Report* Spring 2004 issue reviews the important factors in work and rest, energy and nutrition for maintaining optimum health during long emergency response events.

**Immunization Recommendations for Emergency Responders** – To get the most updated information on required and recommended immunizations for the area where you are assigned, you should visit the Centers for Disease Control web site at [www.cdc.gov](http://www.cdc.gov)

**All Risk Critical Incident Stress – The Meaning of Assistance** – What you need to know and what you need to share if you are responding to a large scale critical incident . . . what assistance means to everyone.

**2004 Florida Traffic Volumes** – In this 19-page PowerPoint Presentation, Florida's Department of Transportation depicts the challenges of evacuation planning on a multi-state level of routes that could include already damaged infrastructure.

Arriving supplies are checked in at the Logistical Staging/ Operations Staging Area set up at the John C. Stennis Space Center in 2005.



**Georgia Department of Transportation Hurricane Plan** – In preparation for the 2005 hurricane season, this state agency shared their plan for contra-flow directions to assist motorists evacuating the area.

**National IC-AC After Action Meeting 2005** – Incident and Area commanders met late in 2005 to discuss recommendations they would make regarding implementation of the National Response Plan. In this document, the commanders note that the plan’s concept of operations needed to be expanded to more clearly define roles, expectations and responsibilities particularly as they relate to ESF-4.

**Rhodes Area Command Team AAR Rollup** – This document, done in table format, depicts the specific challenges, solutions and lessons recorded by several teams. The document includes mission assignments by group and comments. An excellent overview of what you may be involved in, this table provides a comprehensive “big picture” outlook.

**Region 5 Lessons Learned 2005** – Fire and Aviation Management officials met in November 2005 to discuss successes, challenges, unresolved issues and training needs stemming from their experiences during the U.S. Forest Service’s support during hurricanes Dennis, Katrina, Rita and Wilma. For the most compelling points arising from that meeting, read this comprehensive report.

**American National Red Cross** – The Red Cross is “a humanitarian organization led by volunteers and guided by its Congressional Charter and the Fundamental Principles of the International Red Cross Movement, (that) will provide relief to victims of disasters and help people prevent, prepare for and respond to emergencies.” Read more about how we work with Red Cross volunteers during all-hazard events.



Basic civil support systems were interrupted in the aftermath of Hurricane Katrina in the gulf side community of Pass Christian, Mississippi. Arriving law enforcement officers helped to secure the area, but emergency responders should realize that these usually strong support systems are fractured in similar events.

# *The Meaning of Assistance*

By

Jeffrey T. Mitchell, Ph.D., CTS

President of the International Critical Incident Stress Foundation

**NOTE:** This document is posted on the Wildland Fire Lessons Learned website and included here as part of the All-Hazard toolbox.

In these terrible times everyone wants to know what to do to help. They want to assist the victims of our national tragedies. They want to assist fire, rescue and law enforcement personnel. They want to assist their neighbors, their friends and their families. And, in reality, they also want to help themselves. Here is one way to look at *assistance*.

**A** Assurance. People need lots of assurance now. They need to be assured that government agencies are doing everything humanly possible to prevent further terrorist events. And they need to know that every effort is being made to find and bring to justice the murderers of thousands of innocent people. People need to know that they are loved and cared for and that they mean something to somebody else. Do not be afraid to assure the people in your lives that they are cherished.

**S** Security. Children need to know that they are secure within their families. Individuals and families must adjust to the threats that exist during this time of war. They should know that following some common sense rules and the guidelines offered by security experts in the law enforcement agencies could enhance every person's safety.

**S** Structure. An antidote to chaos and confusion is structure. Families, individuals and even business and organizations should be encouraged to maintain routines and structures. Work times, eating

times, sleeping times and family times should be encouraged. Now is a time to pull together for the common good. Structure enhances strength and stamina in the face of danger.

***I*** Information. People need current, accurate and practical information. Information is a great anxiety reducer. It reassures, it guides, it strengthens, it assists, it supports and it encourages people in all walks of life.

***S*** Support. Most people in a catastrophe need support and guidance, not psychotherapy. Crisis intervention is a non-intrusive, comprehensive, systematic and multi-part package of interventions that renders support to people struggling through a crisis. Let us use our crisis intervention skills well. We can make a difference.

***T*** Truth. The terrorists are expert at lying. Telling the truth is essential if we want to win the war on terrorism. The government needs to tell the citizens the truth even when it is not good news. Businesses need to tell the truth. So do churches, organizations and families. It is understandable that some secrets have to be kept, but when something is told it must be the truth. Trust can be maintained only when truth is at the core of communications.

***A*** Action. Be part of the effort. Be vigilant. Report criminal or suspicious behavior. Write a check. Help a neighbor. Check on the elderly. Volunteer for service. Tread a book to a frightened child. Write a letter to a rescuer or to a soldier. As Franklin D. Roosevelt once said, “Try something.”

***N*** Neutralize. Counter rumors with facts. It is normal to have negative feelings in these tough times. But, let’s not get stuck in those feelings. Put up opposition to the “nay-sayers” and pessimists. We have been wounded, not killed. We are a strong nation. Our core

principles are good. We are a nation that has been born in adversity; has grown through periods of national pain and has been tested in the fires of previous wars. We put our trust in God. Instead of saying “It will never work” we need to be saying “What do we need to do to make this effort successful?”

**C** Courage. All of us must have some courage. Wars are not usually won by single extraordinary events. They are won by a vast collection of small individual acts of courage. In our current circumstances we need plenty of tiny bits of courage. It takes courage to turn in a person who generates a hoax that frightens people and ties up law enforcement personnel with unnecessary work. It takes courage to stop using drugs when it is know that the illegal drug profits support terrorist groups around the world. It takes courage to be supportive of our emergency services and military personnel. It takes courage to stand up and do the right thing. Let us have courage as we face the turmoil and dangers ahead.

**E** Encourage. To win the war we must encourage each other. Be a listening ear. Offer guidance and support. Spend time with people you like. Spend less time watching the horrible events on the news. Maintain the rhythm of your life as normal as possible. Seek help if you need it. Smile and laugh when you can. Be positive and enthusiastic about something. Look out for one another. Refer a person who is having trouble healing from the tragedies to a competent mental health professional. As awful as things are now they can be better again, but only if we are dedicated to recovery and renewal.



# Guiding our response: Our history in All-Hazard

## **Forest Service Personnel at the San Francisco Earthquake –**

This letter written by Ranger Edward T. Allen one week after the 1906 earthquake depicts his response and first-hand observations of the disaster and aftermath. The letter was addressed to the Forester, Gifford Pinchot.

## **Foundational Doctrine For All Hazard Response –**

The U.S. Forest Service doctrine defines the spectrum of our mission and role in all-hazard response.

**Foundational Doctrine Guiding All-Hazard Response in the U.S. Forest Service –** The collection of principles and beliefs that form the foundational doctrine for U.S. Forest Service response in the all-hazard arena.

**Forest Service Crews Help Evacuees (AKA “The Green Pants Article”)** – At an evacuee shelter in Texas during the 2005 Hurricane season, this article was written about the wildland fire community’s assistance. These crews epitomized the wildland fire community’s response during this season.

**Scratchline Issue 14 Special Edition on Hurricane Response 2005 –** Compiled from more than a dozen After Action Review Rollups from teams who were involved in this hurricane season, this issue of *Scratchline* captures many of the new lessons team members learned and some of the recurring themes in all-hazard response.

**Wildland Firefighters are Backbone of Relief Efforts –** In this release by an Area Command team responding to the hurricane season of 2005, the historic deployment of wildland fire community members is documented.

**Wildland Fire Assignments** – A history of supporting all-risk incidents by wildland fire personnel is documented in these statistics compiled from 1985 to 2006.

**Hurricanes Katrina/Rita Area Command-Final Narrative-10/11-11/01/05** – Area Command Teams have had multiple all-hazard assignments. In this report ACT #3 records recommendations on the use of wildfire management teams on all-hazard incidents.

**ICS Unified Command Technical Assistance** – This document provides guidance to all responders who are part of the National Response System led by a Unified Command for emergency response.

**National Response Plan Emergency Service Functions** – A list of the Emergency Support Functions (ESFs) involved in national level emergency response can be helpful in determining the roles they serve in.

**National Response Plan Acronyms and Definitions** – This list of the NRP's acronyms comes in a table format with definitions for each of the letter designators. Although not all of these departments will be present at a hurricane response, more of them than you would expect could show up.

**Delegation of Authority-Mission Assignment from FEMA** – This delegation of authority presented during the 2005 hurricane season, is a sample of how a mission assignment from FEMA to an Incident Management Team could be worded.

**Recommended ICS 209** – The ICS 209 form appears here as an Incident Status Summary for hurricane or other all-hazard events.

**Long Term Action Planning Guide** – While assigned to the Exotic Newcastle Disease Incident, members of this California Incident Management Team took a hard look at long term planning producing

this white paper and worksheet to guide their process. If your incident has unexpected complications or duration, this tool may help you. (86.5 KB)



Relief workers during the 2005 hurricane season represented nearly 100 different agencies and came from both government and non-government sectors. Photo is at a relief station in Mississippi.

---

## **How the U.S. Forest Service Responded in 1906 to the San Francisco Earthquake**

During a recent research project, a historian at the Stanislaus National Forest found a letter written one week after the 1906 San Francisco earthquake by Ranger Edward T. Allen in which he reported his first-hand observations of the disaster response to the Forester, Gifford Pinchot.

The historian writes: Allen would have known that Pinchot valued direct field reports and that he would be keenly interested in how his field officers responded to the calamity. Pinchot took opportunities for his new, national agency – the Forest Service – to prove itself useful and dedicated to public service. The earthquake occurred before the general reorganization of the Forest Service that established a District (Regional) Office in San Francisco. Allen was stationed in Sacramento and was in that city when the quake hit.

The letter provides a wonderful window into the past of how the fledgling Forest Service perceived and began to shape its role in disaster response on land it did not manage.

Some explanatory notes:

The “Mr. Marshall” referred to by Allen was undoubtedly Col. Robert Bradford Marshall. Marshall later became Chief Geographer for the USGS. In that post, in 1919, he proposed a plan to build storage reservoirs along the Sacramento River system, and transfer water from the Sacramento Valley to the San Joaquin Valley through two large canals on both sides of the Sacramento River. Marshall pitched his plan to California’s governor, believing that the state needed to embark on a comprehensive water plan. Marshall is, therefore, referred to as “The Father of the Central Valley Project.”

“Cox” was probably William T. Cox who, by 1910, was an Assistant Forester.

At least two men associated with the Stanislaus National Forest are mentioned in Allen’s report: Stuart J. Flintham and Robert W. Ayres. Both were to be Forest Supervisors on the Stanislaus: Ayres following Flintham in that post in 1908.

United States Department of Agriculture  
Forest Service  
Sacramento, April 25, 1906

Forest Service Inspection:  
May 3, 1906, RECEIVED

The Forester,  
Washington, D.C.

Sir:

I have the following to report concerning the fire and earthquake situation in San Francisco, and the action of the Forest Service in the matter. This is the first opportunity I have had to reach my office or, indeed, to take the time to write.

The earthquake, which occurred at 5.15 a.m. April 18, was disconcerting enough in Sacramento, but did no damage because the town is built on deep yielding soil which acted like a cushion and turned the shocks into sickening swings rather than the sharp quick jars which destroy buildings. It was difficult to keep ones feet for some time, and very generally induced nausea, but nothing was wrecked.

For this reason we did not apprehend the disaster which had overtaken the nearby cities, and when later in the day all sorts of rumors spread about the condition of San Francisco, we supposed them exaggerated. There was no direct telegraph or telephone communication with bay points, and we suspected the roundabout messages by way of Chicago of being ill-founded. Early in the afternoon it seemed quite certain that much havoc had been created by the shock itself, but it was late at night before we learned absolutely that the fire was serious.

My father and mother were in the city, having gone to see my Mother's relatives and to consult a physician about my father's condition, and naturally my first concern was about

them, especially because of my father's tendency to become excited. I therefore took the first train the morning following and, after all sorts of delays, succeeded in getting a pass through the military lines and into the city about an hour before dark. All that night and the next day I spent finding my people and getting them through the ruins to the ferry and to Sacramento, where I arrived late Friday night. Finding the town overrun with refugees, destitute, starving and utterly exhausted, I went home only long enough to put the old folks to bed and went to work with the local relief committee for the rest of the night and most of the time since.

In the meanwhile, I was in San Francisco, Mr. Marshall who has charge of the Geological Survey locally, had volunteered his help to the Governor's office, suggesting an expedition to San Francisco to help the destitute to make themselves comfortable. Food shortage was inevitable for a time but this was the least serious feature. The streets, burned ground, and vacant lots were swarming with homeless of all ages and conditions, distracted and exhausted. Many were unclad, most had no bedding, and few knew how or had the strength to fix up anything like shelter or places to cook the little food available. It was Mr. Marshall's plan to help this class make camps or shelters. He found that it was impracticable to try to get into the city independently, so he arranged with the Sacramento Relief Committee to get his part in by boat from here on Saturday. Saturday morning I consulted with him about our entering the same work. He said his arrangements were made and that the boat was about to start, and that the thing for me to do was to take it up with the Committee to secure passports to follow when the men should arrive.

I therefore went to the Committee and told them we had six to ten available trained campers, at least, and that I would wire you to permit them to volunteer, provided

(a) That the Committee would insure getting them where they

could work.(b) That the Committee would ask me for their assistance, since I did not want to take the responsibility of getting them in unless they were needed.

It seemed to me there were two main points to consider—could we get into the city and work without interference from the military and, if not, were we needed badly enough anywhere else to make it pay.

The committee jumped at the offer, but turned the proposition in effect. They said all advices indicated that from 10,000 to 15,000 refugees would be dumped in Sacramento within the next two or three days, and that this city would be swamped. No soldiers were available, all being ordered to the bay cities, and that Sacramento would be without tents or camps to handle the crowd; all this making it imperative that we get every possible man who could be of use in camp work. The Committee wanted the men to be brought here and the, if not needed, to be sent on to San Francisco.

I had my doubts about this, but thought it well enough to mobilize here anyway, so wired you to authorize the men. I knew there was work in the city if we could get there, and this they insured. Bear in mind, that all this time it was impossible to communicate with anyone in San Francisco by wire or Telephone, and that the Committee was the official source of information.

All looked encouraging, then, until about three Sunday morning, when to my horror, the Survey party sent a man back to report that the expedition had failed and was returning. He hardly knew what the trouble was, except that the military authorities at the presidio had turned them back. I went at once to the telegraph office and wired all the men to stop for further instructions, but this message failed to catch any of them before they had started. Later we found that Marshall had landed at the Presidio wharf, left his steamer load of tents and provisions in charge of a guard and the Captain, and gone to the military headquarters to report and get authority. The

officers in charge told him the army was running things to suit itself and efficiently and there was no need for civilian help, and that he had better go back to Sacramento. Finding that he could do nothing in this way, he started back for the boat with the intention of trying some other scheme, only to find that the soldiers at the wharf had forcibly confiscated his entire outfit. He barely got enough provisions for a lunch and had to see the rest shipped out all over the city to the military camps. Then there was nothing to do, of course, but to come back. He was homeless like everybody else.

Then our men began to arrive. Cox had been here all the time, working night and day with the refugees here. The outsiders who came were Kent, Hatton, Lull, Ayres, Von Wernstad, Wheaton, Smith, Wilson. The Committee here was still having a hard time with the refugee crowd, but so far managing to house everybody in halls, pavilions and churches. Seeing danger of being swamped any hour, it called on me to establish a camp at Sutter's fort. I agreed on one condition, that they would pass two men into the city for me to report on the chance of doing independent work there by sneaking in singly through the regular ferry with Red Cross or other passes, and, if we could do more this way, we were to help with the Sacramento camp only as much as we wanted to.

This went, and Kent and Lull went to the city, while I arranged to fit a camp with commissary, sleeping quarters, laundry, baths, etc., to go at it the next morning. The next morning, however, a local man who wanted the glory, persuaded the Committee that he was the only man to handle the thing and they told us they didn't want us to take charge, although they would like to have us help out generally. Next Kent and Lull, got back, after a very hard trip, and reported that the conditions in the city were improving rapidly, and the difficulty of working independently of the army so great, that they did not advise trying to go in. I saw no use in our staying here to do messenger work for the Sacramento Committee, so I

sent the men back into the field, all getting away last night or this morning. Flintham came in last night, having received the call late, and is here today.

The tents are coming in today, perhaps 10 or 12 of them, and are in great demand, but I shall not let them go unless I know what is to become of them.

The whole plan has failed utterly. It has been somewhat expensive, although not so much so as you would expect, because many of the men were to pass through here anyway soon and Kent managed to make a great deal out of seeing them here. Yet I do not see that anyone is at all to blame except the Sacramento Relief Committee and the Army. There was, and is yet, a great deal of suffering which we could do more than any other class of men to alleviate. There was every reason to believe it would grow worse instead of better, as it has. So far as Marshall or I could learn from the authorities, they not only would give us a chance, but wanted us badly. But the friction between civil and military, and the general lack of organization in the relief work, kept us from reaching the city where we were most needed, and the Sacramento situation did not become as serious as everyone expected it would. Anyway, it was better to do our best than to do nothing, and it is always better to take precautions which may not be needed than to need them and not be ready.

Very respectfully,

***E.T.Allen***

'FEMA Mobilization Center' is a title for many varied missions. Under FEMA's direction, a team could be assigned to Truck Parking, Warehousing and Warehouse Management, maintaining a Base Camp for Rescuers or maintaining a Base Camp for Evacuees. Because Mobilization Centers most frequently handle trucks of commodities on a large scale, this section will contain many of the tools developed by teams to work with these resources effectively.

**Team Assignment to Mobilization Center** – In this note to team members, an Incident Commander prepares colleagues for the assignment ahead.

**Mobilization Center Operating Plan Template** – This template is easily modified by filling in the blanks to identify local needs and conditions.

**Mobilization Center Operating Plan Appendices** – An accompanying document to the Mobilization Center Operating Plan Template listed above, this document contains additional tools to support team members working in this arena.

**Mobilization and Staging Center Guide** – This fill-in-the-blank guide will walk you through the operation and specifics for three levels of mobilization.

**Instructions to Staged Crews Template** – This template makes it easy to update staged crews on their responsibilities while waiting for reassignment.

**Instructions to Staged Bus Drivers Template** – A fill-in form allows easy transmission of important directions to bus drivers

staged and waiting for reassignment.

**IMT Hurricane Briefings** – If you think your team may be given a logistical or operational staging operation to manage, you’ll want to review this document. Many of the rules for success are defined in this briefing document and at least two of the truck tracking records you will need are here.

**All-Risk Lessons Learned PowerPoint Presentation** – This presentation covers many of the watchout situations experienced by the Rocky Mountain IMT that served in San Antonio, Texas during Hurricanes Katrina and Rita.

**Barksdale Mob Center Evacuation Plan** – The IMT in place at Barksdale Air Force Base in 2005 as Hurricane Rita approached, wrote this plan to ensure the safety of personnel and secure the



Wildland fire hand crews dealt with multiple challenges in their field duties during the 2005 hurricane season. This photo is of MOCC4 crews working in the southern counties of Mississippi.

MOB Center. An Accompanying document, Barksdale Air Force Base Evacuation Route, illustrates the system evacuating personnel will follow.

**Barksdale Mob Center Evacuation Route** – This map supplements the Barksdale Evacuation Plan providing evacuating personnel with routes to safety.

**Barksdale Mob Center Transfer of Command** – This is an example of a comprehensive transfer of command document to an incoming team operating in a FEMA structured environment.

**Forklift Refresher** – Often needed during response to all-hazard incidents, this refresher course on safe operations for forklift operators includes hazard identification and a safety checklist to facilitate hands-on training.

**Forklift Refresher Certificates** – This certificate of training completion template allows instructors to recognize trainees for their participation in the course.

**Forklift Operation Job Hazard Analysis** – This is a job hazard analysis of forklift operation including hazards and abatement actions while transporting loads and loading and unloading of trucks and trailers.

**Forklift Operations Safety Message** – Forklifts are ever present during hurricane response. If you are involved in performing tasks with and around forklifts, take a moment to read this message so that you will be alert to the hazards.

**County Staging Operations Organization PowerPoint Presentation** – Optimum organization of Points of Distribution (aka PODs) is illustrated in this presentation that explains and simplifies the process of delivering ice, water and food to the public.



Storm damage was extensive during the 2005 hurricane season.

**Federal Commodity Receiving Station Guidelines** – Developed by a team that became intimately involved in the process of receiving and distributing commodities in hurricane impacted areas, this operational guideline presents an outline of the activity. Many other tools here will complement this organizational document.

**Hurricane Katrina-Meridian NAS OSA-Lessons Learned** – This team’s assignment as an operational staging area had challenges in truck check-in and coordination with county-level Emergency Operations Centers (EOCs) and the subsequent Points of Distribution (PODs). Read how they placed team members strategically to ensure a successful operation.

**Hurricane Rita Response-Bennett’s Northern Rockies IMT AAR Rollup** – This team experienced a multi-tasked assignment that including logistical support, operations support and a base camp for responders simultaneously. Their lessons and challenges are documented in this rollup.

**Long Term Action Planning Guide** – While assigned to the Exotic Newcastle Disease Incident, members of this California Incident Management Team took a hard look at long term planning producing this white paper and worksheet to guide their process. If your incident has unexpected complications or duration, this tool may help you.

**LSA-Mobile** – This document supports the use of LSA-Mobile, an integrated Mobile Module of the LSA Trailer Tracking Application. It was developed to track receiving and distribution of supplies in support of natural disaster relief efforts.

**LSA Issues** – How many times have we wished that we knew what “issues” we would have when we got involved in something new? This document is literally a conversation between two individuals who were working with the LSA-Mobile. Their notes may clue you in to possible shortcomings of the system before you have to start making the system work.

**LSA-PC** – This zip file contains the software files and two examples of truck tracking databases. One of the examples of the tracking database is from Florida’s Blue Team. If your team is being assigned to coordinate a large number of commodities, you may want to take a look at the tools this and other teams are using.

**Use of Trailer Seals to Facilitate Tracking** – Experience with tracking thousands of trucks of commodities dictates that finding a more efficient way to do it is paramount to success. Read about this team’s recommendation for using color-coded trailer seals as indicators for what the truck contains and prove that it has not been opened since it was dispatched with its load.

**DOD Radio Frequency Identifier Policy 10-2-03** – This PDF file contains the background and requirements determining the use of Radio Frequency Identifiers, also known as bar codes, in the DOD Supply Chain.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**Maxwell AFB Mobilization Center Guide** – This document goes a bit beyond the generic Mob Center Field Guide. The author for this document notes that the mobilization plan is only useful if its available and utilized from the very beginning, so you may want to download it and carry it with you just in case.

**Maxwell AFB Mobilization Center Incident Risk Analysis** – This 215A completed by an Incident Management Team assigned to the location during the 2005 hurricane season depicts the hazards and mitigations this team found on their assignment.



Wildland fire hand crews have often been assigned to assist in the operations of Points of Distribution where ice, fresh water and MREs are distributed by the government and where local relief groups co-locate to provide other foodstuffs and needed items.

**Maxwell Air Force Base Facilities Map** – This document gives incoming resources a bird’s eye view of the routes and facilities of Maxwell Air Force Base as its use as a FEMA Mobilization Center during Hurricane Dennis.

**Maxwell AFB Mobilization Center Traffic Flow** – This map, developed for staging trucks at the mobilization center, is one of the first tools an incoming team will use if they are assigned to this location.

**Maxwell AFB Transition and Demobilization Plan** – This document provides a template for planning the transition and/or demobilization of a Mobilization Center based at Maxwell Air Force Base.

**Rhodes Area Command Team AAR Rollup** – This document, done in table format, depicts the specific challenges, solutions and lessons recorded by several teams. The document includes mission assignments by group and comments. An excellent overview of what you may be involved in, this table provides a comprehensive “big picture” outlook.

**Hurricane Ivan 2004 Rhodes Area Command Team** – This final narrative gives an overview of the challenges faced by three Incident Management Teams deployed to Florida under Rex Mann’s Area Command Team (ACT) #4 for Hurricane Frances operations and the threat of Hurricane Ivan’s approach when a second Area Command Team was activated at the request of FEMA.

**ESF-4 Remedial Action Form** – A fill-in-the-blank template, this is FEMA’s form 85-52 that will help you to document significant issues and discuss possible resolutions and then pass them on to FEMA officials.

**Hurricane Isabel 2004 FEMA AAR** – This document is an

example of the Southern Area Incident Management Team's after action review material captured on FEMA's form 85-52. This may be what you will need if you are asked to submit review material on one of your assignments to FEMA.

**Severe Weather Contingency Planning In-brief Packet** – This package compiles four products used to plan for violent weather during incidents. Combining the task list, a contingency planning model, a revised version of the PopPro Assessment checklist and an example of an ACT summary sheet, this one document will be able to help you work through the myriad of details involved in planning on this scale.

**Area Command Team Severe Weather Evacuation Plan** – Planning for multiple teams to evacuate or shelter-in-place requires intensive planning. This document produced by an ACT during Hurricane Katrina, may help you to plan more quickly should severe weather be heading your way.

**Special Incident Safety Plan** – This document prepared by the Georgia Forestry Commission Incident Management Team was completed in order to meet the specific hazards of a unique assignment. This team was assigned to provide management of the logistical support for Law Enforcement assigned to the G 8 Summit. A comprehensive safety plan was introduced at the initiation of their assignment.

**Ask for Feedback Safety Message** – The author of this safety note reminds us all that feedback is a critical element for remaining alert and aware. On this message is listed the five communication responsibilities all firefighters have.

**National IC-AC After Action Meeting 2005** – Incident and Area commanders met late in 2005 to discuss recommendations they would make regarding implementation of the National Response Plan. In this document, the commanders note that the plan's

concept of operations needed to be expanded to more clearly define roles, expectations and responsibilities particularly as they relate to ESF-4.

**Region 5 Lessons Learned 2005** – Fire and Aviation Management officials met in November 2005 to discuss successes, challenges, unresolved issues and training needs stemming from their experiences during the U.S. Forest Service’s support during hurricanes Dennis, Katrina, Rita and Wilma. For the most compelling points arising from that meeting, read this comprehensive report.

We are all  
Safety Officers -  
- some of us are  
designated.



# Logistical Staging Areas

**IMT Hurricane Briefings** – If you think your team may be given a logistical or operational staging operation to manage, you’ll want to review this document. Many of the rules for success are defined in this briefing document and at least two of the truck tracking records you will need are here.

**Hurricane Rita Response-Bennett’s Northern Rockies IMT AAR Rollup** – This team experienced a multi-tasked assignment that including logistical support, operations support and a base camp for responders simultaneously. Their lessons and challenges are documented in this rollup.

**County Staging Operations Organization PowerPoint Presentation** – Optimum organization of Points of Distribution (aka PODs) is illustrated in this presentation that explains and simplifies the process of delivering ice, water and food to the public.

**Forklift Refresher** – Often needed during response to all-hazard incidents, this refresher course on safe operations for forklift operators includes hazard identification and a safety checklist to facilitate hands-on training.

**Forklift Refresher Certificates** – This certificate of training completion template allows instructors to recognize trainees for their participation in the course.

**Forklift Operation Job Hazard Analysis** – This is a job hazard analysis of forklift operation including hazards and abatement actions while transporting loads and loading and unloading of trucks and trailers.

**Forklift Operations Safety Message** – Forklifts are ever present during hurricane response. If you are involved in performing tasks with and around forklifts, take a moment to read this message so

that you will be alert to the hazards.

**Federal Commodity Receiving Station Guidelines** – Developed by a team that became intimately involved in the process of receiving and distributing commodities in hurricane impacted areas, this operational guideline presents an outline of the activity. Many other tools here will complement this organizational document.

**Hurricane Katrina-Meridian NAS OSA-Lessons Learned** – This team’s assignment as an operational staging area had challenges in truck check-in and coordination with county-level Emergency Operations Centers (EOCs) and the subsequent Points of Distribution (PODs). Read how they placed team members strategically to ensure a successful operation.

**LSA-Mobile** – This document supports the use of LSA-Mobile, an integrated Mobile Module of the LSA Trailer Tracking Application. It was developed to track receiving and distribution of supplies in support of natural disaster relief efforts.

**LSA Issues** – How many times have we wished that we knew what “issues” we would have when we got involved in something new? This document is literally a conversation between two individuals who were working with the LSA-Mobile. Their notes may clue you in to possible shortcomings of the system before you have to start making the system work.

**LSA-PC** – This zip file contains the software files and two examples of truck tracking databases. One of the examples of the tracking database is from Florida’s Blue Team. If your team is being assigned to coordinate a large number of commodities, you may want to take a look at the tools this and other teams are using.

**Use of Trailer Seals to Facilitate Tracking** – Experience with tracking thousands of trucks of commodities dictates that finding a

more efficient way to do it is paramount to success. Read about this team's recommendation for using color-coded trailer seals as indicators for what the truck contains and prove that it has not been opened since it was dispatched with its load.

**DOD Radio Frequency Identifier Policy 10-2-03** – This PDF file contains the background and requirements determining the use of Radio Frequency Identifiers, also known as bar codes, in the DOD Supply Chain.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**Forklift Operations Safety Message** – Forklifts are ever present during hurricane response. If you are involved in performing tasks with and around forklifts, take a moment to read this message so that you will be alert to the hazards.

**Traffic Control Night Operations Safety Message** – This message developed during the 2005 hurricane season, discusses hazards to be aware of during the night shift on traffic control duty.

**OSA-LSA 2005 Hurricane Dennis AAR** – Read the after action review of a team co-located at a site where the two teams present were given different FEMA assignments. What worked and what didn't is covered in this operational review.

**Hurricane Ivan 2004 Rhodes Area Command Team** – This final narrative gives an overview of the challenges faced by three Incident Management Teams deployed to Florida under Rex Mann's Area Command Team (ACT) #4 for Hurricane Frances operations and the threat of Hurricane Ivan's approach when a second Area Command Team was activated.

**ESF-4 Remedial Action Form** – A fill-in-the-blank template, this is FEMA’s form 85-52 that will help you to document significant issues and discuss possible resolutions and then pass them on to FEMA officials.

**Hurricane Isabel 2004 FEMA AAR** – This document is an example of the Southern Area Incident Management Team’s after action review material captured on FEMA’s form 85-52. This may be what you will need if you are asked to submit review material on one of your assignments to FEMA.

**Severe Weather Contingency Planning In-brief Packet** – This package compiles four products used to plan for violent weather during incidents. Combining the task list, a contingency planning model, a revised version of the PopPro Assessment checklist and an example of an ACT summary sheet, this one document will be able to help you work through the myriad of details involved in planning on this scale.

**Jackson Support Base Evacuation Plan** – This packet addresses priorities identified in case of tornado activity and a camp equipment evacuation time table. Personnel accountability is highlighted in this short version of an exit plan during severe weather events.

**Stennis OSA-LSA Severe Weather Evacuation** – This team working at a large combination staging area and personnel base camp had unique challenges to consider when planning an evacuation. If you are asked to be involved in severe weather contingency operations you may want to look at this document for tips on successful planning.

**Saints Base Camp Severe Weather Safety Plan** – This document describes the procedures and activities necessary to safely and effectively protect and possibly evacuate personnel working at the Saints Camp Base of Operations during hurricane season 2005.



Some residents returned to their home sites looking for salvageable belongings in the aftermath of Hurricane Katrina.

**LSA and Base Camp Evacuation Plan** – This document produced by co-located incident management teams operating at the Saufley Field Naval Air Station in Pensacola, Florida during Hurricane Ivan in 2004 covers the individual responsibilities of directors and unit leaders. It may provide you with ideas on building your plan.

**Night Operations Safety Message** – Night operations are a frequent occurrence during hurricane and other all-risk management operations. Encourage personnel to mitigate the risks associated with these circumstances.

**Ask for Feedback Safety Message** – The author of this safety note reminds us all that feedback is a critical element for remaining alert and aware. On this message is listed the five communication responsibilities all firefighters have.

**Region 5 Lessons Learned 2005** – Fire and Aviation Management officials met in November 2005 to discuss successes, challenges, unresolved issues and training needs stemming from their experiences during the U.S. Forest Service’s support during hurricanes Dennis, Katrina, Rita and Wilma. For the most compelling points arising from that meeting, read this comprehensive report.

## **Operational Staging Areas**

**IMT Hurricane Briefings** – If you think your team may be given a logistical or operational staging operation to manage, you’ll want to review this document. Many of the rules for success are defined in this briefing document and at least two of the truck tracking records you will need are here.

**Hurricane Rita Response-Bennett’s Northern Rockies IMT AAR Rollup** – This team experienced a multi-tasked assignment that including logistical support, operations support and a base camp for responders simultaneously. Their lessons and challenges are documented in this rollup.

**County Staging Operations Organization PowerPoint Presentation** – Optimum organization of Points of Distribution (aka PODs) is illustrated in this presentation that explains and simplifies the process of delivering ice, water and food to the public.

**Forklift Refresher** – Often needed during response to all-hazard incidents, this refresher course on safe operations for forklift operators includes hazard identification and a safety checklist to facilitate hands-on training.

**Forklift Refresher Certificates** – This certificate of training completion template allows instructors to recognize trainees for their participation in the course.

**Forklift Operation Job Hazard Analysis** – This is a job hazard analysis of forklift operation including hazards and abatement actions while transporting loads and loading and unloading of trucks and trailers.

**Forklift Operations Safety Message** – Forklifts are ever present during hurricane response. If you are involved in performing tasks with and around forklifts, take a moment to read this message so that you will be alert to the hazards.

**Federal Commodity Receiving Station Guidelines** – Developed by a team that became intimately involved in the process of receiving and distributing commodities in hurricane impacted areas, this operational guideline presents an outline of the activity. Many other tools here will complement this organizational document.



No matter where we are working during an all-hazard assignment, the mission is the same: get relief supplies to the residents of the impacted communities.

### **Hurricane Katrina-Meridian NAS OSA-Lessons Learned –**

This team’s assignment as an operational staging area had challenges in truck check-in and coordination with county-level Emergency Operations Centers (EOCs) and the subsequent Points of Distribution (PODs). Read how they placed team members strategically to ensure a successful operation.

**LSA-Mobile** – This document supports the use of LSA-Mobile, an integrated Mobile Module of the LSA Trailer Tracking Application. It was developed to track receiving and distribution of supplies in support of natural disaster relief efforts.

**LSA Issues** – How many times have we wished that we knew what “issues” we would have when we got involved in something new? This document is literally a conversation between two individuals who were working with the LSA-Mobile. Their notes may clue you in to possible shortcomings of the system before you have to start making the system work.

**LSA-PC** – This zip file contains the software files and two examples of truck tracking databases. One of the examples of the tracking database is from Florida’s Blue Team. If your team is being assigned to coordinate a large number of commodities, you may want to take a look at the tools this and other teams are using.

**Use of Trailer Seals to Facilitate Tracking** – Experience with tracking thousands of trucks of commodities dictates that finding a more efficient way to do it is paramount to success. Read about this team’s recommendation for using color-coded trailer seals as indicators for what the truck contains and prove that it has not been opened since it was dispatched with its load.

**DOD Radio Frequency Identifier Policy 10-2-03** – This PDF file contains the background and requirements determining the use of Radio Frequency Identifiers, also known as bar codes, in the DOD Supply Chain.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**Forklift Operations Safety Message** – Forklifts are ever present during hurricane response. If you are involved in performing tasks with and around forklifts, take a moment to read this message so that you will be alert to the hazards.

**PPE Fact Sheet for Flood Response Work** – The Safety Assistance Team in consultation with the Centers for Disease Control, and the National Institute for Occupational Safety and Health provided these guidelines and warnings to flood cleanup workers during the 2005 hurricane season.

**Traffic Control Night Operations Safety Message** – This message developed during the 2005 hurricane season, discusses hazards to be aware of during the night shift on traffic control duty.

**Hurricane Ivan 2004 Rhodes Area Command Team** – This final narrative gives an overview of the challenges faced by three Incident Management Teams deployed to Florida under Rex Mann’s Area Command Team (ACT) #4 for Hurricane Frances operations and the threat of Hurricane Ivan’s approach when a second Area Command Team was activated at the request of FEMA.

**ESF-4 Remedial Action Form** – A fill-in-the-blank template, this is FEMA’s form 85-52 that will help you to document significant issues and discuss possible resolutions and then pass them on to FEMA officials.

**Hurricane Isabel 2004 FEMA AAR** – This document is an example of the Southern Area Incident Management Team’s after

action review material captured on FEMA’s form 85-52. This may be what you will need if you are asked to submit review material on one of your assignments to FEMA.

**Severe Weather Contingency Planning In-brief Packet** – This package compiles four products used to plan for violent weather during incidents. Combining the task list, a contingency planning model, a revised version of the PopPro Assessment checklist and an example of an ACT summary sheet, this one document will be able to help you work through the myriad of details involved in planning on this scale.

**Holy Cross Severe Weather Preparedness Plan** – A team based in Louisiana during the 2005 hurricane season wrote this plan for personnel at the incident. It is one of many examples in this toolbox that may meet your need.

**Jackson Support Base Evacuation Plan** – This packet addresses priorities identified in case of tornado activity and a camp equipment evacuation time table. Personnel accountability is highlighted in this short version of an exit plan during severe weather events.

**Stennis OSA-LSA Severe Weather Evacuation** – This team working at a large combination staging area and personnel base camp had unique challenges to consider when planning an evacuation. If you are asked to be involved in severe weather contingency operations you may want to look at this document for tips on successful planning.

**Saints Base Camp Severe Weather Safety Plan** – This document describes the procedures and activities necessary to safely and effectively protect and possibly evacuate personnel working at the Saints Camp Base of Operations during hurricane season 2005.

**LSA and Base Camp Evacuation Plan** – This document produced by co-located incident management teams operating at the



Crews built signs of encouragement, including this one in Mississippi: “From the Indiana fire crews, Our prayers are with you.”

Saufley Field Naval Air Station in Pensacola, Florida during Hurricane Ivan in 2004 covers the individual responsibilities of directors and unit leaders. It may provide you with ideas on building your plan.

**Night Operations Safety Message** – Night operations are a frequent occurrence during hurricane and other all-risk management operations. Encourage personnel to mitigate the risks associated with these circumstances.

**Ask for Feedback Safety Message** – The author of this safety note reminds us all that feedback is a critical element for remaining alert and aware. On this message is listed the five communication responsibilities all firefighters have.

**Region 5 Lessons Learned 2005** – Fire and Aviation Management officials met in November 2005 to discuss successes, challenges, unresolved issues and training needs stemming from their experiences during the U.S. Forest Service’s support during hurricanes Dennis, Katrina, Rita and Wilma. For the most compelling points arising from that meeting, read this comprehensive report.

# Base Camp for Responders or Rescuers

**Hurricane Rita Response-Bennett’s Northern Rockies IMT AAR Rollup** – This team experienced a multi-tasked assignment that including logistical support, operations support and a base camp for responders simultaneously. Their lessons and challenges are documented in this rollup.

**All-Risk Lessons Learned PowerPoint Presentation** – This presentation covers many of the watchout situations experienced by the Rocky Mountain IMT that served in San Antonio, Texas during Hurricanes Katrina and Rita.

**Hurricane Rita-Texas Support-Molumby’s CA IMT AAR Rollup** – Supporting a base camp for people who are not familiar with this type of living can be a formidable challenge. Read how this team established a base camp in support of non-government employees and volunteers.

**Hurricane Katrina-Southern Area Incident Management Team-After Action Report** – This team went to the Louis Armstrong New Orleans International Airport where disaster medical assistance personnel were working in a field hospital. The team’s assignment evolved to become a field hospital, a special needs shelter and a short-term shelter for evacuees while they awaited transport. In addition, the team supported the multitude of responders.

**Katrina Hurricane Support-Sandman’s Northern Rockies IMT AAR Rollup** – Humanitarian support on a mass scale is what this team experienced during this assignment. The task involved sheltering of evacuees, caring for special needs evacuees and coordinating the efforts of a high number of responding personnel.

**Long Term Action Planning Guide** – While assigned to the Exotic Newcastle Disease Incident, members of this California Incident Management Team took a hard look at long term planning producing this white paper and worksheet to guide their process. If your incident has unexpected complications or duration, this tool may help you.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**PPE Fact Sheet for Flood Response Work** – The Safety Assistance Team in consultation with the Centers for Disease Control, and the National Institute for Occupational Safety and Health provided these guidelines and warnings to flood cleanup workers during the 2005 hurricane season.

**Traffic Control Night Operations Safety Message** – This message developed during the 2005 hurricane season, discusses hazards to be aware of during the night shift on traffic control duty.

**E Coli Bacteria Fact Sheet** – The best way to quell widespread alarm, is with good information. This fact sheet distinguishes fact from fiction about a common concern among responders and rescue workers. Read about how to limit the possibilities of becoming infected with the directions on this document.

**ESF-4 Remedial Action Form** – A fill-in-the-blank template, this is FEMA’s form 85-52 that will help you to document significant issues and discuss possible resolutions and then pass them on to FEMA officials.

**Hurricane Isabel 2004 FEMA AAR** – This document is an example of the Southern Area Incident Management Team’s after

action review material captured on FEMA's form 85-52. This may be what you will need if you are asked to submit review material on one of your assignments to FEMA.

**Severe Weather Contingency Planning In-brief Packet** – This package compiles four products used to plan for violent weather during incidents. Combining the task list, a contingency planning model, a revised version of the PopPro Assessment checklist and an example of an ACT summary sheet, this one document will be able to help you work through the myriad of details involved in planning on this scale.

**Holy Cross Severe Weather Preparedness Plan** – A team based in Louisiana during the 2005 hurricane season wrote this plan for personnel at the incident. It is one of many examples in this toolbox that may meet your need.

**Stennis OSA-LSA Severe Weather Evacuation** – This team working at a large combination staging area and personnel base camp had unique challenges to consider when planning an evacuation. If you are asked to be involved in severe weather contingency operations you may want to look at this document for tips on successful planning.

**Saints Base Camp Severe Weather Safety Plan** – This document describes the procedures and activities necessary to safely and effectively protect and possibly evacuate personnel working at the Saints Camp Base of Operations during hurricane season 2005.

**LSA and Base Camp Evacuation Plan** – This document produced by co-located incident management teams operating at the Saufley Field Naval Air Station in Pensacola, Florida during Hurricane Ivan in 2004 covers the individual responsibilities of directors and unit leaders. It may provide you with ideas on building your plan.

**Ask for Feedback Safety Message** – The author of this safety note reminds us all that feedback is a critical element for remaining alert and aware. On this message is listed the five communication responsibilities all firefighters have.

**Region 5 Lessons Learned 2005** – Fire and Aviation Management officials met in November 2005 to discuss successes, challenges, unresolved issues and training needs stemming from their experiences during the U.S. Forest Service’s support during hurricanes Dennis, Katrina, Rita and Wilma. For the most compelling points arising from that meeting, read this comprehensive report.

**American National Red Cross** – The Red Cross is “a humanitarian organization led by volunteers and guided by its Congressional Charter and the Fundamental Principles of the International Red Cross Movement, (that) will provide relief to victims of disasters and help people prevent, prepare for and respond to emergencies.” Read more about how we work with Red Cross volunteers during all-hazard events.

## **Evacuee Shelters or Base Camps for Evacuees**

**San Antonio Relief Operation PowerPoint Presentation** – During the Katrina/Rita Hurricane events, the Rocky Mountain IMT was asked to provide support for a large and complex relief operation. This 120-page presentation details their experience.

**Evacuee Check-in Accountability** – At the Vancleave Camp during Hurricane Katrina, several lessons were learned regarding efficient tracking of guests.

**Shelter Operation Incident Status Summary** – This ICS-209 is an example of how the form was manipulated for better use at the Vancleave Camp.

**Evacuee Shelter Cot-Set-up** – Did you ever wonder what the optimum set-up for sleeping 4,000 people is? This diagram shows how they managed it at Vancleave Camp.

**Evacuee Shelter T-Card Template** – An alpha/numeric organizing system was instrumental in the success of tracking evacuees at Camp Vancleave.

**Vancleave Camp Registration and Information Sheet** – This form was developed by the folks at Camp Vancleave for tracking evacuees.

**Thank You Card** – This thank you card was developed to show appreciation for the efforts of workers at Camp Vancleave.

**Controlling the Spread of Infections in Evacuation Centers** – An official release by the Centers for Disease Control and Prevention addresses a common problem in an area where people gather in an emergency situation.

**Operation Good Neighbor Shelter Operations-Lessons Learned** – This team, stationed in Phoenix, AZ., mobilized to support a shelter that eventually housed thousands of hurricane evacuees. Learn how they adjusted to the unique demand and responded to the needs that all people bring with them when they arrive.

**Operation Good Neighbor-Organization Chart** – Anticipating the need to adjust the ICS structure to fit the format of this incident, Philbin’s Team came up with this plan.

**Camp Vancleave Emergency Workers Registration Chart** – Developing a method to track emergency responders also became important during the massive effort to assist evacuees. This Microsoft Excel form was developed by the team at Camp



Many residents in the Gulfport area of Mississippi returned to salvage what they could from their homes.

---

Vancleave and may be useful to others who are faced with a need for tracking personnel.

**Camp Vancleave Emergency Workers Registration Sorting** – An accompanying document to the registration chart, this Microsoft Excel tool is an example of how the team at Camp Vancleave created personnel organization and tracking tools that helped them get everyone back home safely.

**Forest Service Crews Help Evacuees (AKA “The Green Pants Article”)** – At an evacuee shelter in Texas during the 2005 Hurricane season, this article was written about the wildland fire community’s assistance. These crews epitomized the wildland fire community’s response during this season.

**Hurricane Katrina-Southern Area Incident Management Team-After Action Report** – This team went to the Louis

Armstrong New Orleans International Airport where disaster medical assistance personnel were working in a field hospital. The team's assignment evolved to become a field hospital, a special needs shelter and a short-term shelter for evacuees while they awaited transport. In addition, the team supported the multitude of responders.

**Katrina Hurricane Support-Sandman's Northern Rockies IMT AAR Rollup** – Humanitarian support on a mass scale is what this team experienced during this assignment. The task involved sheltering of evacuees, caring for special needs evacuees and coordinating the efforts of a high number of responding personnel.

**Long Term Action Planning Guide** – While assigned to the Exotic Newcastle Disease Incident, members of this California Incident Management Team took a hard look at long term planning producing this white paper and worksheet to guide their process. If your incident has unexpected complications or duration, this tool may help you.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**E Coli Bacteria Fact Sheet** – The best way to quell widespread alarm, is with good information. This fact sheet distinguishes fact from fiction about a common concern among responders and rescue workers. Read about how to limit the possibilities of becoming infected with the directions on this document.

**ESF-4 Remedial Action Form** – A fill-in-the-blank template, this is FEMA's form 85-52 that will help you to document significant issues and discuss possible resolutions and then pass them on to FEMA officials.

**Hurricane Isabel 2004 FEMA AAR** – This document is an example of the Southern Area Incident Management Team’s after action review material captured on FEMA’s form 85-52. This may be what you will need if you are asked to submit review material on one of your assignments to FEMA.

**Severe Weather Contingency Planning In-brief Packet** – This package compiles four products used to plan for violent weather during incidents. Combining the task list, a contingency planning model, a revised version of the PopPro Assessment checklist and an example of an ACT summary sheet, this one document will be able to help you work through the myriad of details involved in planning on this scale.

**LSA and Base Camp Evacuation Plan** – This document produced by co-located incident management teams operating at the Saufley Field Naval Air Station in Pensacola, Florida during Hurricane Ivan in 2004 covers the individual responsibilities of directors and unit leaders. It may provide you with ideas on building your plan.

**Special Incident Safety Plan** – This document prepared by the Georgia Forestry Commission Incident Management Team was completed in order to meet the specific hazards of a unique assignment. This team was assigned to provide management of the logistical support for Law Enforcement assigned to the G 8 Summit. A comprehensive safety plan was introduced at the initiation of their assignment.

**Ask for Feedback Safety Message** – The author of this safety note reminds us all that feedback is a critical element for remaining alert and aware. On this message is listed the five communication responsibilities all firefighters have.

**American National Red Cross** – The Red Cross is “a humanitarian organization led by volunteers and guided by its Congressional

Charter and the Fundamental Principles of the International Red Cross Movement, (that) will provide relief to victims of disasters and help people prevent, prepare for and respond to emergencies.” Read more about how we work with Red Cross volunteers during all-hazard events.

## Special Needs Shelters

**Orlando County Special Needs Shelter** – In support of evacuees impacted by Hurricane Frances, Vail’s Team went to Florida. Read about the first time the Forest Service ESF4 was tasked to support a Special Needs Shelter under a Mass Care Mission Assignment .

**Controlling the Spread of Infections in Evacuation Centers** – An official release by the Centers for Disease Control and Prevention addresses a common problem in an area where people gather in an emergency situation.

**Hurricane Katrina-Southern Area Incident Management Team-After Action Report** – This team went to the Louis Armstrong New Orleans International Airport where disaster medical assistance personnel were working in a field hospital. The team’s assignment evolved to become a field hospital, a special needs shelter and a short-term shelter for evacuees while they awaited transport. In addition, the team supported the multitude of responders.

**Hurricane Rita-Texas Support-Molumby’s CA IMT AAR Rollup** – Supporting a base camp for people who are not familiar with this type of living can be a formidable challenge. Read how this team established a base camp in support of non-government employees and volunteers.

**Katrina Hurricane Support-Sandman’s Northern Rockies IMT AAR Rollup** – Humanitarian support on a mass scale is what

this team experienced during this assignment. The task involved sheltering of evacuees, caring for special needs evacuees and coordinating the efforts of a high number of responding personnel.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**E Coli Bacteria Fact Sheet** – The best way to quell widespread alarm, is with good information. This fact sheet distinguishes fact from fiction about a common concern among responders and rescue workers. Read about how to limit the possibilities of becoming infected with the directions on this document.

**Special Incident Safety Plan** – This document prepared by the Georgia Forestry Commission Incident Management Team was completed in order to meet the specific hazards of a unique assignment. This team was assigned to provide management of the logistical support for Law Enforcement assigned to the G 8 Summit. A comprehensive safety plan was introduced at the initiation of their assignment.

**American National Red Cross** – The Red Cross is “a humanitarian organization led by volunteers and guided by its Congressional Charter and the Fundamental Principles of the International Red Cross Movement, (that) will provide relief to victims of disasters and help people prevent, prepare for and respond to emergencies.” Read more about how we work with Red Cross volunteers during all-hazard events.

# The American Red Cross

**NOTE:** The material for this synopsis is paraphrased and/or quoted from the 2006 American Red Cross Report. To read the report online please visit [http://www.redcross.org/static/file\\_cont5765\\_lang0\\_2202.pdf](http://www.redcross.org/static/file_cont5765_lang0_2202.pdf)

Under its mission statement, the American National Red Cross is “a humanitarian organization led by volunteers and guided by its Congressional Charter and the Fundamental Principles of the International Red Cross Movement, (that) will provide relief to victims of disasters and help people prevent, prepare for and respond to emergencies.” Through its Congressional Charter, the Red Cross “is designated as the organization which is authorized to act in matters of relief” fulfilling U.S. treaty obligations under the Geneva Conventions, to provide communications services with the national Red Cross or Red Crescent societies of other countries and the International Committee of the Red Cross and to act as an intermediary in communications between families and their relatives who are members of the armed forces of the United States. In addition, the Charter requires that the Red Cross provide national and international peace-time disaster preparedness, prevention and relief services. The Red Cross is the only nongovernmental organization with primary agency responsibilities under the National Response Plan. The organization is mobilized under the plan’s Emergency Support Function-6.

The operations of the Red Cross also include a more than \$2 billion-a-year blood-related business. This aspect of the organization was started as a war relief effort to provide blood for soldiers during World War II. Today in the United States, the Red Cross collects and distributes nearly half of

the nation's supply of blood and blood components.

Still, the Red Cross is perceived mainly as a volunteer-led humanitarian relief organization that mobilizes unprecedented numbers of volunteers in times of disaster.

For many of us in the wildland fire community, the 2005 hurricane season provided us with our first up-close and personal experience with American Red Cross volunteers. Due to the wildland fire community's inclusion in the National Response Plan under ESF-4, it is likely that we will work with Red Cross volunteers in future relief efforts. We should understand that the Red Cross relies heavily on a network of local units categorized as "chapters," to deliver many of its services. Currently the Red Cross has about 800 chapters. All of these chapters provide services to their communities on a daily basis often responding to events such as single-family home fires. The chapters also act as the organization's front-line responders to large scale disasters.

The National Response Plan states that, like the Federal Emergency Management Agency (FEMA), the Red Cross is a "primary agency" charged with responsibility for providing leadership in coordinating and integrating overall federal efforts associated with emergency support functions related to "mass care," housing and human services during incidents requiring a coordinated federal response. In this role, the Red Cross' function is to coordinate federal mass care resources to support overwhelmed state and local governmental entities providing mass care relief services. Mass care relief services at the local level include shelter, feeding, basic first aid, disaster welfare information and bulk distribution of emergency relief items. The Red Cross

is also designated as a “support agency” and a “cooperating agency” under various provisions of the National Response Plan.

Historically, the Red Cross has been able to address disasters by drawing on its network of chapters, employees and volunteers. However, the organization’s 2006 report notes that the past decade has witnessed disasters of unprecedented scope. The rapid succession and the widespread impact of hurricanes Katrina, Rita and Wilma required unexpected levels of assistance in areas that suffered catastrophic devastation. The report says the 2005 hurricane season seriously challenged the Red Cross’ existing response systems for disaster relief.

In the aftermath of the 2005 hurricane season, the organization has been taking steps to enhance its disaster relief program with a view toward centralizing its operations and reorganizing its chapter structure.

## Information

**Joint Information Center Manual. Apache County** — This document provides guidance to establish and operate a Joint Interagency Information Center (JIC) during a large-scale emergency in Apache/ Navajo County. The goal of a JIC is to provide accurate, timely, and coordinated information to the public and the media.

# Aviation Operations

**Aviation Crash Rescue and Response Plan** – This fill-in-the-blank template was developed to support a clear and rapid response to aviation emergencies.

**Project Aviation Safety Plan** – This template form is easily modified to use during home unit and off-home unit assignments.

**Disaster Air Operations Plan.2003** – This plan, developed in 2003, is intended to be a blueprint for state and geographical areas experiencing a disaster. It is an example of a combined aviation response plan and has two more accompanying documents with supporting appendices.

**Disaster Air Operations Plan Appendices A, B, C** – The first accompanying document for the Air Operations Plan listed above contains three organization charts reflecting state, complex and multi-state incidents. The documents are in Microsoft Excel.

**Disaster Air Operations Plan Appendices D-J** – The second accompanying document for the Air Operations Plan listed above contains request and assignment forms, a safecom form and a basic communication plan.

**TFR Request Form** – This file in rich text format is an additional form accompanying the Air Operations Plan listed above.

**FAA Order 7400** – Procedures for handling airspace matters including changes effective May 15, 2003.

**Hurricane Ivan Tactical Aviation Operations Plan.2004** – The intent of this final report is to improve information sharing among the various agencies supplying aviation support to disaster relief operations. Several support appendices are also included.

**Helicopter Evacuation Plan** – This aviation evacuation plan contains valuable information for anyone in a hurricane zone, on the Saffir-Simpson Scale. Learn about what characterizes a hurricane as a certain category and their definitions.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**Hurricane Isabel Aviation Cell AAR** – Because the multiple agency nature of FEMA operations presents a more complex problem, it is recommended that an Aviation Cell be established under ESF-4 as a standard operating procedure whenever there is a likelihood of extensive aviation operations. Read more of this document for further recommendations.

**ESF-4 Remedial Action Form** – A fill-in-the-blank template, this is FEMA’s form 85-52 that will help you to document significant issues and discuss possible resolutions and then pass them on to FEMA officials.

**Hurricane Isabel 2004 FEMA AAR** – This document is an example of the Southern Area Incident Management Team’s after action review material captured on FEMA’s form 85-52. This may be what you will need if you are asked to submit review material on one of your assignments to FEMA.

**Ask for Feedback Safety Message** – The author of this safety note reminds us all that feedback is a critical element for remaining alert and aware. On this message is listed the five communication responsibilities all firefighters have.



Donated supplies can overwhelm receiving operations unless procedures for handling the incoming goods are set up quickly.

## Safety

**All-Risk Lessons Learned PowerPoint Presentation** – This presentation covers many of the watchout situations experienced by the Rocky Mountain IMT that served in San Antonio, Texas during Hurricanes Katrina and Rita.

**Controlling the Spread of Infections in Evacuation Centers** – An official release by the Centers for Disease Control and Prevention addresses a common problem in an area where people gather in an emergency situation.

**Fatigue and Resistance to Disease** – The *Wildland Firefighter Health & Safety Report* Spring 2004 issue reviews the important factors in work and rest, energy and nutrition for maintaining optimum health during long emergency response events.

**Hurricane Katrina Final SAT Report – Alabama, Louisiana, Mississippi 09/01-09/22/2005** – The Safety Assessment Team completed this report during their response to the 2005 hurricane season.

**Forklift Operation Job Hazard Analysis** — This is a job hazard analysis of forklift operation including hazards and abatement actions while transporting loads and loading and unloading of trucks and trailers.

**Forklift Safety Certificates** – This certificate of training completion template allows instructors to recognize trainees for their participation in the course.

**Hurricane Ivan ICS 215A** – This safety analysis of conditions that existed for a team responding to Hurricane Ivan, addresses the common hazards on hurricanes such as powerlines, storm debris, insects and animals, hydration and fatigue.

**Sharp Edges Safety Message** – In addition to safety messages included in the IAP, safety officers on hurricane duty often put illustrated messages on camp boards. This example looks at the consequences of thinking you are completely aware of your environment and the hazards in it nearest to you.

**Thunderstorm Safety Message** – Thunderstorms in coastal regions can develop rapidly. This document explains your best options for riding out the storm in safety.

**Hydration Safety Message** – This document explains hydration in a whole new way: What’s needed in order to maintain a healthy body temperature and how you do that under extreme work conditions are explained here.

**Heat Disorders Safety Message** – This message explains the three forms of heat stress and the characteristics that mark each of

them. Know what the signs are and how to react if you identify them in yourself and in others around you.

**Fatigue Safety Message** – This message has a full plate: fatigue and its symptoms are explained as well as the consequences of it in the long term. Physical reactions and emotional responses that could clue you in to a co-worker’s level of fatigue are covered in this message as well as recommendations to mitigate.

**Livestock in Disasters** – Overlooked victims of disaster and the associated impacts often involve challenges to public health. FEMA’s independent training program course materials are available to anyone through the website address listed on this document.

**2004 Florida Traffic Volumes** – In this 19-page PowerPoint Presentation, Florida’s Department of Transportation depicts the challenges of evacuation planning on a multi-state level of routes that could include already damaged infrastructure.

**Georgia Department of Transportation Hurricane Plan** – In preparation for the 2005 hurricane season, this state agency shared their plan for contra-flow directions to assist motorists evacuating the area.

**Field Season Employee Health Risks Management** – As seasonal employees come on board, additional risks are presenting in preparing the employees for field and fire fighting duties. This short list of health conditions to pay attention to, describes why the topics are important and best practices for maintaining optimum health.

**Forklift Operations Safety Message** – Forklifts are ever present during hurricane response. If you are involved in performing tasks with and around forklifts, take a moment to read this message so that you will be alert to the hazards.

**Helicopter Evacuation Plan** – This aviation evacuation plan

contains valuable information for anyone in a hurricane zone, on the Saffir-Simpson Scale. Learn about what characterizes a hurricane as a certain category and their definitions.

**MRE Flameless Heating Device Safety Alert** – Issued by the U.S. Dept. of Agriculture in 2004, anyone who is handling MREs should be aware of the fire hazard associated with the storage of Meals, Ready-To-Eat. This safety alert discusses the fire/explosion hazards and precautions to be taken in handling and storage.

**Forklift Operations Safety Message** – Forklifts are ever present during hurricane response. If you are involved in performing tasks with and around forklifts, take a moment to read this message so that you will be alert to the hazards.

**Memo To Purchasing Team For Safety Mitigation** – This justification was written by a safety officer who requested special supplies. This template may be handy for you when faced with unusual or unforeseen working conditions.

**PPE Fact Sheet for Flood Response Work** – The Safety Assistance Team in consultation with the Centers for Disease Control, and the National Institute for Occupational Safety and Health provided these guidelines and warnings to flood cleanup workers during the 2005 hurricane season.

**Traffic Control Night Operations Safety Message** – This message developed during the 2005 hurricane season, discusses hazards to be aware of during the night shift on traffic control duty.

**E Coli Bacteria Fact Sheet** – The best way to quell widespread alarm, is with good information. This fact sheet distinguishes fact from fiction about a common concern among responders and rescue workers. Read about how to limit the possibilities of becoming infected with the directions on this document.



In all-hazard response events wildland fire crews will work with a wide variety of volunteers and other government sector employees.

---

**ESF-4 Remedial Action Form** – A fill-in-the-blank template, this is FEMA’s form 85-52 that will help you to document significant issues and discuss resolutions and then pass them on to FEMA officials.

**Hurricane Isabel 2004 FEMA AAR** – This document is an example of the Southern Area Incident Management Team’s after action review material captured on FEMA’s form 85-52. This may be what you will need if you are asked to submit review material on one of your assignments to FEMA.

**Severe Weather Contingency Planning In-brief Packet** – This package compiles four products used to plan for violent weather during incidents. Combining the task list, a contingency planning model, a revised version of the PopPro Assessment checklist and an example of an ACT summary sheet, this one document will be able to help you work through the myriad of details involved in planning on this scale.

**Holy Cross Severe Weather Preparedness Plan** – A team based in Louisiana during the 2005 hurricane season wrote this plan for personnel at the incident. It is one of many examples in this toolbox that may meet your need.

**Jackson Support Base Evacuation Plan** – This packet addresses priorities identified in case of tornado activity and a camp equipment evacuation time table. Personnel accountability is highlighted in this short version of an exit plan during severe weather events.

**Stennis OSA-LSA Severe Weather Evacuation** – This team working at a large combination staging area and personnel base camp had unique challenges to consider when planning an evacuation. If you are asked to be involved in severe weather contingency operations you may want to look at this document for tips on successful planning.

**Saints Base Camp Severe Weather Safety Plan** – This document describes the procedures and activities necessary to safely and effectively protect and possibly evacuate personnel working at the Saints Camp Base of Operations during hurricane season 2005.

**Area Command Team Severe Weather Evacuation Plan** – Planning for multiple teams to evacuate or shelter-in-place requires intensive planning. This document produced by an ACT during Hurricane Katrina, may help you to plan more quickly should severe weather be heading your way.

**LSA and Base Camp Evacuation Plan** – This document produced by co-located incident management teams operating at the Saufley Field Naval Air Station in Pensacola, Florida during Hurricane Ivan in 2004 covers the individual responsibilities of directors and unit leaders. It may provide you with ideas on building your plan.

**Special Incident Safety Plan** – This document prepared by the Georgia Forestry Commission Incident Management Team was completed in order to meet the specific hazards of a unique assignment. This team was assigned to provide management of the logistical support for Law Enforcement assigned to the G 8 Summit. A comprehensive safety plan was introduced at the initiation of their assignment.

**Night Operations Safety Message** – Night operations are a frequent occurrence during hurricane and other all-risk management operations. Encourage personnel to mitigate the risks associated with these circumstances.

**Ask for Feedback Safety Message** – The author of this safety note reminds us all that feedback is a critical element for remaining alert and aware. On this message is listed the five communication responsibilities all firefighters have.

**Kool-Aid Safety Message** – Moisture is nice, but it can make walking hazardous because of newly slick surfaces. This safety note reminds personnel to watch their footing, and the advent of electrical hazards. It also asks a fun question that will get the mathematicians in the crowd working.

**ATTITUDE Safety Message** – If A, B, C etc = 1, 2, & 3, is it coincidence that attitude adds up to 100? The author of this safety message reminds us that keeping our head in the game is a skill that we need to develop and practice.

**Thunderstorm Safety Message** – If you've ever wondered what to do to mitigate your risk during a thunderstorm, this safety note will be your guide.

**Heat Cramps Safety Message** – The author of this safety message notes the solutions to heat cramps caused by a failure to replace fluids and electrolytes.

# SAFFIR-SIMPSON SCALE

The Saffir-Simpson Hurricane Scale is used in public hurricane releases to classify hurricanes according to their potential for generating property damage and flooding in coastal areas. The following are the five classifications assigned to hurricanes and a discussion of each:

**Category I:** A Category One hurricane produces winds of 74 to 95 mph and/or a storm surge 4 to 5 feet above normal. No real damage to buildings is likely. Some damage may be expected to unanchored mobile homes, shrubbery, and trees. Some coastal road flooding and minor pier damage may be expected.

**Category II:** A Category Two hurricane produces winds of 96 to 110 mph and/or a storm surge 6 to 8 feet above normal. Buildings will receive some roof, door and window damage. Considerable damage to vegetation, mobile homes and piers will occur. Coastal and low-lying escape routes likely will flood 2 to 4 hours before arrival of the hurricane center. Small craft in unprotected anchorages will lose moorings.

**Category III:** A Category Three hurricane generates winds of 111 to 130 mph and/or a storm surge 9 to 12 feet above normal. Structural damage to residences and utility buildings will occur and mobile homes frequently are destroyed. Flooding near the coast destroys small structures and larger structures

are damaged by floating debris. Terrain lower than 5 feet above sea level is flooded 8 or more miles inland.

**Category IV:** A Category Four hurricane produces winds of 131 to 155 mph and/or a storm surge 13 to 18 feet above normal. Extensive outside wall failure with complete roof failure on small residences will occur. Major erosions of beaches and major damage to the lower floors of buildings near the shore is likely. Terrain continuously lower than 10 feet above sea level may be flooded and evacuation of residential areas as far inland as 6 miles may be required.

**Category V:** A Category Five hurricane produces winds greater than 155 mph and/or a storm surge greater than 18 feet above normal. Complete roof failure will occur on many residences and industrial buildings and some complete destruction of small utility buildings can be expected. Major damage is likely to lower floors of structures located less than 15 feet above sea level and within 500 yards of the shoreline. Evacuation of residential areas on low ground within 10 miles of the shoreline may be required.

## **STORM AND HURRICANE WATCH AND WARNING DEFINITIONS**

During the hurricane season the authorities will issue advisories in case of threat of a tropical storm or hurricane. The four major advisories to follow closely are:

- **Tropical Storm WATCH**

Tropical Storm conditions are possible in the specified area of the Watch, usually within 36 hours.

- **Tropical Storm WARNING**  
Tropical Storm conditions are expected in the specified area of the Warning, usually within 24 hours.
- **Hurricane WATCH**  
A hurricane WATCH means that hurricane conditions MAY threaten an area within *24-36 hours*. When a hurricane WATCH is issued, everyone in that area should listen for further advisories and be prepared to act promptly.  
During a Hurricane WATCH, prepare to take immediate action to protect your family and property in case a Hurricane WARNING is issued.
- **Hurricane WARNING**  
A hurricane WARNING is issued when hurricane conditions are expected in a specified coastal area in *24 hours or less*. Hurricane conditions include winds of 74 miles an hour (64 knots) and/or dangerously high tides and waves. Complete all storm preparations and evacuate if directed by local officials.

## Thoughts on Hurricane Rita Effort: an appendix to the AAR Rollup from Bennett's Type 1 Team

---

The IMT's, as usual, have done their best to adapt to an atypical type of assignment. Often their mission and direction have been less than clear from higher authority. They also find themselves dealing with a very emotional situation and the potential for negative political fallout is extreme. Despite this they continue to assist in whatever ways they can to accomplish what they believe their mission to be.

There is significant waste in the response and recovery process. Much of it occurs because of the political influence on the decisions that are made. Unfortunately, this will be difficult to ever change.

There is a disconnect between the basic premise of being here to help people in need verses doing only those things which are allowed by administrative rules. Some of those rules may not be understood and/or accepted by the public. It also makes those perceived to be in charge vulnerable to unfair publicity when the media is able to locate someone who is not being assisted and who can be portrayed as a victim.

Related to the above observation is the phenomenon known as "mission creep." Mission creep is the assumption of work that is not directly related to the objectives given to the IMT. This can occur because individuals take on an assignment out of compassion, because they need something more to do or because they have been asked to do it by someone with assumed authority.

Whenever aid is offered to people it will attract at least two types of responses from them. One is to take advantage of the offered aid, if they are able, because it is badly needed. Another is to take advantage of the aid because it is free, whether it is needed or not. In the interest of a sense of fairness it is difficult for many team members to watch truly needy people go without while they observe other people

simply taking advantage of an opportunity. This can create a dilemma for the team members for they have no authority and are helpless to curtail abuse of the aid. In addition, those in need of the aid can become conditioned by their observations that greed and abuse are apparently tolerated.

There are undoubtedly many people who needed help but did not receive it because they were unable to learn where help was available or did not have the means to get to the offered help. This would most likely have occurred in more remote areas. Although it would have been difficult to accomplish, it is not clear whether or not any special effort was made to help these people.

PRODUCED BY  
THE WILDLAND FIRE LESSONS LEARNED  
CENTER  
[WWW.WILDFIRELESSONS.NET](http://WWW.WILDFIRELESSONS.NET)