



The University of Texas at Austin

Department of Marine Science

College of Natural Sciences



SEVERE WEATHER ACTION PLAN 2023 (SWAP)

PORT ARANSAS, TEXAS

Revised: May 19, 2023

**THE UNIVERSITY OF TEXAS AT AUSTIN MARINE SCIENCE INSTITUTE
PORT ARANSAS, TEXAS
SEVERE WEATHER ACTION PLAN (SWAP)**

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LEAD PERSONNEL

The Director of UTMSI is responsible for implementing the Severe Weather Action Plan (SWAP). If the Director is unavailable, the Facility Manager will assume responsibilities for SWAP implementation. If neither is available, the Associate Director for FAML will take the duty. The Director or their designee shall also determine if lead staff will be recalled if on leave or travel.

GENERAL PREPARATIONS

The UTMSI campus is at risk for severe tropical storms, hurricanes, and winter weather. This Severe Weather Action Plan (SWAP) guides students and staff in preparing themselves and the campus for severe weather.

In the event of impending severe weather, tropical storm or hurricane in the Gulf of Mexico, or winter weather, the Director/Department Chair and their immediate staff are responsible for notifying all employees of possible or actual implementation of the SWAP. In turn, it is incumbent on all employees to contact their immediate supervisors when severe weather conditions occur to seek instructions for work reporting requirements and duties. All employees are expected to be available to report for work, including weekends and holidays, when severe weather conditions are forecast.

All faculty and laboratory managers must ensure that essential equipment in their laboratories is connected to emergency power circuits. Each laboratory manager's responsibility is to supply power cords to connect essential equipment to emergency power circuits before an ordered evacuation. Please note that it is not the responsibility of the maintenance staff to provide the power cords. All non-essential equipment in laboratories and offices should be powered down and disconnected from the power grid when an evacuation is ordered.

The emergency power generator systems for the Channel View Drive and Port Street (including FAML) campus labs serve only the emergency (red) outlets and equipment hardwired to the emergency power distribution circuits. The Channel View Drive and Port Street campuses have switching devices to connect circuits to generators when landline power is interrupted automatically. The unattended run time of the generator at the Channel View Drive campus is several weeks, and at the Port Street campus, it is about 1 week. Therefore, emergency power at the Port Street campus is not a reliable source for long-duration needs (greater than four days) if the island is evacuated or if an extended power failure occurs. If a high storm surge occurs during a severe tropical storm or hurricane, the generators at the Channel View and Port Street campuses may be inundated and inoperative while the Institute is unattended.

Essential equipment that requires continuous power must be identified by posting power requirements and responsible personnel contact information on the equipment itself and on the door to the laboratory or space in which the equipment is located. If an unanticipated need should arise that necessitates continuous power for equipment not previously connected or hardwired, it may be possible to connect it to the red emergency outlets provided in most labs. An extension cord is the responsibility of the laboratory manager. The cord should be stored in advance and near the equipment for connection to a red emergency power outlet. Maintenance staff will test all emergency generators routinely and before June 1 each year. Laboratory managers must ensure that all equipment requiring connection to emergency circuits (red outlet or hardwired) is connected to emergency circuits by June 1 each year.

Laboratory managers must provide the Laboratory Safety Officer with any necessary written updates or revisions to emergency procedures for laboratories under their control. Updates or revisions must include lists of hazardous materials, their locations, and proposed laboratory re-

entry procedures. Updated emergency procedures for laboratories must be posted on respective laboratory doors. A campus closure may also occur in the event of inadequate water supply as vital safety measures such as eyewash stations or chemical showers are not operational.

Laboratory managers must ensure appropriate storage and security of hazardous materials. If hazardous materials are located in an area that may be flooded, such materials must be stored in a sealed drum or sealable cabinet with each hazardous materials item inside the enclosure clearly and individually labeled to identify the material and responsible personnel. An inventory list of items inside hazardous materials enclosures must be attached to the outside of the enclosure (e.g., drum or cabinet). Excess or expired hazardous materials must be identified, noted in inventory updates, and disposed of under the direction of the Laboratory Safety Officer and Hazardous Waste Operations and Emergency Response Official (HAZWOPER Officer) to minimize the chance of contamination in the event of an accident or storm. Materials stored in the Hazardous Waste Storage Facility will be inventoried by the HAZWOPER Officer and regularly scheduled for contract pick-up & disposal. No buoyant hazardous material containers or items are to be stored on ground floors or floor level at UTMSI Channel View Drive or Port Street campuses.

On January 1, UTMSI maintenance will ensure enough supplies to weatherize pipes in student housing and throughout campus.

On January 1 and before June 1, UTMSI Administration will update and distribute a current UTMSI telephone list if the SWAP is initiated. If your mobile phone has the capability, it is recommended to save the UTMSI telephone list on your phone. All supervisors will maintain subordinate telephone notification trees for faculty, staff, and students under their supervision.

On or before June 1, the administration will prepare a waterproof re-entry box for lead personnel with the following: flashlights, batteries, hand sanitizer, fix-a-flat, mifi with instructions, a paper copy of SWAP plan, a paper copy of the emergency communications plan, paper copies of building plans, generator instructions, charging station, power strip, camera, post-storm assessment packet, extension cord, tire plug kit, safety materials (hardhat, vest, gloves, N95 masks), phone book, and locations of essential supplies (diesel fuel, first aid kit, defibrillator, fire extinguishers, snake bite kit, mobile wireless units, barricades).

On or before June 1, faculty will upload videos of their lab that show the condition of the laboratory and instrumentation. Faculty shall upload videos to [UTbox](#) with file names labeled with the building abbreviation, room, and date. Example “S66_R3.203_20210517.mp4” Building abbreviations are listed in this [file](#).

On January 1 and before June 1, a shareable UTBOX folder entitled “Emergency Response” will be set up and shared with UTMSI administration leads that contains a disaster communications plan, images of the exterior and interior spaces, UTMSI boat basin slip owner contact information, storage options, and contact information. In the event of an evacuation, diagrams with hazardous materials will be uploaded to this folder.

On January 1 and before June 1, faculty advisors will plan evacuation and safeguard intellectual

property (data, records, preserved specimens, breeding stock, etc.), including reserving off-site freezer space and data storage.

Special considerations for tropical weather:

Hurricane season begins each year on June 1 and ends on November 30. A planning meeting will be held in May of each year to review the SWAP and other safety and security concerns at UTMSI. All faculty, staff, and students (employees) must attend this meeting. All employees must complete the attached Employee Acknowledgement Form indicating familiarity with the SWAP and assigned individual responsibilities. The forms will be retained in personnel files. Beginning June 1, administration, security, and safety personnel will monitor severe weather reports daily. All UTMSI employees and students are encouraged to monitor severe weather reports routinely. The City of Port Aransas offers a useful Emergency Notification System for email or text alerts available to all at no charge: <http://r.i-info.com/rc/cbcan>.

The Port Aransas Office of Emergency Management and other Coastal Bend municipalities have adopted a tiered re-entry plan following major events requiring evacuation. Only individuals bearing a Tier Two letter will be permitted entry ahead of the general population (i.e., Tier Four) re-entry. Tier Four re-entry by non-resident UTMSI employees will require a UT identification card. Port Aransas residents or homeowners must carry proof of residency (driver's license or a utility bill with the residence address, property tax bill, etc.) to gain re-entry following an evacuation (www.cityofportaransas.org).

On or before June 1, the administration will prepare a list of volunteers willing to drive UT vehicles during an evacuation. The Director or their designee will decide to implement vehicle evacuation plans during Phase I or II preparations. The hosting/advisor faculty member will coordinate plans for the evacuation of visiting scientists and students with assistance from the administrative office.

SWAP PHASE I

SWAP Phase I signals early preparations for impending severe weather and may be initiated in one of two ways, by the Director or their designee or automatically when a Tropical Storm/Hurricane Watch is declared for the Texas Coastal Bend region. A Director's initiation may occur as early as 72 hours or more before tropical-storm-force winds are expected to reach UTMSI or when a severe winter weather storm is expected to reach UTMSI. When SWAP Phase I is initiated, supervisors and lead staff will be on call 24/7 and must be available by phone. If SWAP Phase I is initiated after working hours or on the weekend, supervisors and the lead team may be immediately recalled to begin emergency preparations. All other employees should be prepared for recall and otherwise comply with local jurisdictional announcements concerning personal safety and preparation.

If the Director is unavailable, the Facility Manager will assume the responsibilities. If neither is available, the Associate Director for FAML will take the duty. The Director or their designee shall also determine if supervisors and lead staff will be recalled if on leave or travel.

In a lesser weather disturbance, such as a significant thunderstorm or freeze event, the Director may take alternate precautions and will advise lead staff and supervisors.

The UTMSI buildings and facilities are not hurricane or winter weather shelters, and the City of Port Aransas does not have a designated hurricane shelter. Supplies are not maintained for emergency use. In a hurricane or severe winter weather storm, it must be assumed that there will be no power, freshwater, or sanitary sewer in Port Aransas. All UT employees are expected to evacuate when directed by the City of Port Aransas Office of Emergency Management or the Director. In a winter weather storm combined with a prolonged power outage, a warming center will be created if possible, and a location will be distributed.

In the event of impending severe weather or hurricane conditions, all employees will be informed when the SWAP has been initiated and that they must report to work as instructed. Each organizational subunit of UTMSI is assigned several specific SWAP Phase I tasks to perform and then be available to assist the Director or their designee(s) in completing preparations. The Director or their designee(s) will inform the College of Natural Sciences Dean's office, the UT Offices of Risk Management, and the UT Offices of Campus Safety, Emergency Preparedness, and Environmental Health and Safety of the Institute's SWAP readiness status as preparations proceed. The following specific SWAP Phase I tasks are assigned to UTMSI organizational subunits as identified:

Undergraduate and Graduate Students – when informed that SWAP Phase I has been initiated, students and Graduate Student Advisor and Undergraduate Student Advisor will convene in the Estuarine Research Center seminar room or main classroom 201C and be called upon to perform the following tasks.

1. Organize into student teams of 2 to 4 individuals that live in proximity of one another to assist each other in preparing apartments/cottages if and when SWAP Phase II is initiated.

2. In winter weather, develop a plan for meals and water. Graduate Student Advisor and Undergraduate Student Advisor will share the plan with the Director and Director of Finance if the OOEF for off-campus food service is implemented.
3. Designate a campus housing participant to be the primary point of contact with the Graduate Student Advisor and Undergraduate Student Advisor to ensure timely and adequate communication of needs. There may be three-point of contact for each Dorm D, Wilson, and Beach Street.
4. Disburse to apartments/cottages/homes and assemble Go-Bags (i.e., personal items needed for two weeks travel including any medication), fuel personal vehicles and check vehicle-operating status (e.g., tire pressure, oil, battery), obtain emergency cash, and fill water containers. Begin developing evacuation plans to travel in groups if possible (planning to be continued in step 6 below). See <http://www.texasprepares.org/> help you prepare.
5. Back up all computers in apartments/cottages/houses to either UT Box, UT Backup ([Crashplan](#)) or portable hard drive. Obtain sealable bags/enclosures to safeguard and add to Go-Bags if and when SWAP Phase II is initiated. Each student is responsible for their backup drive(s) safety and security. Avoid the need for transporting hard copies of documents/files by digitizing and routinely saving to computers in advance.
6. Ensure that all potentially hazardous items, e.g., cleaning and chemical products in apartments/cottages/houses, are secured in cabinets (elevated cabinets for ground floor units). No hazardous materials should be located in floor cabinets in ground floor units.
7. In tropical weather, remove all loose items from desktops, tables, countertops, and open shelves and store them in drawers or cabinets or waterproof container bins.
8. Graduate Student Advisor and Undergraduate Student Advisor will collect information and report to faculty advisors at UTMSI to assist with Phase I preparation: Complete individual or group evacuation travel plans, communicate in writing or by email evacuation plans and contact information to the faculty advisor, and review re-entry procedures for Port Aransas and UTMSI laboratories and offices. Evacuation plans and contact information provided at this stage will supersede the information on file at the administration. If any students in campus housing are out of town, Graduate Student Advisor and Undergraduate Student Advisor shall communicate with Director to ensure that their units are prepared.
9. Graduate Student Advisor and Undergraduate Student Advisor will update or verify student contact information at the administration office via email (msi-admin@utlists.utexas.edu) or in person.

UTMSI staff will assist students at the apartments/cottages/houses when their assigned duties on campus are completed.

Administration, including Fiscal Office - when informed that SWAP Phase I has been initiated, administration staff will be called upon to report to their Administration Offices to perform the following tasks.

1. Review UTMSI vehicle and power equipment asset list disposition.
2. Back up all office computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each administration staff person is responsible for their respective backup drive(s) safety and security. Avoid the need for transporting hard copies of documents/files by digitizing and routinely saving to computers in advance.
3. The fiscal office will prepare to relocate computers and critical documents/files/items to second-floor administration offices if and when SWAP Phase II is initiated. Do not move yet; only prepare.
4. The fiscal office will secure emergency cash of \$1,000 for distribution to the Director or their designee if and when SWAP Phase II is initiated.
5. For tropical weather, remove all loose items on desktops and shelves and store them in drawers, cabinets, or waterproof containers.
6. The Director, their Executive Assistant, or the Directors designee will inform the CNS Dean and Associate Dean for Facilities and Research, the UT Office of Emergency Preparedness (OEP), and the UT Office of Risk Management that SWAP Phase I has been initiated at UTMSI. The Dean's Office and OEPR will be requested to advise the UT Environmental Health and Safety Officer and the UT Office of the Senior Vice President and Chief Financial Officer.
7. The Director's designee will disseminate information from the Director or Facility Manager as required and receive status reports from each supervisor as preparations are completed, or problems are encountered.
8. The Director's Communications Coordinator will email all UTMSI staff the SWAP and reminder of emergency communication methods. The coordinator will charge the camera and maintain it off-campus for re-entry.
9. If storm conditions worsen and evacuation of the City of Port Aransas is ordered during SWAP Phase I, the Communications Coordinator will contact CNS to activate the UTMSI homepage to an emergency information page.
10. Administration leads will print and have at least one hard copy of the SWAP on-hand.
11. Fiscal office to notify boat slip owners by email of the evacuation order and recommend that they remove the vessels.

Information Technology (IT) – when informed that SWAP Phase I has been initiated, IT staff

will be called upon to report to the IT Offices to perform the following tasks.

1. Back up all IT computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each IT staff person is responsible for their respective back- up drive(s) safety and security. Avoid the need for transporting hard copies of documents/files by digitizing and routinely saving them to computers.
2. Remove all loose items on IT office desktops, benchtops, and shelves and store them in drawers, cabinets, or waterproof containers.
3. Assist students, faculty, staff, and administration in backing-up data and completing office/laboratory preparations as needed.
4. Store mobile hotspot units (mifi) in an accessible watertight container with operation instructions. One should be stored in the Director's office, and ARK. During winter weather, distribute to student point of contact(s).

Faculty, Science Staff, and Students (including NERR, Library, Patton Center, Bay Education Center, and ARK staff) – when informed that SWAP Phase I has been initiated, all faculty, science staff, students, NERR, library, and ARK staff must report to work as instructed. All supervisors will meet with their staff and students to inform and implement actions that must be completed, which will include:

1. Back up all critical computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each faculty, staff, and student is responsible for their respective backup drive(s) safety and security. Avoid the need for transporting hard copies of files by digitizing and electronic storage for portable backup purposes.
2. Prepare to suspend or terminate all experiments involving cultures, radioactive agents, and hazardous chemicals. Ensure the safe and appropriate disposition of all hazardous and biotic materials.
3. Ensure that all hazardous solvents, acids, bases, and chemicals are secured in marked cabinets or enclosures. No hazardous materials should be located on the ground floors of Institute buildings. Post updated hazardous solvent and chemical inventory on storage enclosures and laboratory doors as required.
4. FAML and Patton Center faculty, staff, and students will take appropriate precautionary measures to safeguard aquaculture systems and fish stocks. The Director will designate technical trades or grounds staff to assist in FAML preparations.
5. For a tropical event, remove all loose items from desktops, benchtops, and open shelves and store them in drawers, cabinets, or waterproof containers.
6. Critical information on potential hazards on return to labs after storm damage should be reviewed. Faculty need to maintain an accurate chemical inventory on EHS Assistant;

this will not only expedite the process but can be done ahead of hurricane season. Preparations to minimize damage, spills, and contamination should be completed. Laboratory managers' primary contact information should be verified with the Director's Administrative office. Copies of emergency plans and hazardous materials within laboratories must be updated and posted on each hazardous materials enclosure and respective laboratory doors.

7. Advance preparations for evacuation and safeguarding intellectual property (data, records, preserved specimens, breeding stock, etc.) should be made, including reserving off-site freezer space and data storage.
8. ARK staff must secure all miscellaneous outdoor items for a tropical event. Take appropriate precautionary measures to safeguard animal keep systems and animals. As proper and feasible relocate animals to mainland animal rehabilitation facilities. The Director will designate technical trades or grounds staff to assist in ARK preparations as needed. ARK should provide a staging area plan to Director for the cold stun event.
9. ARK and FAML shall determine one point of contact for recovery operations and communicate who it shall be with msi-leads@utlist.utexas.edu Secure if needed, Port Aransas housing in the event of freeze for essential personnel.
10. In winter weather, FAML and ARK staff shall ensure heat pumps are operational and provide WD40 and drinking water in the staging area.
11. Lab managers must ensure that all subordinate staff and students provide their contact information, communicate their evacuation plans, and report as feasible with physical locations and safety status during and after evacuation.
12. Faculty and supervisors to review SWAP and prioritize needs for efficient workflow for personnel; in the event of rapid intensification of a storm or arrival over a weekend, faculty need to prioritize SWAP tasking.

Technical Trades and Grounds Staff – when informed that SWAP Phase I has been initiated, all Technical Trades and Grounds staff must report to work as instructed. All supervisors will meet with their team at the maintenance compound to inform and implement actions that must be completed, which will include Phase I duties to secure all UTMSI facilities and grounds.

Tropical Weather

1. Secure physical plant buildings and shops by relocating all loose materials, implements, equipment, etc., to garages, storage rooms, or buildings.
2. Remove all loose items from desktops, benchtops, and open shelves and store them in drawers, cabinets, or waterproof containers.
3. Distribute and install storm shutters on all dormitories, apartments, and buildings equipped for storm shutters.
4. Check emergency and smaller generators for operation and top off the fuel supply, oil, and coolant. Move smaller generators from the ground floor to second-floor staging areas.
5. Fuel all vehicles and park ready for use in assigned garages.
6. Move tractors and trailers to assigned garages or warehouse.
7. Assist where and when possible, in all emergency procedures required by students and scientific staff at the Channel View and FAML campuses. At the Port Street campus turn off the gas that services FAML (S120) at the meter (this action does not include the Center for Coastal Ocean Science).
8. Fill seawater clarifier's reservoirs.
9. Prepare the Lund House: Close exterior Bermuda shutters, roll down and lock elevator roll down door, drain hot water heater, move porch furniture inside, empty freezer and refrigerator of any items that may spoil, move address sign and trashcans to the bottom storage closet, and check that the front and back door are locked. Turn off the irrigation water system.
10. Secure any loose materials on UTMSI grounds and around buildings that may become airborne under high wind conditions.
11. Secure lids/tops, label all hazardous material (diesel, gasoline, waste oil), and relocate them to the hazardous waste storage building. Coordinate this relocation with the hazardous waste officer or safety officer. No hazardous materials should be located on the ground floors of Institute buildings.

12. Secure, if needed, Port Aransas housing for essential personnel.

Winter Weather

1. Check emergency and smaller generators for operation and top off the fuel supply, oil, and coolant. Move smaller generators from the ground floor to the second-floor staging areas.
2. Weatherize exterior water pipes. Shut off water to the building when possible and set hose bibs and faucets to drip when not possible.
3. Weatherize any empty student housing units.
4. Fuel all vehicles and park ready for use in assigned garages.
5. Assist where and when possible in all emergency procedures required by students and scientific staff at the Channel View and FAML campuses.
6. Fill seawater clarifier's reservoirs. Fill two freshwater reservoirs in the CCA building.
7. Place four buckets in the first-floor administration lounge to facilitate toilet flushing in case of prolonged water loss.
8. Review plumbing added to stock for PVC pipes and valves.
9. Check the lock on the FAML west gate to ensure it is working.
10. Turn off and drain domestic water at Channel View Pier and the Port Street Pier.

Marine Operations Staff – when informed that SWAP Phase I has been initiated, the Marine Operations staff must report to work as directed. The supervisor will meet with their team at a predetermined location to inform and implement actions that must be completed, including SWAP Phase I duties securing all boats. Marine Operations hourly or part-time staff may be contacted to assist in the following preparations. Other available staff may also be reassigned to assist as needed.

Tropical Weather

1. Fuel small boats and relocate to secure storage areas in garages or the warehouse.
2. Back up computer(s) in the boathouse on to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. The marine operations supervisor is responsible for the safety and security of backup drives. Avoid the need for transporting hard copy documents/files by digitizing and routinely saving to computers.
3. Remove all loose items from desktops, benchtops, and open shelves and store them in drawers or cabinets.

4. Relocate valuable parts, supplies, and appropriate equipment from the lower floor of the Marine Operations building to physical plant storerooms or the warehouse.
5. Ground tackle, mooring lines, and storm mooring lines for R/V KATY will be staged and ready for deployment on instruction from the Director or their designee.
6. Secure any loose materials on marina grounds and around buildings that may become airborne under high wind conditions.
7. Secure lids/tops, label all hazardous material (diesel, gasoline, waste oil), and relocate them to the hazardous waste storage building. Coordinate this relocation with the hazardous waste officer or safety officer. No hazardous materials should be located on the ground floors of Institute buildings.

Assist students and scientific staff with all required emergency procedures where and when possible.

Custodial Staff, including Cafeteria - when informed that SWAP Phase I has been initiated, Custodial Staff must report to work as directed. Supervisors will meet with their staff at a predetermined location to advise and implement actions that must be completed, including the following Phase I duties.

Tropical Weather

1. Back up all critical computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Custodial supervisors are responsible for their respective backup drive(s) safety and security. Avoid the need for transporting hard copies of documents/files by digitizing and routinely saving them to computers.
2. Relocate all hazardous cleaning solvents and chemicals from the ground floor to the wet-lab area of the research wing. No hazardous materials should be located on the ground floors of Institute buildings.
3. Remove all loose items from desktops, benches, and open shelves and store them in drawers or cabinets.
4. Ensure that all hazardous items, e.g., cleaning solvents and chemicals in dormitories, are secured in cabinets (elevated cabinets for ground floor units). No hazardous materials should be located in floor cabinets in ground floor units.
5. In the dormitory, remove all loose items from desktops, tables, countertops, and open shelves and store them in drawers, cabinets, or waterproof containers.

Assist students and scientific staff with all required emergency procedures where and when possible.

Winter Weather - Cafeteria

1. Coordinate with Director Designee to purchase non-perishable food items for undergraduate and graduate students and essential personnel staying on campus.

Security Staff - when informed that SWAP Phase I has been initiated, all Security Staff must report to work as directed. The security supervisor will meet with staff to advise and implement actions that must be completed, including the following Phase I duties.

1. Notify UTPD that UTMSI SWAP Phase I preparations have been initiated and verify radio contact and coordination with Port Aransas Police Department, EMS, and Fire Department.
2. Perform security patrol duties with heightened vigilance until the Director or the Director's designee is relieved. Do not interrupt security patrol duties to assist others unless requested assistance can be rendered quickly or unsafe circumstances are encountered. Report to the Director or his designees any difficulties, occurrences, or events bearing on the safety and security of UTMSI students, employees, and facilities.

Tropical Weather

1. Back up all Security Office computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. The Security Supervisor is responsible for the safety and security of backup drive(s). Avoid the need for transporting hard copies of documents/files by digitizing and routinely saving them to computers.
2. Remove all unnecessary loose items from desktops, benches, and open shelves and store them in drawers or cabinets. Prepare to lock or tape shut all easily opened drawers and cabinet doors, and stage sheet plastic to cover desks/computers/cabinets, benches, and file cabinets in Security Office to protect from water penetration of the building if evacuation of UTMSI is ordered. An emergency box with plastic and tape will be supplied.
3. If the Director or their designee orders evacuation of UTMSI, be prepared to relocate all essential security equipment to the administrative office on the second floor of the administration building.
4. Assist the Port Aransas Police Department with pre-positioning emergency rations, water, and supplies in the Estuarine Research Center for use following storm passage.
5. As conditions dictate, secure the UTMSI security vehicle under the ERC building and prepare to initiate volunteer vehicle evacuation if instructed by the Director or their designee.

Safety Staff - when informed that SWAP Phase I has been initiated, all Safety Staff members must report to work as directed. The safety officer will meet with staff to advise and implement actions that must be completed, including the following Phase I duties.

1. Report to UT-EHS staff that SWAP Phase I has been initiated.

2. Aid the scientific staff, where needed, to ensure that all hazardous solvents, acids, bases, and chemicals are secured in appropriately marked cabinets or enclosures. No hazardous materials should be located on the ground floors of Institute buildings. Post updated hazardous solvent and chemical inventory on storage enclosures and laboratory doors as required.
3. Mark areas of large volumes of hazardous material storage on the building schematic diagrams. Take pictures of these diagrams and send them to msi-admin@utlists.utexas.edu and upload it to the UTbox entitled "Emergency Response."
4. Lab-pack hazardous waste (seal in 30-gallon drums containing chemical absorbent) located in the hazardous waste storage building and radiological storage building. Mark the sealed drums with bold lettering "UTMSI Hazardous Waste" and, if possible, elevate them off of the ground.
5. Check the status of the Maintenance, Grounds, and Marine staff to ensure their hazardous materials have been moved to the designated storage area (Hazardous Waste Storage Building).

Each UTMSI unit supervisor will inform the Director or his designee as SWAP Phase I preparations are completed or if any unexpected difficulties are encountered and be available to assist other departments.

When the Director or Director's designee has determined that all SWAP Phase I preparations are completed, the Director or their designee will instruct employees and students to attend to their personal/family preparations and await further instructions for stand-down or escalation SWAP Phase II Tasking.

SWAP PHASE II

SWAP Phase II will be declared when evacuation notification is imminent or tropical-storm-force winds, or severe winter weather is projected to reach UTMSI within 54 hours or more if conditions dictate, such as the issuance of a Tropical Storm/Hurricane Warning covering Port Aransas. If SWAP Phase II is declared after working hours or on the weekend, the Director or their designee will recall vehicle transport volunteers and lead staff needed to complete any SWAP Phase I preparations that have not already been completed. All others should comply with local jurisdictional directives concerning personal preparation or evacuation.

As each UTMSI unit completes their assigned SWAP Phase II tasking and reports their status to the Director or his designee, they will be released to complete personal/family preparations for evacuation. It is intended that all SWAP Phase I & II tasks be completed and personnel released before issuing an Evacuation notice by the City of Port Aransas or Nueces County.

Alternate and lesser precautions may be taken, as approved by the Director or their designee, in the event of lesser weather disturbances. If the Director is unavailable, the Facility Manager will

assume these responsibilities. If the Director and Facility Manager are unavailable, the Associate Director for FAML will take responsibility.

Undergraduate and Graduate Students – SWAP Phase II Tasks:

1. Disperse in pre-established teams to complete preparations at apartments/cottages/houses.
2. Report to faculty advisors at UTMSI to continue emergency preparation of offices and laboratories.
3. Confirm your evacuation plans with your faculty advisor.
4. For tropical weather: Just before evacuation, students in campus housing shall take a photo of rooms and send them to msi-admin@utlist.utexas.edu. The purpose is to document pre-storm conditions. As a reminder, university insurance does not cover personal belongings.

Tropical Weather

1. Congregate and securely cover in sheet-plastic all furnishings to protect from water penetration of the housing unit. An emergency box with plastic and tape will be supplied in each unit.
2. Back up all computers in apartments/cottages/houses to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each student is responsible for the safety and security of their own back- up the drive(s).
3. Take photographs of the items in your apartment/cottage/house drawers and cabinets.
4. Lock or tape shut all easily opened drawers and cabinet doors. Make sure you take the key with you.
5. Secure your go-bag for evacuation, including your office/laboratory personal items.

Winter Weather

1. Wrap all exterior pipes and turn off water heater valves. Before freezing temperatures are forecasted to begin, set exterior and interior water faucets to a low drip. This is mandatory if campus residents evacuate or are already out of town.
2. In severe winter weather, the power grid will likely be stressed, and any energy conservation is supported, such as unplugging unnecessary appliances lowering thermostat temperature (68°F if evacuating), and delaying laundry.
3. Coordinate with the Director Designee a plan of action for meals if there is an extended power failure.

Administration including Fiscal Office– SWAP Phase II tasks:

1. Notify all staff and students that SWAP Phase II has been initiated and convey any information from the Director as instructed.
2. Notify the CNS Dean and Associate Dean for Facilities and Research in Austin and the UT Office of Emergency Preparedness (OEP) in Austin that SWAP Phase II preparations have been initiated at UTMSI and that evacuation is imminent. The Dean's Office and OEPR will be requested to advise the UT Environmental Health and Safety Officer and the UT Vice President's Office.
3. Assimilate all SWAP Phase I and II status reports from all unit supervisors as preparations are completed. As conditions dictate, reports must be transmitted by email, phone/verbal transcript, or written document.
4. Verify that faculty advisors and the administration staff have records of student and staff emergency contact information and evacuation plans. As conditions dictate, updated records will be transmitted by email, phone/verbal transcript, or written document.
5. Verify that the UTMSI Emergency 800 number is updated, activated, and disseminated to all staff.
6. Verify with the security supervisor that all exterior doors to Institute buildings are locked and that the magnetic door lock system has been disabled.
7. The fiscal office will disburse emergency cash of \$1,000 to Director or their designee.
8. HR will work with CNS to create and approve assignment and payroll documents and fellowship and tuition payments if we cannot get back online promptly.

Tropical Weather

1. Finalize vehicle and power equipment asset list (vehicles, boats, trailers, tractors, mowers, etc.)
2. Verify with the Facility Manager that all vehicles are secured in the garages or that volunteer drivers to evacuate vehicles have been engaged and given possession of cars.
3. Verify with the boat operations supervisor that all small boats have been relocated to the warehouse and that R/V KATY has been secured with storm moorings.
4. Back up all office computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each employee is responsible for their backup drive(s) safety and security.
5. Take photographs of the items in your office drawers and cabinets. Lock or tape shut all easily opened drawers and cabinet doors. Take the key with you. Securely cover in sheet plastic all equipment, desks/computers/cabinets, and file cabinets in the Administrative Offices, Fiscal Offices, and central files room to protect from water penetration of the

building. An emergency box with plastic and tape will be supplied.

Information Technology – SWAP Phase II Tasks:

1. Any remaining Phase I preparations must be completed.
2. Verify that emergency website information with CNS is active.
3. Distribute Mifi's to the Director's office, ARK, and FAML. Distribute to student points of contact(s) during winter weather. Notify essential personnel [animal attendants, maintenance, student point of contact(s), EHS] location of walkie-talkies.

Tropical Weather

1. Back up all IT computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each employee is responsible for their backup drive(s) safety and security.
2. Take photographs of the items in your office drawers and cabinets. Lock or tape shut all easily opened drawers and cabinet doors. Take the key with you. Securely cover in sheet plastic all equipment, desks/computers/cabinets, and file cabinets in the IT office to protect from water penetration of the building. An emergency box with plastic and tape will be supplied.
3. Assist with relocating all ground floor computers that are not being evacuated to the second floor, fiscal office computers to the administrative office, and all others to classroom M201. Ensure computers are labeled with the owner's name or location.

Faculty, Science Staff, and Students (including NERR, Library, Patton Center, Bay Education Center and ARK staff) – SWAP Phase II Tasks:

1. Any remaining SWAP Phase I preparations must be completed.
2. Terminate all experiments involving cultures, radioactive agents, and hazardous chemicals. Ensure the safe and appropriate disposition of all hazardous and biotic materials.
3. For tropical weather, back up all critical computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each employee is responsible for their backup drive(s) safety and security.
4. For tropical weather, take photographs of the items in your office drawers and cabinets. Lock or tape shut all easily opened drawers and cabinet doors. Take the key with you. Securely cover in sheet plastic all equipment, desks/computers/cabinets, lab benches, and file cabinets in offices and laboratories to protect from water penetration of the building. An emergency box with plastic and tape will be supplied.
5. Forward email to msi-admin@utlists.utexas.edu final emergency contact information and

evacuation plans for students, staff, and faculty members.

6. Seawater tanks should be set to recirculation rather than flow-through. Implement any remaining lab-specific internal emergency procedures.
7. Power down all non-essential equipment and disconnect from the power grid.
8. Shut off all gas supplies to instrumentation. Ensure that all gas cylinders are secured. Remove regulators and install transport caps where possible.
9. Close sash on all chemical and biological fume hoods.
10. For winter weather, NERR staff should shut off all water at the Bay Education Center and set the thermostat to 68°F.
11. ARK and FAML point of contact(s) shall fill containers with drinking water and place them in the staging area.
12. Verify that ALL SWAP Phase I & II preparations are complete and that laboratories and offices are ready to be vacated.
13. Each faculty will upload photos of their lab that show lab preparation conditions. Photographs shall be uploaded to [UTbox](#) with file names labeled with the building abbreviation, room, and date. Example “S66_R3.203_20210517.jpg” Building abbreviations are listed in the same [UTbox](#) folder.
14. Any remaining SWAP tasks to prepare all UTMSI facilities for evacuation must be completed. Final information about planned evacuation locations for staff should be collected and delivered/emailed to administration staff. All information on SWAP preparation’s status will then be forwarded to the Director. Once duties have been completed, supervisors must inform the Director to confirm that staff can be released.

Technical Trades and Grounds Staff – Phase II Tasks:

1. Any remaining SWAP Phase I preparations must be completed with a heightened sense of urgency.
2. For tropical weather, take photographs of the items in your office drawers and cabinets. Lock or tape shut all easily opened drawers and cabinet doors. Take the key with you. Securely cover in sheet plastic all equipment, desks/computers/cabinets, benches, and file cabinets in offices and shops to protect from water penetration of the building. An emergency box with plastic and tape will be supplied.
3. Turn natural gas supplies off, including FAML.
4. Turn off water to the older buildings (cafeteria, dorm D, pond area, and pier). All other

water will be left on.

5. DO NOT shut down electric power at UTMSI and FAML.
6. Secure all seawater pumps after ensuring that tanks are full (UTMSI and FAML).
7. Where feasible, remove pumps from the pond area and take them to the maintenance area.
8. Remove one pier pump at the main lab and FAML and secure them in the nearest machine room on site.
9. For tropical weather, transfer all chiller acid chemicals to the main lab's 2nd-floor chiller chambers.
10. For tropical weather, secure all picnic tables upside down and anchor/chain to floor-level concrete slab/pillar.
11. For tropical weather, verify that vehicles are filled with fuel for evacuation by volunteers.
12. For winter weather, weatherize sensitive plants focusing on flowerbeds at entrances.
13. Any remaining SWAP tasks to prepare all UTMSI facilities for evacuation must be completed. Final information about planned evacuation locations for staff should be collected and delivered/emailed to administration staff. All information on SWAP preparations' status will then be forwarded to the Director. Once duties have been completed, supervisors must inform the Director to confirm that staff can be released.

Marine Operations Staff – SWAP Phase II Tasks:

1. Any remaining SWAP Phase I preparations must be completed.
2. Any remaining SWAP tasks to prepare all UTMSI facilities for evacuation must be completed. Final information about planned evacuation locations for staff should be collected and delivered/emailed to administration staff. All information on SWAP preparations' status will then be forwarded to the Director. Once duties have been completed, supervisors must inform the Director to confirm that staff can be released.

Tropical Weather

1. Back up computer(s) in the boathouse to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each employee is responsible for their backup drive(s) safety and security.
2. Take photographs of the items in your office drawers and cabinets. Lock or tape shut all easily opened drawers and cabinet doors. Take the key with you. Securely cover in sheet plastic all equipment, desks/computers/cabinets, benches, and file cabinets in offices and shops to protect from water penetration of the building. An emergency box

with plastic and tape will be supplied.

3. Relocate *R/V KATY* to the center of the marina and moor with storm lines to the four hurricane bollards.
4. Secure picnic tables and benches in the KATY pavilion by turning them upside down.

Custodial Staff, including Cafeteria – Phase II Tasks

1. Any remaining Phase I preparations must be completed.
2. Verify that emergency power is connected to the cafeteria freezers and refrigerators.
3. Take a photo inventory of freezer and refrigerator contents.
4. Any remaining SWAP tasks to prepare all UTMSI facilities for evacuation must be completed. Final information about planned evacuation locations for staff should be collected and delivered/emailed to administration staff. All information on SWAP preparations' status will then be forwarded to the Director. Once duties have been completed, supervisors must inform the Director to confirm that staff can be released.

Tropical Weather

1. Back up all critical computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each employee is responsible for their backup drive(s) safety and security.
2. Take photographs of the items in your office drawers and cabinets. Lock or tape shut all easily opened drawers and cabinet doors. Take the key with you. Securely cover in plastic all equipment, desks/computers/cabinets, benches, and file cabinets in offices and storage rooms to protect from water penetration of the building. An emergency box with plastic and tape will be supplied.
3. Elevate, secure and cover in sheet plastic all other non-hazardous supplies and equipment to protect from water penetration or ground-level flooding of the building. An emergency box with plastic and tape will be supplied.
4. Dispose of perishable foodstuffs in the cafeteria that cannot be saved.
5. Relocate computers, register, and critical records to the administration building's second-floor video classroom, room M201.
5. Secure all picnic tables and benches by turning them upside down.

Security Staff – SWAP Phase II Tasks

1. Any remaining SWAP Phase I preparations must be completed.

Tropical Weather

1. Back up all Security Office computers to either UT Box, UT Backup ([Crashplan](#)), or a portable hard drive. Each employee is responsible for the safety and security of their own backup drive(s).
2. Relocate all essential security computers and equipment to the administrative office on the second floor of the administration building.
3. Take photographs of the items in your office drawers and cabinets. Lock or tape shut all easily opened drawers and cabinet doors in the security office. Take the key with you. Cover cabinets, benches, and file cabinets in the Security Office with sheet plastic to protect from water penetration of the building. An emergency box with plastic and tape will be supplied.
4. Stage road barricades in a location that is sheltered yet easily accessible if needed during a recovery phase.
5. Make final patrol of facilities to ensure all buildings are properly locked and secured prior to evacuation.
6. Secure security patrol vehicle below the ERC building or engage volunteer transport for evacuation as instructed by the Director or their designee.

Safety Staff – SWAP Phase II Tasks

1. Any remaining SWAP Phase I preparations must be completed.
2. Report to UT-EHS staff that SWAP Phase II has been initiated.
3. Take pictures of the hazardous waste storage building and radiological material storage building. In addition, take pictures of areas with large volumes of hazardous materials around the Institute. Upload this information to the UTbox emergency folder.
4. Set up Hobos loggers in laboratories.
5. Any remaining SWAP tasks to prepare all UTMSI facilities for evacuation must be completed. Final information about planned evacuation locations for staff should be collected and delivered/emailed to administration staff. All information on SWAP preparations' status will then be forwarded to the Director. Once duties have been completed, supervisors must inform the Director to confirm that staff can be released.

ALL PERSONNEL MUST EVACUATE UTMSI FACILITIES, INCLUDING ALL HOUSING UNITS, WHEN NOTIFIED BY THE DIRECTOR OR THEIR DESIGNEE.

ALL STAFF AND STUDENTS - Final information on evacuation plans, routes, and destinations for staff and students should be reported to supervisors and then to msi-admin@utlists.utexas.edu. Upon arrival at the planned or unplanned evacuation destination, all employees and students are requested and strongly encouraged to notify their immediate supervisor/advisor of their location and physical condition and to update any changes to emergency contact information.

GLOSSARY

Tropical Depression: A tropical cyclone with maximum sustained winds of 38mph (33 knots) or less.

Tropical Storm: A tropical cyclone with maximum sustained winds of 39 -73mph (34-63 knots).

Hurricane: A tropical cyclone with maximum sustained winds of 74mph (64 knots) or higher.

Major Hurricane: A tropical cyclone with maximum sustained winds of 111mph (96 knots) or higher.

Tropical Storm Watch: An announcement that tropical storm conditions are possible within a specified area within 48 hours.

Tropical Storm Warning: An announcement that tropical storm conditions are expected within a specified area within 36 hours in association with a tropical, subtropical, or post-tropical cyclone.

Hurricane Watch: An announcement that hurricane conditions are possible within a specified area. Because outside preparedness activities become more difficult once winds reach tropical storm force, watches are issued 48 hours in advance of the anticipated onset of tropical-storm-force winds.

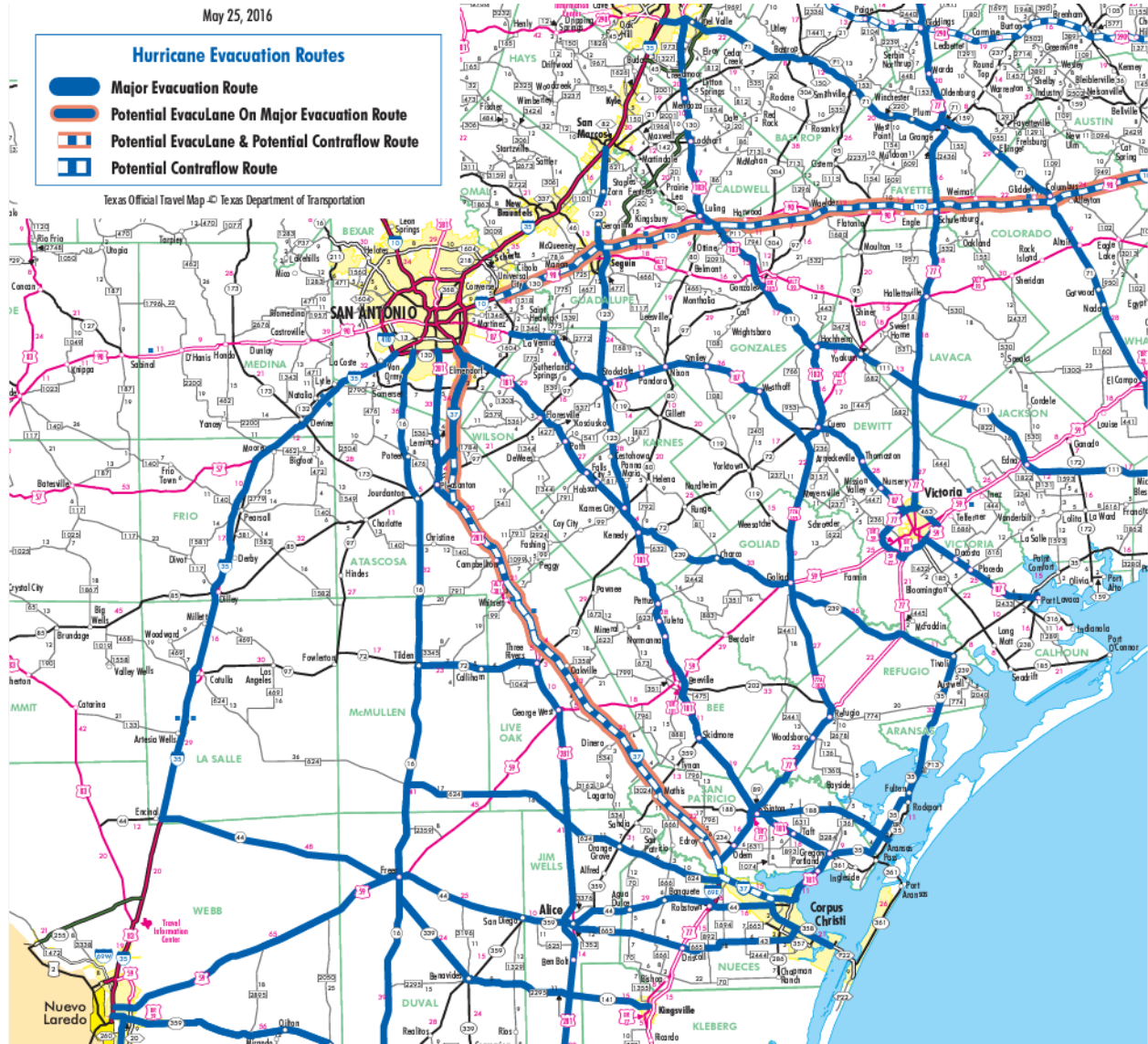
Hurricane Warning: An announcement that sustained winds of 74 mph (64 knots) or higher are expected somewhere within the specified area in association with a tropical, subtropical, or post-tropical cyclone. Because hurricane preparedness activities become difficult once winds reach the tropical storm force, the warning is issued 36 hours in advance of the anticipated onset of tropical-storm-force winds.

Saffir-Simpson Hurricane Wind Scale

- Category 1* 74-95 mph (64-82 kt)
- Category 2* 96-110 mph (83-95 kt)
- Category 3* 111-129 mph (96-112 kt)
- Category 4* 130-156 mph (113-136 kt)
- Category 5* 157 mph (137 kt) or higher

EVACUATION MAP

<https://www.ctexas.com/services/public-safety/evacuation-routes-maps>



RETURNING TO UTMSI

The regional Emergency Management Plan specifies four tiers of re-entry to Mustang Island following a tropical storm:

1. First responders (search and rescue personnel); essential public employees.
2. Immediate mass care and assessment (must travel in marked vehicles and possess valid regional agency credentials).
3. Restoration of essential services, point of distribution and other support operations.
4. Business operators and residents of the impacted areas.

Only individuals possessing a letter of authorization will be allowed to return prior to Tier Four general re-population. In addition, all persons should have in their possession an official government agency identification card (i.e., driver's license) or utility bill showing the individual's name and local address. UTMSI non-resident employees and students should have in their possession a UT identification card. These may be required to obtain re-entry to the area. There will be layers of security through which residents must pass, and it should be anticipated that Federal, State, and local authorities will restrict passage to those without proper identification.

DO NOT ATTEMPT TO RETURN TO PORT ARANSAS OR UTMSI UNTIL SPECIFIC INSTRUCTIONS TO DO SO HAVE BEEN ANNOUNCED ON TELEVISION OR RADIO, POSTED ON THE CITY'S WEB SITE (www.cityofportaransas.org), POSTED ON THE PORT ARANSAS SOUTH JETTY WEB SITE (www.portasouthjetty.com), OR POSTED ON THE UTMSI EMERGENCY WEB SITE OR 800 EMERGENCY CONTACT LINE, OR FACEBOOK PAGE (@UTMSI).

The Director or their designee will relocate to the Nueces County Emergency Command Center as long as disaster conditions exist.

All Staff - When return access authorization is received by the Director or his designee, the recorded message on the emergency 1-800 voice mail will be changed accordingly. Those individuals who are determined to be required will be notified directly, if possible, or through emergency web site or 800 emergency contact number.

The Director, Director of External Affairs, and Communications Coordinator will develop any public information releases to regional news media or the City so that radio and television broadcasts can keep UTMSI status current.

When it is safe and appropriate to do so, the Director will call an all-hands meeting to inform staff of the status of recovery operations.

Damage Assessment - It is anticipated that the Director and his critical response team will be permitted access to the island to conduct a damage assessment of UTMSI. They will survey all buildings and rooms and make an initial assessment to the County Judge, Mayor, the Chief of Police, and Nueces County Emergency Command Center. The Director or his designee will establish contact with CNS Dean and Associate Dean for Facilities and Research, UT Office of Emergency Preparedness (OEP), and the UT Comptroller's Office Insurance Specialists in Austin. The Laboratory Safety Officer will establish contact with the UT Office of Environmental Health and Safety to discuss activating the Emergency Response Deployment Team. The Security Supervisor will establish a connection with UTPD regarding additional security measures for the campus as needed.

CAMPUS CLOSURE AND RECOVERY

Undergraduate and Graduate Students

1. Update msi-admin@utlists.utexas.edu and the supervisor of your whereabouts and contact number change.
2. Monitor the UTMSI website and your email for campus closure and return updates.
3. In winter weather, survey facilities for damage and report with location, room number, photo, and brief description to msi-maint@utlists.utexas.edu

Administration, including Fiscal Office

1. Communications on recovery operations will be distributed through email and the UTMSI website.
2. Communicate with those that evacuated vehicles.
3. Director will identify and coordinate leads (FAML, ARK, NERR, Marine Operations) to work with the disaster response team to take photos and make decisions about damage assessments.
4. For tropical weather, immediately upon re-entry, take photos of every exterior building and room on campus. Coordinate with NERR staff to take pictures of Bay Education Center, Fennessey Ranch, and System-wide Program Monitoring stations.

Information Technology (IT)

1. IT will set up mobile internet devices.

Faculty, Science Staff, and Students (including NERR, Library, and ARK staff)

1. Monitor the UTMSI website and your email for campus closure and return updates.
2. Faculty to ensure that essential equipment that requires emergency power is labeled correctly and plugged into emergency circuits.

3. Complete animal health check and systems check. Document any damages, including location, room number, photo, and a brief description, and email to msi-admin@utlists.utexas.edu
4. In winter weather, survey facilities for damage and report to msi-maint@utlists.utexas.edu
5. Check that water pumps/ heat pumps are functioning correctly. Reset all light timers if power is lost.

Technical Trades and Grounds Staff

1. Upon coordinating with the Facility Manager, check emergency generators for operation and top off the fuel supply, oil, and water.
2. Upon coordinating with the Facility manager, begin debris removal.
3. Develop a plan for conditioned and non-conditioned storage.
4. Distribute individual generator units and heaters.
5. In winter weather, survey facilities and document damages, including location, photo, and brief description.
6. Facility manager to communicate with student point of contact(s) in the event of a prolonged power outage. The facility manager will determine and share with msi-leads@utlist.utexas.edu and student points of contact which building will be the command center or warming center in a freeze.

Marine Operations Staff

1. In tropical weather, unmoor R/V Katy.
2. Assist faculty and NERR staff with a marine equipment assessment

Custodial Staff, including Cafeteria

1. Work with facility lead to assess the damage and restore essential cafeteria functions.

Security Staff

1. Place barricades and campus closure signs if needed.
2. Assist Environmental Health and Safety during damage assessments.
3. Coordinate with campus police to patrol campus and buildings.

INFORMATION SOURCES

Emergency Communications - 1-800-689-0743, Internet: www.utmsi.utexas.edu

All staff and students should check the UTMSI homepage or call the UTMSI Emergency 800 number (1-800-689-0743) to determine when it is safe to return to Port Aransas and report to work. The Director and Administration Staff will obtain Conditions in Port Aransas from local authorities. Advisories about returning to the island will be updated periodically on the Emergency number.

The first attempt to contact the emergency 800 number should be made 24 hours after evacuation. Staff should leave a number where they can be contacted and continue to check the voice mail every 12 hours regarding instructions to return to work. Information will also be posted on the UTMSI website (www.utmsi.utexas.edu).

If, for some reason, the emergency number is not working, please use these alternate numbers to receive information about returning to UTMSI:

College of Natural Sciences (Monday-Friday, 8 a.m.-5 p.m.)	1-512-471-3285
Marine Science Office in Austin (Monday-Friday, 8 a.m.-5 p.m.)	1-512-232-5696
Corpus Christi Regional Emergency Operations Center (24 hours daily when activated)	1-361-826-1100

Other Local Numbers

U.S. Coast Guard, Port Aransas	-361-749-5217
Port Aransas Police	-361-749-6241
Aransas Pass Police Dept.	-361-758-5224
Nueces County Constables Office	-361-749-5212

Key Preparation Websites

<http://www.texasprepares.org/>

<https://www.nhc.noaa.gov/>

Facebook NWSCorpus Twitter @NWSCorpus

Texas Health and Human Services: Dial 2-1-1 (This service connects citizens with the services they need.)