



Kingsborough Community College

Department of Public Safety

Hurricane Safety Tips

DEFINING A HURRICANE

A hurricane is a type of tropical cyclone, the general term for all circulating weather systems (counterclockwise in the Northern Hemisphere) over tropical waters. Tropical cyclones are classified as follows:

Tropical Depression -- An organized system of clouds and thunderstorms with a defined circulation and maximum sustained winds of 38 mph (33 knots) or less.

Tropical Storm -- An organized system of strong thunderstorms with a defined circulation and maximum sustained winds of 39 to 73 mph (34-63 knots).

Hurricane -- An intense tropical weather system with a well-defined circulation and maximum sustained winds of 74 mph (64 knots) or higher. In the western Pacific, hurricanes are called "typhoons," and similar storms in the Indian Ocean are called "cyclones."

Hurricanes are products of the tropical ocean and atmosphere. Powered by heat from the sea, they are steered by the easterly trade winds and the temperate westerlies as well as by their own ferocious energy. Around their core, winds grow with great velocity, generating violent seas. Moving ashore, they sweep the ocean inward while spawning tornadoes and producing torrential rains and floods.

Each year on average, ten tropical storms (of which six become hurricanes) develop over the Atlantic Ocean, Caribbean Sea, or Gulf of Mexico. Many of these remain over the ocean. However, about five hurricanes strike the United States coastline every three years. Of these five, two will be major hurricanes (category 3 or greater on the Saffir-Simpson Hurricane Scale).

Source: U.S. DEPARTMENT OF COMMERCE , NOAA, National Weather Service

Hurricane Scale

All Hurricanes are dangerous, but some are more so than others. The way storm surge, wind and other factors combine determines the destructive power of a hurricane.

To make comparisons easier and to make the predicted hazards of approaching hurricanes clearer to emergency forces, hurricane forecasters at the National Oceanic and Atmospheric Administration use a disaster-potential scale which assigns storms to five categories. This can be used to give an estimate of

"Hurricane Watch"

In preparing for the hurricane season, the first step is understanding the warnings that are issued by the National Weather Service:

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.

When a hurricane WATCH is issued, people in the affected area should:

- Frequently listen to your radio, television or NOAA Weather Radio for official bulletins on the progress of the storm.

- Fuel and service family vehicles. Service stations may be unable to pump fuel because of flooding or loss of electrical service.

- Moor small craft or move to safe shelter.

- Inspect and secure mobile home tie downs.

- Tape, board or shutter all window and door openings. Wedge sliding glass doors to prevent lifting from their tracks.

- Check for batteries, flashlights and battery-operated radios.

- Check on your supply of canned food, first aid supplies, drinking water and medications.

- Secure or bring inside lawn furniture and other loose, lightweight objects, such as garbage cans and garden tools that could become a projectile in high winds.

- Have on hand an extra supply of cash.

"Hurricane Warning"

In preparing for the hurricane season, the first step is understanding the warnings that are issued by the National Weather Service:

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.

Actions for protection of life and property should begin immediately when the warning is issued, including:

- Frequently listen to your radio, television or NOAA Weather Radio for official bulletins on the progress of the storm.

- Complete preparation activities such as putting up storm shutters, storing loose objects, etc. Move valuables to upper floors.

- Store drinking water in clean jugs, bottles and cooking utensils. The water system in your town could become contaminated or damaged by the storm.

- Check your battery-powered equipment. Your radio may be your only link with the outside world.

- Emergency cooking facilities and flashlights will be essential if utility services are interrupted.

- Follow instructions issued by local authorities. Leave IMMEDIATELY if told to do so.

- Leave low-lying areas that may be swept by high tides or storm waves.

BE PREPARED

In preparing for the 2004 Hurricane Season, make plans for action:

- Know the hurricane risks in your area. Learn the storm surge history and elevation of your area.
- Learn safe routes inland.
- Learn the location of official shelters.
- Ensure that enough non-perishable food and water supplies are on hand.
- Have at least a one week supply of medications on hand.
- Obtain and store materials, such as plywood, necessary to properly secure your home.
- Clear loose and clogged rain gutters and downspouts.
- Keep trees and shrubbery trimmed of dead wood.
- Review your insurance policy.
- Determine where to move your boat in an emergency.
- Make plans now on what to do with your pets should you be required to evacuate your residence.
- Public health regulations do not allow pets in public shelters, nor do most hotels/motels allow them.

Individuals with special needs or others requiring more information should contact their County Emergency Management Office.

Family Emergency Supplies

Have these items in your residence ready to use in the event of an emergency:

- Flashlights with extra batteries. Keep flashlights with extra, fresh batteries and keep them beside your bed and in several other locations. Do not use matches.
- Portable radio with extra batteries. Most telephones will be out of order or limited to emergency use. The radio, including NOAA Weather Radio, will be the best source of emergency information.
- First aid kit / first aid skills. Keep your first-aid kit well stocked and in a central location. Take basic first-aid and CPR courses. Keep your skills current.
- Fire extinguisher. Your fire extinguisher should be suitable for all types of fires and should be easily accessible. Teach all family members how to use it.
- Food. Store a three-day supply of food for each person. Items such as canned or dehydrated food, powdered milk and canned juices can be rotated into your daily diet and replenished on a regular basis. Include food for infants or the elderly, snack foods and items such as a non-electric can opener, cooking utensils, paper/plastic plates and plastic utensils.
- Water. Store a 3-day supply of water (one gallon per person per day). Store in air-tight containers and replace them every six months. Keep a disinfectant, such as iodine tablets or chlorine bleach, to purify water, if necessary.
- Extra blankets and clothing may be required to keep warm. Sturdy shoes protect feet from broken glass and debris.
- Alternate cooking source. Store barbecue, charcoal, starter and matches in case utilities are out of service. Do not use these methods of cooking within a confined area.
- Special items for infant, elderly, or disabled family members. Have at least a one week supply of medications and foods for infants and those on special diets.
- Tools. Have a crescent or pipe wrench to turn off gas and water if necessary and know the location of the shut-off valves.
- Important documents should be stored in a waterproof container. Examples: insurance policies, medical records, bank account numbers, Social Security card, etc. Also, checkbook, cash, credit cards, ATM cards.

Family Response Plan

Prepare a plan for your family and loved ones in advance of hazardous weather. You should:

Contact your local National Weather Service office or Emergency Management office to learn what types of disasters could occur and how you should respond.

Learn the warning signals and evacuation plans of your community.

Know the Emergency Alert System radio and television stations in your area that will carry official information. Also, monitor NOAA Weather Radio broadcasts, if possible.

Discuss with family members what they should do in the event of a disaster, such as a hurricane or severe storm. Pick two places to meet: a spot outside your home for an emergency, such as a fire, and a place away from your neighborhood in case you cannot return home.

Designate an out-of-area friend or relative whom separated family members should call to report their whereabouts. Make certain all family members have the phone number.

Make a plan now for what to do with your pets if you need to evacuate.

WEATHERING THE STORM

As a major hurricane, or weather event, approaches, it is vitally important to listen to weather advisories and to be prepared to take action.

Modern weather forecasting provides the opportunity to prepare for a major hurricane days in advance. During this time it is important to: check home emergency supply kits for flashlights (avoid using candles which can be a fire hazard), portable radio and TV, cell phone chargers

EVACUATION

If an EVACUATION is ordered by local government officials:

If instructed to leave - do so! The temptation to "tough it out" can put lives at risk - yours and the personnel who may be sent on an otherwise avoidable rescue mission.

Follow the instructions and advice of local government officials. If you are advised to evacuate, do so promptly. If you are advised to go to a certain location, go there. Do not go anywhere else.

If certain travel routes are advised, use those routes rather than trying to find short cuts. If you are told to shut off water, gas or electrical service to your home before leaving, do so. Also, find out from the broadcast reports where emergency housing and feeding stations are located, in case you need

Do not go anywhere else

AFTER THE STORM

Remain where you have taken shelter until informed by local authorities that it is safe to leave. Keep the radio/television turned on for advice and instructions from local government on where to go for medical care, emergency assistance for housing, clothing and food, as well as other ways in which you can help your family and community recover.

If possible, advise relatives and friends that you are safe.

Stay out of the disaster area. Do not sightsee. Sightseeing disrupts essential rescue work and may be dangerous.

Obey all curfew and emergency orders which are issued.

If you must drive, use caution. Be aware of road and bridge washouts and storm debris on roadways.