Chemical Emergency Spill Plan

The University Of
TAMPA

401 W KENNEDY BLVD

TAMPA FLORIDA 33606

24-HOUR SECURITY 813-257-7777

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When using a paper copy of this document, verify that it is the same revision level as the on-line version.

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I. Background

The University of Tampa is registered with the EPA as a small quantity generator. As a small quantity generator, UT is not required to have a contingency spill plan, however we have prudently planned for responding to released materials on the campus.

II.Chemical Emergency Coordinator

UT has designated a single individual responsible for coordinating all emergency response measures as specified in Title 40 Code of Federal Regulations [CFR] part 262.34 (d)(5)(iv) for hazardous waste generators. The Chemical Emergency Coordinator is Lori K Jennis, CIH.

III. Emergency Contact Telephone Numbers

Call UT Campus Security in the event of an emergency:

813-257-7777 or Extension 7777

Campus security will call the Chemical Emergency Coordinator or their alternate, in descending order.

Lori Jennis (Cell) 813-340-3020

Angela Jordan, Maintenance Manager, UT Facilities

(Cell) 813-695-0089 (Work) 813-257-3034

Lee Ford, Montrose Environmental

(Cell) 813-478-6785

Jamie Michael, Hulls Environmental Services, Inc.

(Cell) 813-760-5551

(24-Hr) 866-450-9077

IV. Purpose and Scope

Definition – A chemical emergency is defined as a situation in which a chemical is not properly contained and poses an immediate threat to the health and safety of persons in proximity to the chemical and the environment.

This written procedure addresses regulatory requirements under 40 CFR 262.34(d) for a small quantity generator of hazardous wastes. This written plan is intended to be used as a reference in the event of a chemical spill or hazardous waste release.

Additional information about UT's chemical safety policies and procedures can be found on the web at https://www.ut.edu/. The information contained on this site includes (but is not limited to) the laboratory chemical hygiene plan, accident reporting forms, information about the hazards of known chemicals and best practices to ensure your personal safety and compliance with state and federal and regulations.

V. Universal Hazardous Waste Storage Locations

Hazardous waste is accumulated and stored in several locations onsite in preparation for offsite disposal. The Thompson Building has a chemical storage shed located north and adjacent to the Thompson Building. This is the main storage site for all universal and hazardous wastes generated onsite from the facilities department & art laboratories. Cass Building Room SC180 and Plant Hall 101 are exclusively for laboratory waste. Waste is accumulated in areas near the generation point including Science Annex 208, Plant Hall 133, and Science Research Laboratories 113. Each of these locations is shown on the attached diagram identified as Figure 1 – UT Campus Map 2024.

VI. Chemical Storage Locations

Chemicals are used or stored on each floor in Plant Hall Science Wing, Cass Building, Cass Annex, Science Research Laboratory, Art Studios, and facilities workshops including the Thompson Building, Grounds Building, and the RAC Pool Pump Rooms. These areas are also identified in Figure 1.

VII. Basic Spill Response Measures

The Chemical Emergency Coordinator or designee will respond with the following applicable responses:

(A) In the event of flame, smoke or fumes from a chemical spill call the fire department;

(B) Contain the flow of liquids to the extent possible, and as soon as is practicable, clean up the waste and any contaminated materials or soil; and

(C) Following a fire, explosion or release event which could threaten human health outside the facility or when the generator has knowledge that a spill has reached surface water, the generator must immediately notify the National Response Center (using their 24-hour toll free number 800-424–8802). The report must include the following information:

(1) The name, address, and U.S. EPA Identification Number of the generator.
(2) Date, time, and type of incident (e.g., spill or fire);
(3) Quantity and type of hazardous waste involved in the incident;
(4) Extent of injuries, if any; and
(5) Estimated quantity and disposition of recovered materials, if any.

VIII. Basic Spill Preparation

Be prepared by knowing the location of fire extinguishers, eye washes, emergency showers, first aid kit, emergency phones, and any other emergency equipment you may have in your space. Know your evacuation route(s). If you are a faculty member or supervisor, make sure your students and staff are aware of this information as early as possible.

IX. Anticipation of Known Chemical Waste Spills

In anticipation of the potential for chemical releases, UT has purchased the necessary equipment (spill kits and personal protective equipment) to

respond to a minor spill. Significant chemical spills should only be cleaned up by knowledgeable and experienced personnel.

Safety Data Sheets [SDSs] contain special spill clean-up information and may be consulted in the event of any spill.

If the spill is too large to handle, is a threat to laboratory personnel or the public, or involves a highly toxic or reactive chemical, call 911 followed by Security **813-257-7777 (xtn. 7777)** to request immediate assistance from emergency response professionals.

The following table outlines the routine hazardous waste materials stored onsite and the suggested response to a small spill event.

Table 1 – Common Response to Anticipated Hazards Onsite

CONTAINER LABEL	POSSIBLE CONTENTS	PHYSICAL AND CHEMICAL PROPERTIES	MATERIAL HAZARDS	SPILL RESPONSE [SMALL]	PERSONAL PROTECTIVE EQUIPMENT
Waste Inorganic Acids	Nitric Acid Hydrochloric Acid Acetic Acid Orthophosphoric Acid	Miscible in Water Pungent Odor	Corrosive	Apply Spill-X-A Acid Neutralizer® to area of spill. Wait at least 20 minutes for neutralization. Collect debris with broom and dustpan into plastic bucket. Wet wipe remaining area with water and collect wipes into bucket. Secure lid and label.	Gloves: Disposable Nitrile Foot: Closed Heavy Shoes or Booties Eye: Goggles or Safety Glasses Body: Disposable Lab Coat or Apron
Waste Corrosive Liquids	Ferric Chloride Solution Ammonium Hydroxide Sodium Hydroxide	Miscible in Water Pungent Odor	Corrosive	Apply Spill-X-C Caustic Neutralizer® to area of spill. Wait at least 20 minutes for neutralization. Collect debris with broom and dustpan into plastic bucket. Wet wipe remaining area with	Gloves: Disposable Nitrile Foot: Closed Heavy Shoes or Booties Eye: Goggles or Safety Glasses

CONTAINER LABEL	POSSIBLE CONTENTS	PHYSICAL AND CHEMICAL PROPERTIES	MATERIAL HAZARDS	SPILL RESPONSE [SMALL]	PERSONAL PROTECTIVE EQUIPMENT
				water and collect wipes into bucket. Secure lid and label. *Do not clean spill with solutions containing ammonia or bleach.*	Body: Disposable Lab Coat or Apron
Organic Waste Semi-Solid	Methylene Chloride in Silica gel	Chloroform-like odor; Combustible, Flash above 99 and below 200 F	Toxic Combustible	Throw universal absorbent media on top of spill [pillow, pad, boom, etc.] or loose absorbent granules [cat litter]. Collect material into a bucket without using tools that may produce a spark. Secure lid and label.	Gloves: Disposable Nitrile Foot: Closed Heavy Shoes or Booties Eye: Goggles or Safety Glasses Body: Disposable Lab Coat or Apron
Organic Waste Liquids	Acetone, Ethanol, Dichloromethane, Propanol, Hexane, Ether, Tetrahydrofuran,	Flash Point ±0 F, Miscible in Water,	Flammable Poison	Throw universal absorbent media on top of spill [pillow, pad, boom, etc.] or loose absorbent granules [cat litter]. Collect material	Gloves: Disposable Nitrile Foot: Closed Heavy Shoes or Booties

CONTAINER LABEL	POSSIBLE CONTENTS	PHYSICAL AND CHEMICAL PROPERTIES	MATERIAL HAZARDS	SPILL RESPONSE [SMALL]	PERSONAL PROTECTIVE EQUIPMENT
	methylene chloride			into a bucket without using tools that may produce a spark. Secure lid and label.	Eye: Goggles or Safety Glasses Body: Disposable Lab Coat or Apron
Waste Silica Gel	Silica, Sodium Sulfate, Cadmium, Barium, Zinc, Copper & Nickel compounds	Non-combustible solid; Odorless; Specific Gravity ≥ 2	Toxic	Collect material into a bucket. Secure lid and label.	Gloves: Disposable Nitrile Foot: Closed Heavy Shoes or Booties Eye: Goggles or Safety Glasses Body: Disposable Lab Coat or Apron
Unused Oil Based Paints	Petroleum-based Polyurethane-based	Combustible, Flash above 99 and below 200 °F; Vapor Density is Heavier than air.	Flammable Liquid Toxic Corrosive	Throw universal absorbent media on top of spill [pillow, pad, boom, etc.] or loose absorbent granules [cat	Gloves: Disposable Nitrile

CONTAINER LABEL	POSSIBLE CONTENTS	PHYSICAL AND CHEMICAL PROPERTIES	MATERIAL HAZARDS	SPILL RESPONSE [SMALL]	PERSONAL PROTECTIVE EQUIPMENT
		Volatile volume approx. 50%		litter]. Collect material into a bucket without using tools that may produce a spark. Secure lid and label.	Foot: Closed Heavy Shoes or Booties Eye: Goggles or Safety Glasses Body: Disposable Lab Coat or Apron
Waste Paint Solvents	Mineral Spirits, Stoddard Solvent, 1,2-4 Trimethylbenzene	Specific Gravity ~ 0.8, Flash Point 102-112 F	Flammable	Throw universal absorbent media on top of spill [pillow, pad, boom, etc.] or loose absorbent granules [cat litter]. Collect material into a bucket without using tools that may produce a spark. Secure lid and label.	Gloves: Disposable Nitrile Foot: Closed Heavy Shoes or Booties Eye: Goggles or Safety Glasses Body: Disposable Lab Coat or Apron

CONTAINER LABEL	POSSIBLE CONTENTS	PHYSICAL AND CHEMICAL PROPERTIES	MATERIAL HAZARDS	SPILL RESPONSE [SMALL]	PERSONAL PROTECTIVE EQUIPMENT
Preserved Specimen Waste	Formaldehyde Formalin Methyl Alcohol	Pungent suffocating odor Miscible in water	Combustible Liquid Flash Point 185 F	Throw formalin-specific absorbent media on top of spill [pillow, pad, boom, etc.] or loose absorbent granules [cat litter]. Collect material into a bucket without using tools that may produce a spark. Secure lid and label.	Gloves: Disposable Nitrile Foot: Closed Heavy Shoes or Booties Eye: Goggles or Safety Glasses Body: Disposable Lab Coat or Apron
Unknown Liquid, Solid or Gas	Unknown	Unknown	Unknown	CALL SECURITY X 7777	N/A

X. Cleaning Up Small Chemical Spills

If you are cleaning up a small spill yourself, make sure that you are aware of the hazards associated with the materials spilled, have adequate ventilation (open windows, chemical fume hood on) and proper personal protective equipment (minimum - gloves, goggles, and lab coat). Consider all residual chemical cleanup materials (adsorbent, gloves, etc.) as hazardous waste. Place these materials in a sealed container and store in a chemical fume hood. Contact the Chemical Emergency Coordinator for disposal instructions.

A. Minor Chemical Spill

- Alert people in immediate area of spill to maintain safe distance.
- Increase ventilation in area of spill (open windows, turn on hoods).
- Wear protective equipment, including safety goggles, gloves, and a long-sleeved lab coat.
- Avoid breathing vapors from spill.
- Use an appropriate spill neutralizer kit. Collect residue, place it in container, and dispose of it as hazardous chemical waste.
- For non-laboratory chemicals absorb spill with vermiculite, dry sand, diatomaceous earth, or paper towels. Collect residue, place it in container, and dispose of it as chemical waste.
- Clean spill area with water or as directed by SDS.

B. Laboratory Drain Spill

Accidental release of chemicals into a sink must be considered a spill event. Many of the laboratory sinks are equipped with bullet traps or common plumbing traps that will contain a small spill with a specific gravity greater than one [s.g.>1]. Contact the Emergency Coordinator to assist with chemical recovery from the drains or to report any unauthorized chemical discharge into the sanitary sewer.

C. Fluorescent Light Bulb Breakage

Fluorescent light bulbs contain a small amount of mercury sealed within the glass tubing. EPA recommends the following clean-up and disposal procedures as outlined below:

Before Clean-up: Air Out the Room

- Have all occupants leave the room being careful not to let anyone walk through the breakage area on their way out.
- Open a window and leave the room for at least 30 minutes.
- Shut off the central forced-air heating/air conditioning system if you have one.
- If available, point a floor or pedestal fan at the open window. Using a ceiling fan will not be as helpful at moving the air out of the window.

Clean-Up Steps for Hard Surfaces

- Wear disposable gloves.
- Carefully scoop up glass pieces and powder using stiff paper or cardboard and place them in a glass jar with metal lid (comparable to a canning jar) or in doubled plastic bags and seal tightly.
- Use sticky tape, such as duct tape, to pick up any remaining small glass fragments and powder.
- Wipe the area clean with damp paper towels or disposable wet wipes. Place towels in a glass jar or plastic bag.
- Do not use a vacuum or broom to clean up the broken bulb on hard surfaces.

Clean-up Steps for Carpeting or Rug

- Carefully pick up glass fragments and place them in a glass jar with metal lid or in doubled plastic bags.
- Use sticky tape, such as duct tape, to pick up any remaining small glass fragments and powder.
- If vacuuming is needed after all visible materials are removed, vacuum the area where the bulb was broken.

- Remove the vacuum bag (or empty and wipe the canister) and put the bag or vacuum debris in a sealed plastic bag.

Clean-up Steps for Clothing and Other Textiles

- If clothing or textiles come in direct contact with broken glass or mercury-containing powder from inside the bulb that may stick to the fabric, the fabric should be thrown away. Do not wash fabric because mercury fragments in the clothing may contaminate the machine and/or pollute sewage.
- You can, however, wash clothing or other materials that have been exposed to the mercury vapor from a broken CFL, such as the clothing you are wearing when you cleaned up the broken CFL, as long as that clothing has not come into direct contact with the materials from the broken bulb.
- If shoes come into direct contact with broken glass or mercury-containing powder from the bulb, wipe them off with damp paper towels or disposable wet wipes. Place the towels or wipes in a glass jar or plastic bag for disposal.

Disposal of Clean-up Materials

- Contact the Emergency Coordinator to confirm disposal requirements.
- Wash your hands after disposing of the jars or plastic bags containing clean-up materials.

D. Mercury Thermometer Breakage

- Have everyone else leave the area; do not let anyone walk through the mercury on their way out. Open all windows and doors to the outside; shut all doors to other parts of the room.
- DO NOT allow students to help you clean up the spill.
- Mercury can be cleaned up easily from the following surfaces: wood, linoleum, tile, and any similarly smooth surfaces.

- If a spill occurs on carpet, curtains, upholstery or other absorbent surfaces, these contaminated items should be thrown away in accordance with the disposal means outlined below. Only cut and remove the affected portion of the contaminated carpet for disposal.

Cleanup Instructions

1. Put on disposable gloves.
2. If there are any broken pieces of glass or sharp objects, pick them up with care. Place all broken objects on a paper towel. Fold the paper towel and place in a zip lock bag. Secure the bag and label contents.
3. Locate visible mercury beads. Use a squeegee or cardboard to gather mercury beads. Use slow sweeping motions to keep mercury from becoming uncontrollable. Take a flashlight, hold it at a low angle close to the floor in a darkened room and look for additional glistening beads of mercury that may be sticking to the surface or in small, cracked areas of the surface. Note: Mercury can move surprising distances on hard-flat surfaces, so be sure to inspect the entire room when searching.
4. Use the eyedropper to collect or draw up the mercury beads. Slowly and carefully squeeze mercury onto a damp paper towel. Place the paper towel in a zip lock bag and secure. Make sure to label the bag as directed by your local health or fire department.
5. After you remove larger beads, put shaving cream on top of small paint brush and gently "dot" the affected area to pick up smaller hard-to-see beads. Alternatively, use duct tape to collect smaller hard-to-see beads. Place the paint brush or duct tape in a zip lock bag and secure. Make sure to label the bag's contents.
6. Place all materials used with the cleanup, including gloves, in a trash bag. Place all mercury beads and objects into the trash bag. Secure trash bag and label its contents.
7. Contact the Emergency Coordinator for proper disposal in accordance with local, state, and federal laws.

8. Remember to keep the area well ventilated to the outside (i.e., windows open and fans in exterior windows running) for at least 24 hours after your successful cleanup.

E. Pool Chemical Pump Leak

The pool pump maintenance building contains Sodium Hypochlorite (concentrated chlorine) and Sulfuric Acid that automatically dispenses into the pool filtration system via PVC conduit. Leaks or pipe ruptures could release highly concentrated corrosive chemicals into the equipment sump area. By design, the sump area will contain the released solution allowing for recovery following spill event.

Fumes released from spilled concentrated corrosives could be irritating to the lungs and eyes. Refer to the Safety Data Sheet for detailed safety information. Follow clean-up and disposal procedures as outlined below:

Before Clean-up: Air Out the Room

- Avoid breathing vapors from spill.
- Have all occupants leave the room being careful not to let anyone walk near the vented windows of the pump room or open door. Use barricade cones or caution tape as needed.
- Wear protective equipment, including safety goggles, gloves, and long-sleeves or a lab coat.
- Open entrance door and aerate before entering.
- Power "Off" pool chlorinator pump system.
- Refer to the Riseman Aquatic Center Water Chemistry & Maintenance Manual for further details to shut down the automatic chemical feeding system and respond to spill cleanup.

Clean-up Steps

- If available, point a floor or pedestal fan at the open doorway. Let operate for at least 30 minutes.
- Contact the RAC Associate Director so that the pool emergency maintenance vendor can be called onsite.

Disposal of Clean-up Materials

- Do not pump out spilled water into the stormwater or pool overflow drains that discharge directly to the Hillsborough River. Use appropriate acid spill neutralizer kit and absorbents. Collect residue, place it in container, and dispose of it as chemical waste if neutralization cannot be achieved.
- Clean spill area with water.

XI. Major Chemical Spill

- Make decisions and act in such a manner to ensure your personal safety.
- Attend to injured persons and remove them from further exposure.
- Alert people in the laboratory to evacuate.
- If spilled material is flammable, turn off ignition and heat sources.
- Close doors to affected area.
- Call Security **813-257-7777 [xtn. 7777]** from a safe location and to await the arrival of security and/or a University representative.
- Inform Security of the hazard(s) that have been created by the emergency (e.g., fumes, flames, or irritating odor).
- Provide the approximate number of employees who may be overexposed and need hospitalization.
- Have a person with knowledge of the incident and laboratory available to answer questions from responding emergency personnel.
- Secure the location by informing all non-emergency personnel that they are to keep away from the area.

- DO NOT TRY TO CLEAN UP AN UNKNOWN CHEMICAL SPILL OR MAJOR CHEMICAL SPILL.
- One or more of the following conditions requires Security to notify 911 immediately:
    - Fire or Explosion;
    - Rupture of bulk storage fuel tanks;
    - Damaged and/or leaking compressed gas cylinder; and
    - Chemical release resulting in personal injury that requires medical service at a hospital.

Arriving Emergency Responders shall be provided with the chemical name and/or trade name of chemical(s) AND preferably, the Safety Data Sheet [SDS].

A. Cleaning Up Major Chemical Spills

Once the chemical release has been confined, restrict site access to University authorized HAZWOPER trained or subcontracted environmental consultants. Only authorized personnel may be involved with containment, cleanup, removal and/or disposal of the released material. This requirement mandates a secure perimeter must always be established during the response activities.

The University of Tampa will enlist the services of an outside consultant to engage in cleanup activities of any major chemical spill. The Tampa Fire Department's Hazardous Materials Response Team will be utilized if an outside consultant is not immediately available for consultation and emergency response.

XII. Emergency Contact Numbers

The following phone numbers may be useful during the initial stages of an emergency:

Department of Campus Safety and Security	xtn. 7777 or 813-257-7777
Emergency Response	911

Tampa General Hospital	813-844-7000

The following list is for the exclusive benefit of the Chemical Emergency Coordinator or their Designate:

Hull's Environmental Services Inc.	866-450-9077
Department of Environmental Protection	813-470-5700
DCA State Warning Point	850-413-9911
National Response Center	800-424-8802
CHEMTREC	800-424-9300

The following page is intended for posting in areas where chemicals are used, stored, or generated. Ideally, this page should be posted next to the telephone or to the right-hand side of doorways as you exit the space.

XIII. IMMEDIATE CHEMICAL EMERGENCY PROCEDURES

A. Evacuate the area and from a safe location call:

Security 813-257-7777 [xtn. 7777]

B. Provide the Security Guard with the following information:

1. State the details of the Chemical Release and
2. Request a Chemical Emergency Coordinator respond [Lori Jennis or alternate from list].
3. Indicate what chemical is involved and the estimated quantity.
4. Give an exact location of the incident by campus building, floor, wing, etc.
5. Describe any known injuries to personnel.
6. Secure the area by alerting other employees to clear the area.

XIV. Emergency Operations Plan

Aside from this document, UT maintains both an Emergency Operations Plan (EOP) and an Emergency Operations Team (EOT). The EOP is the administration's procedural guide for responding to emergency situations in a timely, appropriate, and methodical manner. In emergency situations, The University of Tampa's highest priority is the safety and security of all University community members. Although protection of campus buildings, facilities and property is an important consideration, our commitment is to first provide for the well-being of our students, faculty, and staff.

Any unexpected, time-sensitive emergency (e.g., fire, accident) should be reported immediately to the Campus Safety and Security department (on campus, ext. 7777 or 813-257-7777). Officers are on duty 24 hours a day, seven days a week throughout the year.

For additional information, including evacuation recommendations, shelter locations and detailed driving instructions and maps, refer to UT's Emergency Operations Plan.

XV. Spill Containment and Cleanup Equipment

The following table identifies the minimum amount of spill containment or cleanup materials to be present onsite at any one time. Please contact the Emergency Coordinator should this list be expanded to accommodate any new chemical storage areas or for additional hazardous waste generation sites.

Table

Location	Equipment
Plant Hall Cass Science Annex SRL	30-gallon Hazardous Materials Overpack. Absorbs organics, acids and bases up to 21 gallons, self-contained spill response kit includes: 1 30-Gallon Overpack Salvage Drum 4 10-foot HAZ-MAT Socks 4 HAZ MAT Pillows

Location	Equipment
Bailey Art and Ferman Art Studios RAC Pool	25 HAZ MAT Pads 5 Temporary Disposal Bag and Ties 6 Tamper Proof Labels
Thompson And 1010 Cass Storage	65-gallon Hazardous Materials Overpack spill kit. Absorbs acids and bases up to 39 gallons, self-contained spill response kit includes: 1 65-Gallon Overpack Salvage Drum 8 HAZMAT Socks 5 3" by 10-foot HAZ-MAT Socks 1 5" by 10-foot HAZMAT Sock 5 HAZ MAT Pillows 40 HAZ MAT Pads 10 Temporary Disposal Bag and Ties 6 Tamper Proof Labels
Proximate to Teaching and Research Labs	Spill-X-A Acid Neutralizing Absorbents Spill-X-C Caustic Neutralizing Absorbents Spill-X Universal Neutralizing Absorbents
Grounds Maintenance	Oil-Only Spill Kit – Absorbs up to 23 Gallons. Kit Includes: 3 3" by 48" Oil-Only Socks 12 15" by 20" Oil-Pads w/ Static Eliminator 8 Temporary Disposal Bag and Ties
Extra Storage on hand	Vermiculite, Cat Litter, or Equivalent dry absorbent – [10-50-pound bags]
1 Each	Non-sparking Scoop, Scraper, Shovel

XVI. Chemical Emergency Spill Plan Distribution

This document in its original form shall reside in the Emergency Coordinator's care. The most current version of this plan is located on https://www.ut.edu/. Notice of changes to the online version will be distributed to each of the faculty members or UT employees affected by this procedure.

XVII. Chemical Emergency Spill Plan Amendments

This plan must be reviewed, and immediately amended, if necessary, whenever:

a. Applicable regulations are revised;

b. The plan fails in an emergency;

c. The facility changes—in its design, construction, operation, maintenance, or other way that materially increases the potential for fires, explosions, or releases of hazardous waste or hazardous waste constituents, or changes the response necessary in an emergency;

d. The list of emergency coordinators changes; or

e. The emergency equipment list changes.

Figure 1 – Campus Map Designating Chemical and Hazardous Waste Storage Locations