

UNITED STATES ARMY GARRISON FORT HUNTER LIGGETT

SPILL PREVENTION CONTROL AND COUNTERMEASURES PLAN

FINAL

Prepared for:

United States Army Garrison Fort Hunter Liggett
Directorate of Public Works – Environmental Division
Jolon, California 93928

Prepared by:

HDR
2365 Iron Point Road, Suite 300
Folsom, California 95630

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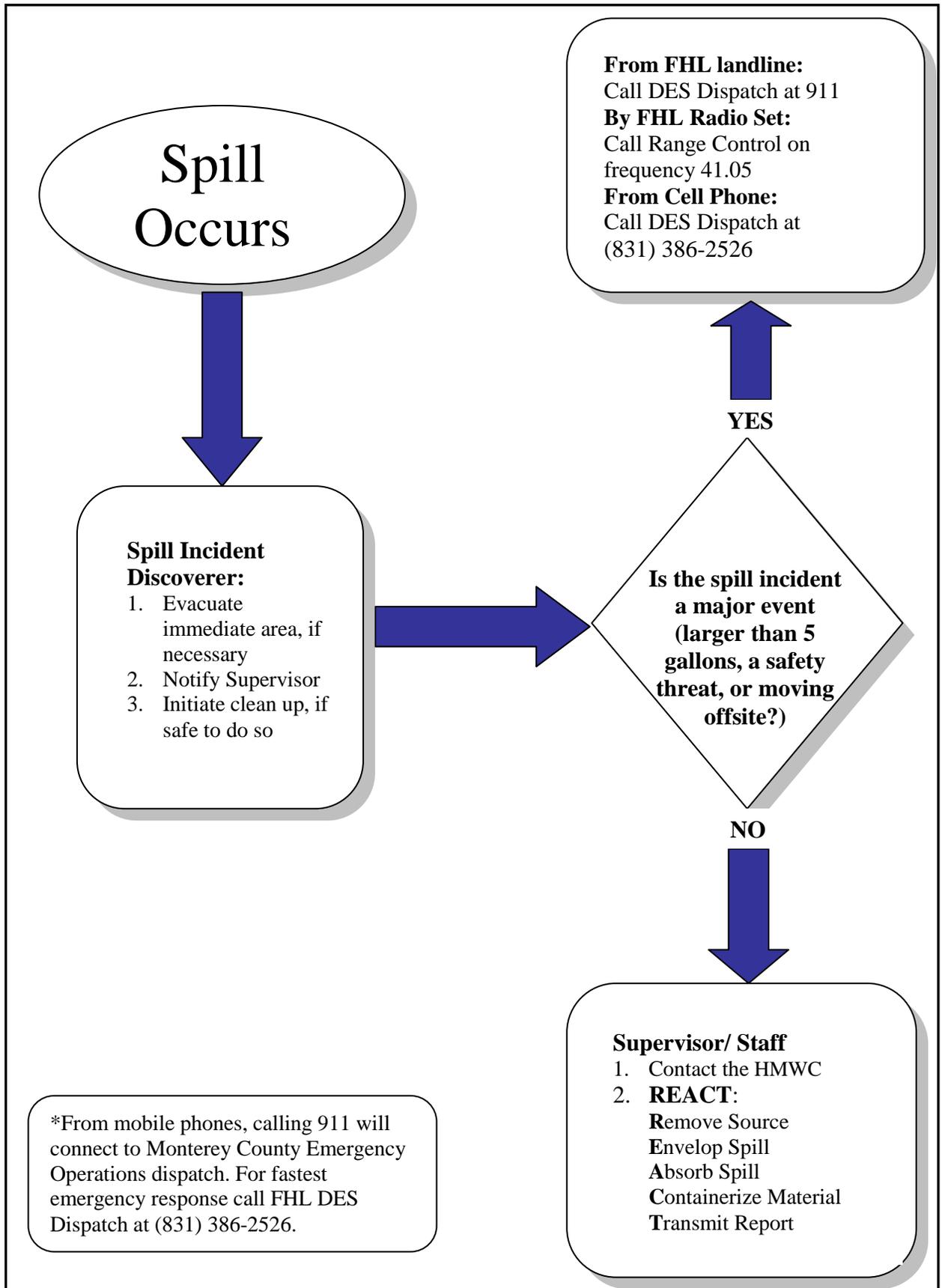
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INITIAL RESPONSE PROCEDURES

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Spill-Response Flowchart



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Initial Spill-Response Procedures

Person Discovering Spill Must:

- STEP 1: Evacuate immediate area if necessary
- STEP 2: Notify supervisor
- STEP 3: Use the information below to classify the spill as minor or major and respond accordingly:

Minor Spill: A spill less than 5 gallons that has not entered a waterway and **can be responded to** using available response equipment and personnel resources **without endangering the welfare of personnel or endangering the environment.**

DO's	<ol style="list-style-type: none"> 1. Facility personnel begin cleanup procedures, if spill is within their capability and training. 2. Contact the Hazardous Materials and Waste Coordinator (HMWC) at (831) 386-2514 to report the spill. Be prepared to provide: <ul style="list-style-type: none"> • Name, facility address, and phone number • Date and time of discharge • Type of material discharged • Estimate of the total quantity discharged 3. Properly handle, manage and dispose of waste according to the <i>United States Army Garrison (USAG) Fort Hunter Liggett (FHL) Integrated Hazardous Material and Waste Management Plan (IHMWMP)</i>.
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Major Spill: Those that the unit, facility or directorate **cannot respond to without endangering the welfare of personnel or greater than 5 gallons.**

DO's	<ol style="list-style-type: none"> 1. Immediately contact DES: <ul style="list-style-type: none"> • From the cantonment area landline dial 911 • By FHL radio set, contact Range Control on frequency 41.05 • From mobile phones, contact FHL DES Dispatch at (831) 386-2526. 2. Be prepared to provide the following: <ul style="list-style-type: none"> • Name, facility address, and phone number • Date and time of discharge • Type of material discharged • Estimate of the total quantity discharged • Source of discharge • Description of all affected areas • Cause of discharge • Damage or injuries caused by the discharge • Actions being used to stop, remove, and mitigate the effects of the discharge • Whether an evacuation has occurred • Names of the individuals or organizations contacted 3. Complete the <i>Spill or Hazardous Substance Release Report Form</i> on page 1-3. 4. Have this Spill Prevention, Control, and Countermeasure (SPCC) Plan available 5. Under direction of the DES select and begin cleanup as outlined in the <i>USAG FHL IHMWMP</i>, or coordinate with the HMWC for clean up assistance 6. Properly handle, manage and dispose of waste according to the <i>USAG FHL IHMWMP</i>.
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DES responders will appoint an Incident Commander (IC) for major spill events, as determined necessary. The IC will assume control and determine if the Installation Operations Center (IOC) needs to be activated. If activated, the IC reports to the IOC and works directly with the SPCC Program Manager, making FHL resources available as needed.

Installation Response Team (IRT) Personnel

Title	Work Phone	HAZWOPER Required
DES	(831) 386-2513	No
DES, Fire Chief	(931) 386-2513	Yes
DES, Chief of Police	(831) 386-2513	Yes
Directorate of Logistics	(831) 386-2407	No
Directorate of Public Works (DPW)	(831) 386-2217	No
Operations and Maintenance Division (O&M)	(831) 386-2514	No
DPWE Compliance Manager	(831) 386-2219	No
DPW HMWC	(831) 386-2514	Yes
Public Affairs Office	(831) 386-2690	No

Chapter 1 Incident Notification Lists and Forms

1.1 Emergency Notifications

For a **major spill** that:

- Involves more than 5 gallons or spreads more than 10 feet in any direction
- Cannot be controlled at the time of release by personnel in the immediate release area
- Results in an emergency response
- Causes injury
- Goes offsite, and/or
- Is released into the environment

Complete the Major Spills section of the Initial Spills Response Procedure (page iii), and notify the DPWE Compliance Manager at (831) 386-2219.

1.2 Federal, State and Local Agency Notifications

If a reportable spill¹ occurs, **only** the DPWE Compliance Manager or his/her designee is responsible for the following agency notifications:

Agency Name	Telephone Number
National Spill Response Center (NRC)	(800) 424-8802
California Environmental Protection Agency (Cal/EPA)	(916) 323-2514
California Emergency Management Agency (Cal/EMA)	(916) 845-8506
Monterey County Health Department (CUPA)	(831) 755-4511

¹ A reportable spill is one that reaches or exceeds the reportable quantity (RQ) listed in the [EPA List of Lists](#), or one that has reached a waterway, left the property, or caused injuries

1.3 Additional Spill and Emergency Response Agencies and Contacts

Agency Name	Telephone Number
U.S. Environmental Protection Agency (USEPA)	(800) 300-2193
USEPA- Superfund Hotline	(800) 424-9346
USEPA - Office of Groundwater and Drinking Water	(202) 564-3750
Toxic Substance Control Act (TSCA) Assistance Info Service	(202) 554-1404
U.S. Army Environmental Command (AEC)	(410) 436-2657
Toxic Information Hotline-Spill	(800) 424-9436
Poison Control Center	(800) 222-1222
U.S. Coast Guard	(202) 372-2100

Spill or Hazardous Substance Release Report Form

Person Reporting: _____ Date: _____

Facility Name: _____ Phone: _____

Facility Address: _____

Facility Commander: _____

Person notified at DPWE: _____

Emergency or Incident: _____

Summary

Source of Spill: _____ Material Spilled: _____

Quantity Spilled: _____ Date and Time of Spill: _____

Cause of Spill: _____

What was the spill area surface made of? _____

Was anyone injured? Describe: _____

Was there any equipment damage? Describe: _____

Was evacuation required? Describe: _____

How was the spill contained? _____

How was the spill cleaned up? _____

Was the Fire Department called? _____

Was the spill-response contractor called? _____

List any additional notifications made: _____

Was there a public reaction? Describe: _____

Plans to prevent reoccurrence: _____

Complete and email or deliver this report immediately to the DPWE.

Email to: michael.b.moeller.civ@mail.mil

Phone: (831) 386-2219

Alternate email: alma.l.zavala.civ@mail.mil

Alternate Phone: (831) 386-2623

U.S. Army Garrison Fort Hunter Liggett

DPWE Bldg. 233

Fort Hunter Liggett, CA 93928-7090

Maintain a copy at the facility for a minimum of three years.

For DPWE Use Only

Is this a reportable spill? Yes No

If yes, complete the notifications below.

Agency Notified	Date of Notification	Time of Notification	Signature of Person Making Notification
NRC (800) 424-8802			
Cal/EPA (916) 323-2514			
Cal/EMA (916) 845-8506			
CUPA (831) 755-4511			

Chapter 2 Purpose and Responsibilities

2.1 Purpose

This Spill Prevention, Control, and Countermeasure (SPCC) Plan addresses storage and management of petroleum products and hazardous materials (HM) at FHL. This SPCC Plan fulfills the following requirements:

- 40 Code of Federal Regulations (CFR) §112, Oil Pollution Prevention regulations
- 40 CFR §109, Criteria for State, Local and Regional Oil Removal Contingency Plans
- 40 CFR §300.33, Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) regulations
- 29 CFR §1910.120, Hazardous Waste Operations and Emergency Response (HAZWOPER)
- Army Regulation (AR) 200-1

This SPCC, also referred to herein as the Plan, describes practices, procedures, structures, and equipment that prevent spills at the facility and eliminate or reduce harmful effects to human health and the environment.

2.2 Facility Description

FHL is the largest United States Army Reserve installation, and is comprised of more than 162,000 acres of land. FHL's primary mission is to provide world class training for combat support and combat support service units, and to become the best training center in the Western United States for the Army Reserves.

FHL provides ranges, training areas, and facilities to support year-round training to prepare soldiers to fight.

Most of the installation consists of open space with minimal development, except in the Cantonment Area. Roughly five square miles, the Cantonment Area includes most of the installation's buildings and industrial land use areas. The topography varies but is predominantly flat at or near facilities storing petroleum, oil, and lubricants (POL) or HMs.

Surface drainage on FHL flows into the San Antonio and Nacimientto Rivers, which flow parallel to each other in a southeasterly direction. The Nacimientto River drains the southwest half of FHL, and the San Antonio River drains the northeastern half.

Fixed Oil Storage			
Storage Capacity	Location	Type of Oil Stored	Secondary Containment
10,000 gallon UST	Bldg. 116	Premium Gas	Double-walled
10,000 gallon UST	Bldg. 116	Regular Gas	Double-walled
10,000 gallon UST	Bldg. 116	Unleaded Gas	Double-walled
6,000 gallon UST	Bldg. 256	Used Oil	Double-walled
12,000 gallon UST	Bldg. 311	Unleaded Gas	Double-walled
5,120 gallon AST	Bldg. 205	JP-8 Fuel	Double-walled
5,120 gallon AST	Bldg. 207	JP-8 Fuel	Double-walled
5,120 gallon AST	Bldg. 208	JP-8 Fuel	Double-walled
486 gallon AST	Bldg. 210	JP-8 Fuel	Double-walled
5,120 gallon AST	Bldg. 229	JP-8 Fuel	Double-walled
5,120 gallon AST	Bldg. 230	JP-8 Fuel	Double-walled
983 gallon AST	Bldg. 301	JP-8 Fuel	Double-walled
20,000 gallon AST	Bldg. 311	JP-8 Fuel	Concrete Berm
20,000 gallon AST	Bldg. 311	JP-8 Fuel	Concrete Berm
20,000 gallon AST	Bldg. 311	Diesel	Concrete Berm
120 gallon AST	Washrack Tank	Used Oil	Double-walled

40 CFR 112.1(d)(4) exempts underground storage tanks (USTs), when such tanks are subject to all of the technical requirements of 40 CFR part 280 or a state program approved under 40 CFR part 281 (also known as the Underground Storage Tank regulations). All USTs at FHL are regulated under the California State UST Program. The USTs listed above are marked on the facility diagrams but are not otherwise included as part of this plan.

2.3 Definitions

Harmful Quantities: Quantities that:

- a. Violate applicable state water quality standards;
- b. Cause a film, sheen, or discoloration of the water surface or adjoining shoreline or cause a sludge or emulsion to be deposited beneath the water surface or adjoining shorelines; and/or
- c. Produce a discharge of more than 1,000 U.S. gallons of oil in a single event.

Incident On Scene Commander (IOSC): The IOSC coordinates and directs control and cleanup efforts at the scene of an oil or HM discharge on or adjacent to any FHL facility. All references to the IOSC refer to the primary commander or designated alternate.

Installation Response Team (IRT): Team of individuals working in an emergency to contain, clean up and document a spill, and perform regulatory agency notifications as necessary. The

IRT performs at least one spill response/cleanup training exercise per year.

Loading/Unloading Rack: Loading/unloading rack means a fixed structure (such as a platform, gangway) necessary for loading or unloading a tank truck or tank car. A loading/unloading rack includes a loading or unloading arm, and may include any combination of the following: piping assemblages, valves, pumps, shut-off devices, overfill sensors, or personnel safety devices.

Oil: Oil of any kind or in any form including petroleum, fuel oil, sludge, oily refuse, and oil mixed with wastes other than dredged soil.

Potential Spill Site: A location on the facility where there is potential for a reportable spill. Aboveground containers are automatically designated a potential spill site if the capacity of a single container at an individual site exceeds 55 gallons of oil or 10 times the reportable quantity (RQ) of a HM and if a release from that area would pose an imminent threat to a body of water.



Where storage of oil or HMs are below these amounts, the Professional Engineer (PE) certifying this Plan uses his/her best judgment to determine whether the storage location can reasonably be expected to produce a spill greater than the reportable quantity.

Reportable Quantity (RQ): Quantity of environmental pollutant above which a report must be given to environmental authorities, such as the USEPA or state or local regulators. RQs are listed in [40 CFR §302](#).

Reportable Spill: A release of a RQ of oil or a hazardous substance into the environment, as described below:

- a. **Oil:** A discharge of any quantity of oil into or upon the navigable waters of the United States, its adjoining shorelines, or contiguous zone.
- b. **Hazardous Substance:** Any release of one or more reportable materials into the environment, requiring that the USEPA or NRC be notified immediately.

Spill Classification: Spills are classified into one of the two following categories:

- a. **Minor:** fewer than 5 gallons unit, facility or directorate *can* respond using available response equipment and personnel resources without endangering the welfare of personnel or the environment.
- b. **Major:** larger than 5 gallons and the unit, facility or directorate *cannot* respond using available response equipment and personnel resources without endangering the welfare of personnel or the environment.

2.4 Responsibilities

This section details personnel responsibilities to prevent and respond to spills.

Installation Commander

- The Commander, United States Army Garrison (USAG) retains the right to jurisdiction of all incidents, excluding terrorist incidents, occurring on, in, or above exclusive and concurrent jurisdiction areas.

- The Commander, USAG maintains control of all military and Department of the Army resources in all situations.
- Approves and signs the SPCC Plan.
- Provides command emphasis regarding compliance with the SPCC Plan.
- Assigns an Environmental Officer (EO).
- Ensures sufficient personnel and resources to respond to spill incidents.
- Ensures storage and management of petroleum products, hazardous materials, and hazardous waste (POL/HM/HW) on the installation is in accordance with (IAW) this Plan.

Environmental Quality Control Committee (EQCC)

The EQCC is comprised of members representing the Command, all Directorates of the Command, and tenant organizations.

- Meets at least quarterly to discuss environmental issues, policies, regulations, including POL/HM/HW management.
- Reviews or revises overall environmental management policies including, but not limited to, POL/HM/HW on-site inspections, on-site storage, and turn-in procedures.
- Reviews internal/external inspection/audit results.

Unit Commanders

IAW AR 200-1, Section 1-28, and the FHL IHMWMP, Unit Commanders are required to:

- Instill an environmental ethic in soldiers and civilians under their control.
- Ensure personnel receive required environmental training.
- Comply with installation policies, applicable federal, state, and local environmental laws, regulations, Executive Orders, and overseas Final Governing Standards (FGS).
- Report noncompliance and significant spills through appropriate channels to the Installation Commander.
- Appoint in writing and train Environmental Compliance Officers (ECOs) and Environmental Compliance Non-Commissioned Officers (ECNCOs) at appropriate organizational levels to implement all installation environmental management plans.

All Directors

- Instill an environmental ethic in soldiers and civilians under their control.
- Ensure personnel receive required environmental training.
- Comply with installation policies, applicable federal, state, and local environmental laws, regulations, Executive Orders, and overseas FGS.
- Report non-compliance and spills through appropriate channels.
- Appoint in writing and train ECOs and ECNCOs at appropriate organizational levels to implement all installation environmental management plans.

Directorate of Emergency Services (DES)

Personnel in the DES are the first responders to contingency operations on FHL. DES will:

- Establish DES plans and procedures for contingency operations.
- Ensure response to HM/HW incidents.
- Serve as the IOSC for all responses to POL/HM/HW incidents.
- Manage the Installation Response Team (IRT).

DES Division Chiefs

Division Chiefs will:

- Create plans and procedures for a full spectrum contingency response.
- Integrate response actions with other first responder organizations as directed by mutual aid agreements or as appropriate.
- Review and update contingency plans and procedures annually.

- Develop training programs to train employees on plans and procedures for contingency response.
- Conduct exercises and drills to test contingency plans and procedures.
- Incorporate lessons learned from exercises and drills into contingency plans and procedures.

Fort Hunter Liggett Dispatch Center

Support is requested through the Dispatch Center (until the Installation Operations Center (IOC) is established).

The FHL Dispatch Center will:

- Determine the location of the incident.
- Take the name, call-back number, and organization of the complainant.
- Dispatch police and fire units when notified of a POL/HM/HW or Chemical, Biological, Radiological, and Nuclear (CBRN) incident.
- Track actions of police and fire units until IC is established.
- Coordinate IC requests for support, and/or evacuation, with IOC and police.
- Gather pertinent information.
- Notify the IOC regarding pertinent information.

First Responding Unit will:

- Determine a safe approach.
- Isolate and deny entry.
- Make notifications.
- Establish command and management.
- Identify material and perform Hazard Assessment.
- Develop Action Plan.
- Determine PPE.
- Contain and control.
- Determine protective actions.

Incident On-Scene Commander (IOSC)

- Coordinates and directs control and cleanup efforts at the scene of an oil or hazardous substance discharge.
- Implements a site security and control plan to limit the number of personnel operating in the control zones.
- Designate a Safety Officer.
- Notifies local emergency responders, if needed (fire, ambulance, sheriff).
- Establishes a scene safety plan.
- Implements a site security and control plan.
- Identifies the materials or conditions involved in the incident.
- Implements appropriate emergency operations.
- Ensures all emergency responders wear the appropriate PPE.
- Establishes a decontamination plan.
- Makes determinations about the safety of facilities and provides the all clear for personnel to return to facilities when safe to do so.
- Implements post incident emergency response plan.
- Brings key participants together to conduct an after action review of the incident.

DES, Fire & Emergency Services (F&ES) Division

The F&ES Division will establish IC during any incident listed in this plan. IAW DES Procedure #1.2, Chemical, Biological, Radiological, Nuclear, and Hazardous Material Incident Response Plan, The F&ES Division will:

- Manage the Incident Command (IC) for contingencies related to fire, HMs, mass casualties, building collapse, and/or other life/safely incidents.
- Ensure training is provided for firefighter personnel to maintain proficiency in responding to HM/HW incidents.
- Respond to POL/HM/HW incidents.
- Serve as the IOSC for all responses to POL/HM/HW incidents.
- Assist in training activity/unit personnel as requested by the EO.
- Maintain technical library of MSDSs, chemical hazards, etc.
- Fire Companies will Support operations of first responding unit and IC.

DES, Police Division

The Police Division will:

- Manage the IC for any contingency that requires security at the contingency site.
- Secure the perimeter of an incident.
- Evacuate designated areas.

Often, the Police Division will turn IC management over to the F&ES Division after securing the contingency site, and/or after determining that a crime or security breach is not involved in the contingency.

Directorate of Logistics (DOL)

- Establish SOPs and responsibilities for the management, transportation, storage, and handling, quality surveillance, shelf life and turn-in of packaged POL at the user level.

Installation Response Team (IRT)

- The IRT responds to and mitigates spills. The on-scene responder team is comprised of various FHL personnel whose training consists of an annual HAZWOPER awareness level training as specified in 29 CFR §1910.120.
- Other IRT personnel providing administrative support to spill response and mitigation are not required to have the HAZWOPER training.
- See page iv for a list of IRT personnel.

Installation Safety Officer

- Determines the clothing and protective gear required to safeguard employees while they handle POL/HM/HW.
- Advises work supervisors of methods to ensure that conditions, acts, and practices do not degrade the personal safety of employees.
- Coordinates safety compliance at all facilities that use POLs.
- Participates in emergency response/incident evaluations.
- Maintain installation-wide HM inventory.

Director of Public Works

- Ensure the collection and completion of HM inventories, and provide data to other Directorates as needed.

Environmental Officer (EO), Chief, DPW Environmental Division

- Serves as Chief of the Environmental Division.
- Assigns a SPCC Program Manager.
- Directs and monitors implementation of this SPCC Plan.

- Provides POL/HM/HW management guidance and instructions to Unit Commanders and Directors.

DPW Environmental Compliance Branch Manager (ECBM)

- Maintains, implements, updates, and distributes the SPCC Plan.
- Coordinates inspection of POL and HM operations and initiates corrective measures including recommending equipment for the handling and storage of POL/HM/HW.
- Periodically reviews this Plan for administrative changes.
- Notifies regulatory agencies of major spill events.
- Serves as liaison to federal, state, and local regulatory agencies regarding SPCC issues.

SPCC Program Manager (ECBM if none assigned)

- Coordinates spill management programs, plans, training, and regulations for FHL.
- Posts the Emergency Notification List and keeps the list up-to-date.
- Schedules five year reviews on SPCC Plans.
- Updates this Plan, as necessary.
- Works directly with the IOSC to provide SPCC technical assistance.
- Conducts compliance inspections at applicable SPCC-regulated facilities.
- Coordinates integrity testing for regulated containers.
- Prepares all spill-related reports required by federal, state, and local regulations.
- Maintains required SPCC records.
- Coordinates all required training for facility personnel to implement this SPCC Plan.
- Evaluates system/procedure changes to determine if they affect the SPCC Plan effectiveness.
- Corrects any acts which violate this plan without delay.

Hazardous Materials and Waste Coordinator (HMWC)

- Inspects HW operations and initiates corrective measures including recommending equipment for the handling and storage of HW.
- Maintains an activity-wide HM/HW inventory.
- Maintains spill response and prevention material, and emergency supplies.
- Ensures all oil/water separators are clean and serviceable.
- Coordinates the proper classification, transportation, and disposal of wastes produced by spill clean-up as outlined in the IHMWMP.

Environmental Compliance Officers/NCO (ECO/ECNCO)/Civilian Equivalents

- Advise chain of command/supervisory chain on environmental issues/imperatives, assist in unit/activity environmental compliance efforts.
- Act as liaison between unit/activity and Environmental Division.
- Conduct weekly internal compliance inspections, implement correct actions, and record results.
- Attend required training courses provided by the Environmental Division, Compliance Branch or other entity.
- Provide appropriate environmental training to unit/activity personnel.
- Maintain unit/activity environmental records and reference library.
- Supervise spill response (for small spills not requiring DES response) in unit/activity.
- Monitor/assist chain of command/supervisory chain in maintaining adequate supply of spill response material in unit/activity.
- Compose spill reports when necessary.
- Monitor POL/HM/HW operations in unit/activity.

Satellite Accumulation Point (SAP) Coordinators/HW Managers

NOTE: The ECO/ECNCO may perform these duties or provide oversight to someone else who does perform HW Manager duties.

- Ensure that POL/HM/HW is managed IAW this Plan.
- Designate an Alternate SAP Coordinator as needed.
- Coordinate HW turn-in to the Central Hazardous Waste Facility (CHWF).
- Attend all mandatory training.
- Ensure all personnel involved with handling and storage of POL/HM/HW are provided with proper training.
- Ensure MSDSs are available for all POL/HM/HW.
- Respond to and report all POL/HM/HW spills/incidents.
- Obtain required emergency equipment, cleanup equipment, and proper HW accumulation containers.

Hazardous Materials User/Hazardous Waste Generating Activities/Units

- Appoint an ECO and an ECNCO in writing. The ECO must be the rank of 2LT or WO1 or above. The ECNCO must be the rank of SGT (E5) or above. The ECO/ECNCO should have a minimum of 15 months retention within the unit.
- Appoint and train personnel, as needed, to serve as SAP Coordinators/POL/HM/HW Managers to ensure operational compliance.
- Ensure all POL/HM/HW is managed and disposed of IAW the IHMWMP.
- Ensure spill response and prevention materials are available.
- Coordinate with the HMWC to establish alternate disposal/storage contingency plans.
- Contain, manage, and report spill incidents to the FHL Fire Department and the HMWC.
- Substitute HM with less hazardous products where feasible.
- Inform Compliance Branch Program Manager of new POL/HM/HW generating processes.
- Ensure waste containers remain closed except when adding or removing waste.
- Attend all mandatory training.

Public Affairs Officer

- Issues all public communications in the event of a spill that requires a facility response
- Releases information to the media
- Controls site access to photographers, regulatory representatives, and civilians who may request access to the site

2.5 Availability of the SPCC Plan

Maintain this SPCC Plan on file at the FHL Environmental Office. It must be available for onsite review by representatives of the USEPA or Cal/EPA during normal working hours. In addition, copies of the SPCC Plan must be accessible to all persons responsible for administering the SPCC Plan.

2.6 SPCC Plan Reviews and Revisions

This plan shall be revised as specified in this section. There are two types of revisions, those requiring administrative changes to the plan, and those requiring an amendment to the plan.

Administrative changes are non-structural and non-process related changes to the plan.

Administrative changes to the plan do not require a PE signature, but must be made immediately upon knowledge of the change.

Examples of administrative changes include:

- Changes in the assignment or phone numbers of the IRT
- Changes in phone numbers of local emergency response agencies
- After pertinent Department of Defense (DoD) or U.S. Army policy changes

Technical Amendments

The SPCC Plan must be *amended* per 40 CFR §112.5(a-c) when there is a change in facility design, construction, operation, or maintenance that materially affects the facility's potential for the discharge of oil as described in 40 CFR §112.1(b) *and* must be reviewed at least once every five (5) years. Amendments to the plan must be implemented as soon as possible, but not later than six (6) months after the change occurs and must be certified by a PE. Note the review and any resulting amendments or changes to the SPCC Plan on the *Record of Changes* on page B-9 of this SPCC Plan.

The plan must be amended and certified by a PE within six (6) months of the review to include more effective prevention and control technology if:

- Such technology will significantly reduce the likelihood of a spill event from the facility; and
- Such technology has been field-proven at the time of the review.

Other circumstances that may warrant an SPCC Plan review and amendment are listed below:

- Commissioning or decommissioning containers
- Replacement, reconstruction, or movement of containers
- Reconstruction, replacement, or installation of piping systems
- Construction or demolition that might alter secondary containment structures
- Changes of product or service
- Revision of standard operation or maintenance procedures
- When either federal regulations or State of California regulations change significantly, affecting the applicability and effectiveness of this SPCC Plan
- When facility changes increase the potential for spills or change the spill prevention and response procedures, methods, and equipment
- When the SPCC Plan fails or proves to be ineffective in preventing or responding to a spill
- At the request of the USEPA or the Cal/EPA
- After pertinent federal or state legislation is enacted or amended, or DoD or U.S. Army policy changes, especially changes in reportable spill quantities
- After pertinent national, regional, or state contingency plans are modified
- After any changes in adjacent land and water use that would affect spill prevention and response

2.7 SPCC Reviews and Revisions

The FHL DPW ECBM, or SPCC Program Manager, if designated, will periodically review this SPCC Plan and update the plan with administrative changes as necessary. The FHL DPWE Compliance Manager must forward any changes to the plan requiring a technical amendment, as detailed above, to the SPCC Program Manager for approval by a PE.

The FHL DPWE Compliance Manager will use the *Record of Changes* form on page B-9 to document any revisions to the SPCC Plan and forward a copy of the Record of Changes form to the SPCC Program Manager if amendments to the plan are required.

2.8 SPCC Program Manager Reviews and Amendments

The SPCC Program Manager or DPW ECBM will coordinate the review of this Plan at least every five (5) years and amend it as required. The review must include a detailed inspection of oil and hazardous material sites and verification of all data generated during the initial SPCC Plan development. A PE must approve technical amendments, which must be entered into the SPCC Plan within six (6) months. Log the review and any resulting amendments or changes to the SPCC Plan on the *Record of Changes* form on page B-9.

2.9 Regional Administrator Amendments

IAW 40 CFR §112.4, if the facility discharges more than 1,000 U.S. gallons of oil in a single discharge as described in §112.1(b), or discharged more than 42 U.S. gallons of oil in each of two (2) discharges, occurring within any 12 month period, the DPW ECBM or the SPCC Program Manager must submit to the USEPA Region Administrator and the California EPA, within 60 days the following:

- Name of the facility
- Name(s) of the owner or operator of the facility
- Location of the facility
- Maximum storage or handling capacity of the facility and normal daily throughput
- Corrective action and countermeasures taken, including a description of equipment repairs and replacements
- Description of the facility, including maps, flow diagrams, and topographic maps as necessary
- The cause(s) of such discharge, including a failure analysis of the system or subsystem in which the failure occurred
- Additional preventive measures taken or contemplated to minimize the possibility of recurrence
- Any other information the Regional Administrator may reasonably require pertinent to the Plan or discharge

Chapter 3 Potential Spill Sites

3.1 Maximum Spill Potential

Multiple sites on FHL manage oil and hazardous materials, meeting the definition of a potential spill site.

The table below lists the potential spill sites with the substances stored and the maximum spill potential:

Building Number	Potential Spill Site	Substances Stored	Maximum Spill Potential
120	FHL Fire Department	Used JP-8 and Diesel	55 gals
132	Auto Hobby Shop	Used Oil	55 gals
154	Roads and Grounds	Used Oil	55 gals
187-189	Directorate of Logistics (DOL)	New and Used Oil, New and Used ATF	55 gals
205, 207, 208, 229 & 230	Barracks Emergency Generators	JP-8	5,120 gals
206	Dining Facility (DFAC)	Waste Grease	100 gals
210	Medical Clinic Emergency Generator	JP-8	486 gals
250, 252, 256, 257, 259 & 262	Equipment Concentration Site (ECS) Maintenance Area	New and Used Oil, New and Used Hydraulic Fluid	6,000 gals
301	Regional Training Center (RTC)-West Emergency Generator	JP-8	983 gals
305	Aircraft Refueling/MFT Parking Area	JP-8	3,700 gals
311	Central Fuel Point Area	JP-8, Diesel	20,000 gals
8135	Multi-Purpose Range Complex	Used Oil	55 gals
NA (Route Tampa)	ECS Vehicle Storage Yard	Used Oil	55 gals
NA (Southeast of ECS Maintenance Yard)	Washrack AST Area	Used Oil	120 gals

3.2 Description of Potential Spill Sites

This section describes the activities and equipment at the potential spill sites and lists reasonable spill scenarios for each site.

Building 120, FHL Fire Department

HMs and HWs are stored in a prefabricated metal storage container at the FHL Fire Department. The HMs stored are four 55 gallons of used JP8 and diesel mixture.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	55 gallons	Instantaneous
Partial failure of a full tank	Up to 55 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	NA	Gradual
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	NA	Up to 50 gallons/min

CONTAINMENT: The storage container is equipped with integral secondary containment. Spills occurring during storage will be contained within the secondary containment floor structure of the storage area.

DRAINAGE: A spill occurring during the handling of HMs or HW near the FHL Fire Department Storage area will flow onto the surrounding asphalt and be contained. The rate of flow would be less than 3 feet/second based on a 2% slope over asphalt, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers
- Releases when transporting chemical containers from the storage buildings to the transport vehicle, caused by dropping or otherwise damaging the container

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Building 132, Auto Hobby Shop

The Auto Hobby Shop satellite accumulation area contains two 55-gallon drums of used oil. The drums are stored on a secondary containment pallet. Any major spills would migrate onto the surrounding soil.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	55 gallons	Instantaneous
Partial failure of a full tank	Up to 55 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	NA	Gradual
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	NA	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the secondary containment pallet and bermed structure of the satellite storage area.

DRAINAGE: A spill occurring during the handling of HMs or HW near the Auto Hobby Shop SAP area will flow onto the surrounding soil and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers
- Releases when transporting chemical containers from the storage buildings to the transport vehicle, caused by dropping or otherwise damaging the container

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Building 154, Roads and Grounds

HMs and HWs are stored in the Roads and Grounds Area buildings. The HMs stored are three 55-gallon drum of used oil. Light maintenance is conducted in the Roads and Grounds Area.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	55 gallons	Instantaneous
Partial failure of a full tank	Up to 55 gallons	Gradual to Instantaneous
Tank overfill	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	NA	Gradual
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	NA	Up to 50 gallons/min

CONTAINMENT: One drum sits inside a small secondary containment device designed to catch drips and small spills. Other drums are stored in a secondary containment clamshell. Main secondary containment would be provided by the building.

DRAINAGE: A spill occurring during the handling of HMs or HW near the Roads and Grounds area will flow onto the surrounding concrete and be contained. The rate of flow would be less than 3 feet/second based on a 2% slope over concrete, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers
- Releases when transporting chemical containers from the storage buildings to the transport vehicle, caused by dropping or otherwise damaging the container

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Building 176A, Central Hazardous Waste Facility Area

HMs and HWs are stored in the Central Hazardous Waste Facility Area buildings. The POL products stored include used oil, used hydraulic fluid, used automatic transmission fluid (ATF), used diesel, and used JP-8. There are approximately 28, 55-gallon drums of POL product. The Central Hazardous Waste Facility is FHL's central HW accumulation point.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	55 gallons	Instantaneous
Partial failure of a full tank	Up to 55 gallons	Gradual to Instantaneous
Tank overfill	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	NA
Leaking pipe or valve	NA	NA
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 55 gallons	Up to 50 gallons/min

CONTAINMENT: HW drums are stored inside a bermed concrete containment structure and covered. The containment capacity of the structure is sufficient to hold the capacity of the largest container. Drums stored outside of the containment area do not have any means of secondary containment.

DRAINAGE: A spill occurring during the handling of HMs or HW near the Central Hazardous Waste Facility area will flow onto the surrounding concrete and gravel and be contained. The rate of flow would be less than 3 feet/second based on a 2% slope over concrete and gravel, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the material.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Buildings 187-189, Directorate of Logistics (DOL) Area

HMs and HWs are stored in DOL Area rooms and buildings, where light maintenance is conducted. The HMs stored are new and used oil and transmission fluids. There are approximately 31, 55- gallon containers in the DOL Area. The only aboveground bulk containers are 55 gallons or less.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	55 gallons	Instantaneous
Partial failure of a full tank	Up to 55 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	NA	Gradual
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	NA	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the secondary containment pallets and/ or inside buildings 187, 188 and 189. Some spills from drums in the drum storage tent would be contained within the secondary containment pallets; however many drums do not sit on secondary containment.

DRAINAGE: A spill occurring during the handling of HMs or HW near the DOL area will flow onto the surrounding asphalt and be contained. The rate of flow would be less than 3 feet/second based on a 2% slope over asphalt, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers
- Releases when transporting chemical containers from the storage buildings to the transport vehicle, caused by dropping or otherwise damaging the container

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Buildings 205, 207, 208, 229, and 230, Barracks Emergency Generators

There are five 120-gallon JP-8 emergency generators located at the barracks area.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	5,120 gallons	Instantaneous
Partial failure of a full tank	Up to 5,120 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	Up to 25 gallons	Gradual
Tank truck leak or failure	Up to 1,200 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 250 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 250 gallons	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the double-walled secondary containment structure of the AST.

DRAINAGE: A spill occurring during AST filling operations at the Barracks Emergency Generator area will flow onto the surrounding soil and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the material.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring fuel to the AST

Spill Prevention and Response Measures

- Inspect the service truck before fuel transfer for leaks and damage to hoses or containers
- Check the capacity of the AST before receiving fuel
- Monitor fuel transfers
- Spill-response equipment is located near the AST
- The AST is inspected monthly

Building 206, DFAC

There is one 100-gallon waste grease container located at the DFAC.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	100 gallons	Instantaneous
Partial failure of a full tank	Up to 100 gallons	Gradual to Instantaneous
Tank overfill	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	NA	Gradual
Tank truck leak or failure	Up to 1,200 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 250 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 250 gallons	Up to 50 gallons/min

CONTAINMENT: The waste grease container is single-walled and is not parked inside any secondary containment.

DRAINAGE: A spill occurring during AST filling or pumping operations at the DFAC area will flow onto the surrounding concrete and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the material.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring grease to the AST

Spill Prevention and Response Measures

- Inspect the service truck before fuel transfer for leaks and damage to hoses or containers
- Monitor transfers
- The AST is inspected monthly

Building 210, Medical Clinic Emergency Generator

There is one 486-gallon JP-8 emergency generator located at the Medical Clinic.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	486 gallons	Instantaneous
Partial failure of a full tank	Up to 486 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	Up to 25 gallons	Gradual
Tank truck leak or failure	Up to 1,200 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 250 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 250 gallons	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the double-walled secondary containment structure of the AST.

DRAINAGE: A spill occurring during AST filling operations at the Medical Clinic Emergency Generator area will flow onto the surrounding soil and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the material.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring fuel to the AST

Spill Prevention and Response Measures

- Inspect the service truck before fuel transfer for leaks and damage to hoses or containers
- Check the capacity of the AST before receiving fuel
- Monitor fuel transfers
- Spill-response equipment is located near the AST
- The AST is inspected monthly

Buildings 250, 252, 256, 257, 259, and 262

HMs and HWs are stored in the ECS Storage Yard Area portable buildings. The HMs stored are approximately 73 drums of new and used motor oil, hydraulic fluid, and used diesel in containers up to 55 gallons in size. Used Oil is also stored in one 6,000 gallon AST. Heavy vehicle and equipment maintenance is conducted at the ECS Maintenance Area.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	6,000 gallons	Instantaneous
Partial failure of a full tank	Up to 6,000 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	Up to 25 gallons	Gradual
Tank truck leak or failure	Up to 1,200 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 250 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 250 gallons	Up to 50 gallons/min

CONTAINMENT: The POL storage area at Building 262 is contained in a concrete, covered containment structure. The containment capacity of the structure is sufficient to hold the capacity of the largest container. Drum storage locations at Buildings 252, 256, and 259 are inside the buildings and drums are stored on spill pallets or in overpack containers. The 6,000-gallon used oil AST at the south border of the yard sits inside a covered vault capable of holding the entire contents of the tank.

DRAINAGE: A spill occurring during the handling of hazardous materials or hazardous waste near the ECS Storage Yard area will flow onto the surrounding soil and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers
- Releases when transporting chemical containers from the storage buildings to the transport vehicle, caused by dropping or otherwise damaging the container

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Building 301, RTC-West Emergency Generator

There is one 983-gallon JP-8 emergency generator located at the RTC-West building.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	983 gallons	Instantaneous
Partial failure of a full tank	Up to 983 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	Up to 25 gallons	Gradual
Tank truck leak or failure	Up to 1,200 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 250 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 250 gallons	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the double-walled secondary containment structure of the AST.

DRAINAGE: A spill occurring during AST filling operations at the RTC-West Emergency Generator area will flow onto the surrounding asphalt and be contained. The rate of flow would be less than 3 feet/second based on a 2% slope over asphalt, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the material.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring fuel to the AST

Spill Prevention and Response Measures

- Inspect the service truck before fuel transfer for leaks and damage to hoses or containers
- Check the capacity of the AST before receiving fuel
- Monitor fuel transfers
- Spill-response equipment is located near the AST
- The AST is inspected monthly

Building 305, Aircraft Refueling/MFT Parking Area

The Aircraft Refueling/Mobile Fuel Tanker (MFT) Parking Area at the Tusi Airfield stores JP-8 in one 2,500-gallon, and one 1,200-gallon MFT. Any minor spills that occur during aircraft refueling are contained on the flight line. Major spills during storage would migrate onto the surrounding soil and be contained.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	2,500 gallons	Instantaneous
Partial failure of a full tank	Up to 2,500 gallons	Gradual to Instantaneous
Tank overfill	Up to 200 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	Up to 25 gallons	Gradual
Tank truck leak or failure	Up to 2,500 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 250 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 250 gallons	Up to 50 gallons/min

CONTAINMENT: Spills from the 2,500-gallon MFT will be contained within the drive on secondary containment structure of the storage area. Spill kits are near by to provide general secondary containment for both MFTs.

DRAINAGE: A spill occurring during the handling of hazardous materials or hazardous waste near the Aircraft Refueling/MFT area will flow onto the surrounding soil and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Spills and releases when transferring fuel due to overfilling, piping rupture, or connection failure or leakage
- Leaks from tank rupture or piping failure while stored

Spill Prevention and Response Measures:

- Inspect the service truck before fuel transfer for leaks and damage to hoses or containers
- Check the capacity of the MFT before receiving fuel
- Monitor fuel transfers
- Spill-response equipment is located near the MFTs during fueling operations
- The MFTs and appurtenances are inspected monthly

Building 311, Central Fuel Point

The Central Fuel Point Area has an impervious concrete foundation and stores JP-8 in two 20,000-gallon ASTs and one 1,800-gallon MFT, and diesel in one 20,000-gallon AST.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	20,000 gallons	Instantaneous
Partial failure of a full tank	Up to 20,000 gallons	Gradual to Instantaneous
Tank overflow	Up to 200 gallons	Up to 50 gallons/min
Pipe failure	Up to 5,000 gallons	Up to 50 gallons/min
Leaking pipe or valve	Up to 25 gallons	Gradual
Tank truck leak or failure	Up to 5,000 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 250 gallons	Up to 50 gallons/min
Pump rupture or failure	Up to 250 gallons	Up to 50 gallons/min

CONTAINMENT: The 20,000-gallon AST rests inside concrete containment berms capable of holding the entire capacity of the tank with enough freeboard of a 25-year, 24-hr rain event. The MFT is parked on drive on secondary containment capable of containing the most likely spill amount.

DRAINAGE: A spill occurring during the handling of HMs or HW near the Central Fuel Point area will flow onto the surrounding concrete and migrate toward drains which lead to an oil/water separator (OWS). The rate of flow would be less than 3 feet/second based on a 2% slope over concrete, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Spills and releases when transferring fuel due to overfilling, piping rupture, or connection failure or leakage
- Leaks from tank rupture or piping failure while stored

Spill Prevention and Response Measures:

- Inspect the service truck before fuel transfer for leaks and damage to hoses or containers
- Check the capacity of the AST before receiving fuel
- Monitor fuel transfers
- Spill-response equipment is located near the MFT and ASTs during fueling operations
- The MFT and ASTs and appurtenances are inspected monthly

Building 8135, Multi-Purpose Range Complex (MPRC)

MPRC contains one 55-gallon drum each of new and used oil. The drums are stored in a secondary containment clamshell. Any major spills would migrate onto the surrounding soil.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	55 gallons	Instantaneous
Partial failure of a full tank	Up to 55 gallons	Gradual to Instantaneous
Tank overfill	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	NA	Gradual
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	NA	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the secondary containment clamshell structure of the storage area.

DRAINAGE: A spill occurring during the handling of HMs or HW near the MPRC SAP area will flow onto the surrounding soil and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers
- Releases when transporting chemical containers from the storage buildings to the transport vehicle, caused by dropping or otherwise damaging the container

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Route Tampa, ECS Vehicle Storage Yard

HMs and HWs are stored in the ECS Vehicle Storage Yard. The HMs stored are four 55-gallon drums of used motor oil on secondary containment pallets. The ECS storage yard is the primary vehicle storage area for the ECS. Very little maintenance is conducted in the ECS Storage Yard.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	55 gallons	Instantaneous
Partial failure of a full tank	Up to 55 gallons	Gradual to Instantaneous
Tank overflow	Up to 55 gallons	Up to 50 gallons/min
Pipe failure	NA	Up to 50 gallons/min
Leaking pipe or valve	NA	Gradual
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	NA	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the secondary containment pallet of the storage areas.

DRAINAGE: A spill occurring during the handling of HMs or HW near the ECS Maintenance area will flow onto the surrounding concrete and gravel and migrate south toward storm drains which lead to the San Antonio River. The rate of flow would be less than 3 feet/second based on a 2% slope over concrete and gravel, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers
- Releases when transporting chemical containers from the storage buildings to the transport vehicle, caused by dropping or otherwise damaging the container

Spill Prevention and Response Measures

- Keep storage areas locked and secured
- Inspect containers for dent, cracks, and rust
- Ensure spill kits are readily available

Washrack AST

The washrack area contains a 120-gallon double-walled AST used to collect used oil from the skimmer on the OWS. Any major spills would migrate onto the surrounding soil and drain toward drainage ditches which lead to the San Antonio River.

Potential Equipment Failure Types	Potential Discharge	Spill Rate
Complete failure of a full tank	120 gallons	Instantaneous
Partial failure of a full tank	Up to 120 gallons	Gradual to Instantaneous
Tank overflow	Up to 120 gallons	Up to 50 gallons/min
Pipe failure	120 gallons	Up to 50 gallons/min
Leaking pipe or valve	Up to 120 gallons	Gradual
Tank truck leak or failure	Up to 55 gallons	Gradual to instantaneous
Hose leak during transfer	Up to 55 gallons	Up to 50 gallons/min
Pump rupture or failure	NA	Up to 50 gallons/min

CONTAINMENT: Spills occurring during storage will be contained within the secondary containment of the AST.

DRAINAGE: A spill occurring during the handling of HMs or HW near the washrack AST area will flow onto the surrounding soil and be contained. The rate of flow would be less than 1 feet/second based on a 2% slope over soil, and would vary depending on the temperature. The rate of flow was determined using the Upland Flow Method for determining overland flow in watersheds using water as the materials.

Reasonable Spill Scenarios:

- Releases when a container ruptures, leaks, or fails
- Releases because of overfilling, spilling, etc. when transferring material/waste to containers

Spill Prevention and Response Measures

- Inspect the service truck before used oil transfer for leaks and damage to hoses or containers
- Monitor used oil transfers
- Spill-response equipment is located near the AST
- The AST is inspected monthly

Chapter 4 Spill Prevention and Control

This chapter details the oil spill prevention and control requirements of 40 CFR §112, to include planning for hazardous materials while staying with the suggested format of 40 CFR §112 and the criteria for state, local, and regional oil removal contingency plans of 40 CFR §109.

4.1 General Requirements – §112.7(a)(1) through (5)

Conformance with Requirements – §112.7(a)(1)

This section is designed to discuss FHL's conformance with the requirements of 40 CFR §112.7.

Reasoning for Nonconformance – § 112.7(a)(2)

This SPCC Plan does not deviate from the requirements in paragraph (g), (h)(2) and (3), and (i) of 40 CFR §112.7; therefore, this section does not apply to this SPCC Plan.

Facility Description – §112.7(a)(3)

Refer to Chapter 1, 2, and 3 for a description of the physical layout of the facility; facility diagram; description of materials in and capacities of containers; discharge prevention measures; discharge for drainage controls; countermeasures for discharge discovery, response, and cleanup; methods of disposal of recovered materials; and contact list and phone numbers.

Reporting Procedures – §112.7(a)(4)

Refer to the Incident Notification section of Chapter 1 and Appendix A: Prevention, Inspections Testing and Logs, for reporting procedures.

Response Procedures – §112.7(a)(5)

Chapter 5 of this SPCC Plan contains detailed emergency response procedures.

4.2 Potential for Equipment Failure – §112.7(b)

Refer to Chapter 3, which provides a prediction of the direction, rate of flow, and total quantity of POL that could be discharged from the facility as a result of major equipment failure.

4.3 Containment and Diversionary Structures – §112.7(c)

Onshore Facilities – §112.7(c)(1)(i) through (vii)

General secondary containment is provided for all containers at FHL, including containers storing hazardous materials.

Offshore Facilities – §112.7(c)(2)(i) through (ii)

FHL is not an offshore facility.

4.4 Oil Spill Contingency Plan and Manpower – §112.7(d)(1) and (2)

Chapter 5 of this SPCC Plan contains detailed emergency response procedures. FHL has dedicated manpower to respond to a spill, and emergency releases.

4.5 Inspections, Tests, and Records – §112.7(e)

FHL personnel have implemented a program of inspections. Refer to Appendix A, Prevention, Inspections Testing, and Logs for specific inspection and testing requirements.

4.6 Personnel, Training, and Discharge Prevention Procedures – §112.7(f)(1) through (3)

Personnel Training – §112.7(f)(1)

FHL has implemented a program of instruction for all oil-handling personnel. All personnel working with oil and HMs must attend an annual training that includes the following:

- Understanding what HMs are.
- Understanding the risks associated with HMs in an incident.
- Knowing how to recognize the presence of the HMs.
- Understand their role in the response plan.
- Operation and maintenance of equipment to prevent discharges.
- Discharge procedure protocols.
- Applicable pollution control laws, rules, and regulations.
- General facility operations.
- Contents of the facility SPCC Plan.

The training includes spill exercises, and will be conducted annually, or:

- After any significant revisions to the training program or the SPCC Plan; or
- After a spill response in which training deficiencies were noted.

Responsibility – §112.7(f)(2)

The SPCC Manager is accountable for discharge prevention. Refer to the Responsibilities section of Chapter 2 for information regarding responsibilities.

Discharge Prevention Briefings – §112.7(f)(3)

Refer to the Responsibilities section of Chapter 2 for training requirements regarding discharge prevention briefings and annual spill drills.

4.7 Security – §112.7(g)(1) through (5)

Fencing – §112.7(g)(1)

FHL is a secure facility, not open to the general public. High risk areas such as the Central Fuel Point are secured by additional fencing.

Master Flow and Drain Valves – §112.7(g)(2)

All containment system flow drains, valves, and piping are visible to facility personnel during operating hours and are closed when not in regular use.

Pump Starter Control – §112.7(g)(3)

All pump starters are maintained in the “off” position and are located at a site accessible only to authorized personnel when the pump is in a non-operating or non-standby status.

Loading/Unloading Connections to Pipelines or Piping – §112.7(g)(4)

Piping for the ASTs and USTs are securely capped when not in service or when in standby service for an extended time.

Facility Lighting – §112.7(g)(5)

Lighting is sufficient to detect leaks during non-daylight hours, and to deter tampering vandals.

4.8 Loading/Unloading Racks (Onshore) – §112.7(h)(1) through (3)

There are no loading/unloading racks, as defined in Chapter 2 of this SPCC Plan, at FHL; therefore, this section does not apply.

4.9 Brittle Fracture – §112.7(i)

FHL does not have any field constructed aboveground containers.

4.10 Regulatory Conformance – §112.7(j)

As a facility in California, FHL is subject to the Aboveground Petroleum Storage Act (ASPA). This plan satisfies all ASPA requirements.

4.11 Qualified Oil-Filled Operational Equipment – §112.7(k)

FHL owns, operates, and maintains the transformers located throughout the facility. For many of the transformers, secondary containment is impracticable due to the electrical hazard created from accumulated precipitation around the transformer.

Qualification Criteria (Reportable Discharge History) – §112.7(k)(1)

FHL has not had a single discharge from any oil-filled operational equipment exceeding 1,000 gallons or no two (2) discharges from oil-filled equipment exceeding 42 gallons within a twelve (12) month period in the three (3) years prior to the SPCC Plan certification date. This discharge history allows FHL to use the alternative general secondary requirements outline in 40 CFR §112.7 (k)(2).

Alternative Requirements to General Secondary Containment – 40 CFR § 112.7(k)(2)

Instead of providing secondary containment for the transformers, an FHL has prepared an oil spill contingency plan and a written commitment of manpower, equipment, and materials to quickly control and remove discharged oil. Chapter 5 of this SPCC Plan contains detailed emergency response procedures. Transformers are maintained by the DPW-Operations and Maintenance Division (O&M). O&M conducts annual visual inspections of all transformers regardless of oil capacity. Any spills are directed to O&M hazardous materials specialist and DPWE.

4.12 Spill Prevention, Control, and Countermeasure Plan Requirements for Onshore Facilities – §112.8 – §112.8(a)

Refer to the sections above regarding FHL compliance with general requirements contained in 40 CFR §112.7 and §112.8

4.13 Facility Drainage – §112.8(b)(1) through (5)

Drainage Systems (Diked Storage Areas) – §112.8(b)(1) and (2)

FHL maintains several containment parking areas and HM storage areas. Each containment area contains valves of manual open-and-closed design for the drainage of the diked areas.

Drainage Systems (Undiked Storage Areas) – §112.8(b)(3) through (5)

There are no undiked storage areas with a potential for discharge at FHL.

4.14 Bulk Storage Containers – §112.8(c)(1) through (11)

These sections do not apply to the transformers at FHL, because the definition of bulk storage containers excludes oil-filled operating equipment.

Compatibility of Containers and Material Stored – §112.8(c)(1)

The containers at FHL are compatible with the material they hold and the environmental conditions to which they could reasonably be subjected. The containers do not store petroleum products at greater than atmospheric pressure.

Hazardous materials are stored IAW the *FHL IHMWMP*.

Secondary Containment – §112.8(c)(2)

Chapter 2 of this plan lists all regulated tanks and containers and the type of secondary containment provided.

Drainage of Rainwater from Diked Areas – §112.8(c)(3)

Before releasing storm water from containment areas, visually inspect the surface of the water to determine if an oily sheen or other indications of hazardous material contamination are present in discernible quantities. If there are any questions about the quality of the water present, the SPCC Program Manager, at their option, will either:

- Arrange for transport offsite for proper treatment and disposal;
- Allow the water to evaporate and, if appropriate, take corrective action to clean up the residual contamination; or
- Analyze a water sample for suspect pollutants to determine if the water meets the requirements of the National Pollution Discharge Elimination System Storm Water Permit.

Only personnel who have received training to determine the water quality can discharge water from containment areas, and then only upon the direct order of the FHL Compliance Manager. Only personnel who have received proper instruction and are otherwise qualified to determine whether the water is of sufficient quality to be released are permitted to discharge water from containment areas. Maintain a record that reflects the following information:

- An explanation of why excess precipitation was released.
- The name of the responsible person and method used.
- When the release was initiated.
- When the release was terminated.
- Approximate volume of water discharged.

See the *Rainwater Release Inspection Log* in Appendix A for use in documentation of these releases.

Buried Metallic Storage Tanks – §112.8(c)(4)

All buried metallic storage tanks are protected from corrosion by coatings or cathodic protection compatible with local soil conditions.

Partially Buried Metallic Storage Tanks – §112.8(c)(5)

All partially buried tanks are protected from corrosion by coatings or cathodic protection compatible with local soil conditions.

Periodic Integrity Testing for Aboveground Containers – §112.8(c)(6)

FHL personnel conduct and document monthly inspections of the aboveground containers. Refer to Appendix A, Prevention, Inspections, Testing, and Logs, for information regarding required inspections, testing, and inspection forms.

Internal Heating Coils – §112.8(c)(7)

No internal heating coils are located at FHL.

Fail-Safe Engineering – §112.8(c)(8)

The following equipment and procedures reduce the possibility of a significant discharge:

- Trained facility employees manually control and are present for all movements of oil products, HMs, and HW
- Tanks and auxiliary equipment are regularly inspected
- Tanks and containers are in close view of daily operations at the facility
- All tanks are equipped with tank gauges that are compatible with the tank's contents

Facility Effluents Discharged into Navigable Waters – §112.8(c)(9)

FHL does not have any effluent treatment facilities that discharge to navigable waters or their tributaries.

Correction of Tank Deficiencies – §112.8(c)(10)

All deficiencies found during periodic and monthly inspections are corrected promptly and reported. If the integrity of a tank has been compromised, it is immediately taken out of service, evaluated, and steps taken to correct all deficiencies.

Mobile/Portable Oil Storage Tank – §112.8(c)(11)

All MFTs at FHL are provided general secondary containment sufficient to prevent the most likely spill amount from reaching navigable waters. Portable oil storage tanks (i.e. 55-gallon drums) are managed IAW *FHL IHMWMP*.

4.15 Facility Transfer Operations, Pumping, and In-Facility Process – §112.8(d)(1) through (5)

Fuel is pumped from the commercial delivery vehicle into the ASTs and USTs. There is no underground transfer piping at FHL.

Buried Piping Installation – §112.8(d)(1)

There is limited buried piping at FHL. Buried piping that is installed or replaced will be

protected by wrapping and coating and protected from corrosion cathodically or by some other means. Sections of buried piping that have been exposed for any reason, are carefully inspected for deterioration and corrosion. If any corrosion damage is indicated, corrective action is taken.

Out-of-Service or Standby Piping– §112.8(d)(2)

There are no piping systems out of service or in standby service at FHL.

Piping Support Design – §112.8(d)(3)

All pipe supports are designed to minimize abrasion and corrosion and to allow for expansion and contraction.

Inspection of Aboveground Valves and Pipelines – §112.8(d)(4)

Facility personnel will perform a monthly inspection of all UST and AST aboveground piping.

Potential for Damage to Aboveground Piping – §112.8(d)(5)

Piping at FHL is installed such that it is not endangered by vehicle traffic.

4.16 Oil Production Facilities (Onshore) – §112.9(a) through (d)

This is not an oil production facility. This section does not apply to FHL.

4.17 Oil Drilling and Workover Facilities (Onshore) – §112.10(a) through (d)

This is not an oil drilling and workover facility. This section does not apply to FHL.

4.18 Oil Drilling, Production, or Workover Facilities (Offshore) – §112.11(a) through (p)

This is not an oil drilling, production, or workover facility. This section does not apply to FHL.

4.19 Animal Fats and Oils and Greases, and Fish and Marine Mammal Oils; and for Vegetable Oils, including Oils from Seeds, Nuts, Fruits, and Kernels (excluding production facilities) – §112.12(a) through (d)

The Dining Facility (Bldg. 206) has a portable container used to store waste grease, covered under §112.12(c)(11). No other sections are applicable to FHL.

4.20 General Requirements for Oil Spill Contingency Plan - §109.5

Criteria for the development and implementation of State, local and regional oil removal contingency plans are:

4.21 Defined Response Personnel – §109.5(a)

Response personnel responsibilities and duties are outlined in both Chapters 1 and 2 of this SPCC Plan in regards to spill response.

4.22 Notification Procedures §109.5(b)(1) – through (b)(4)

Identification of Critical Water Use Areas – §109.5(b)(1)

The identification of critical water use areas to facilitate the reporting of and response to oil discharges is located within the facility description section of Chapter 2 and the facility drainage section in Chapter 3.

Notification Personnel for Oil Discharges – §109.5(b)(2)

A current list of emergency personnel to be contacted in case of a discharge can be found in Chapter 1.

Communication Systems Access – §109.5(b)(3)

All personnel at FHL have easy access to a reliable communication system to report an oil discharge in a timely manner.

Assistance Request Procedure – §109.5(b)(4)

An established, prearranged procedure for requesting assistance during a major disaster or when the situation exceeds the response capability of the State, local or regional authority is outlined in Chapter 1.

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Chapter 5 Spill Countermeasures

5.1 Preplanning

Emergency Response Equipment and Supplies

Limited spill-response equipment and supplies are maintained for immediate use at FHL. Promptly clean and restore to good/ready condition any equipment used and replace any materials used.

Response Personnel

Page iv lists IRT personnel.

5.2 Emergency Response Actions

The primary objective of an emergency response is to preserve and protect life, health, environment, and property. When emergency response personnel arrive at a spill incident, they must take the following actions:

1. Thoroughly evaluate the situation.
2. Secure the area while protecting individuals from additional exposure.
3. Conduct appropriate search and rescue operations.

Once they complete these lifesaving tasks, the IOSC can focus on reducing and eliminating release effects by making controlled, expedient progress toward stabilization and cleanup. Emergency spill-response procedures are provided beginning on page 1-1.

5.3 Spill Discovery and Notification

Several levels of reporting requirements, both internal (within FHL) and external, are triggered by reportable spills of oil or a hazardous material.

Immediate Reporting Steps

1. The person who discovers the spill must immediately begin response procedures (see page iii) and notify the FHL DES.
2. For Major spills, the IOSC will call the FHL Environmental Office. The Environmental Office will notify all the appropriate state and federal agencies and contact a local spill-response contractor (if needed). If the Environmental Office can not be reached, call the Staff Duty Officer.
 - A live person must be contacted—messages are not an adequate notification.
3. The IOSC assesses the threat and, if necessary, communicates the need for evacuation and other emergency information, including:

- Health hazards
 - Evacuation routes and shelters to be used
 - Precautions for personal protection (see the MSDSs for safety precautions)
4. If the spill is a reportable spill or a “Major” spill, the IOSC must immediately complete the *Spill or Hazardous Substance Release Report Form* (page 1-3) and initiate the *Emergency Notification List* (page 1-1).



See page 2-3 for a definition of reportable spills.

In addition, if the spill is reportable, the Environmental Office must fax or call the NRC within 24 hours.

Additional Reporting Requirements:

Underground Spills: If an underground release occurs or is suspected, the Environmental Office must be notified within 24 hours. In addition, if an extremely hazardous substance is released below ground, the Environmental Office must notify the CalEMA. Suspicious conditions include unexplained loss of product in the tank; unusual operating conditions, unexplained water in the tank, or the presence of free product or vapors in basements, sewer lines, or surface waters.

PCB Spills: All spills involving one pound or more of polychlorinated biphenyls (PCBs) must be reported to the NRC by the Environmental Office. If a spill to surface or drinking water, sewers, grazing lands, or vegetable gardens involves ten pounds or more of PCB-containing material (materials containing 50-parts per million [ppm] or more PCBs), the regional USEPA office must also be notified.

Communication Among Responders

On-Site

During minor spills, face-to-face communication can ensure that response actions are coordinated. During major spills, the IOSC must ensure that response elements maintain adequate communication and coordination. Organizations supporting this SPCC Plan must develop a coordinated communication plan to avoid saturating radio channels.

Off-Site

Offsite emergencies (for example, local highways and railroads) may require additional communication between responders. FHL personnel who respond to offsite spills will report to staging areas to receive communication instructions and radio frequencies.

Evacuation Plans and Check-In Procedures

The Evacuation Plan takes the following factors into account:

- a. *Location of Potential Spill Sites*
 - See the facility Site Map in Appendix A for the location of potential spill sites
- b. *Prevailing Wind Direction and Speed*
 - Prevailing wind direction for the area is from the west throughout the year.
 - Wind direction and speed vary depending on the time of year, low and high atmospheric pressure systems, and storm fronts
- c. *Arrival Route of Emergency Response Personnel and Equipment*
 - Through the main entrance gate at the west side of the facility

If an area of the facility needs to be evacuated:

1. Facility personnel will proceed immediately to the nearest and safest exit, and assemble at the prearranged assemble point for each facility at FHL.
2. Employees must report to their supervisors when they reach the assembly area; supervisors must ensure all employees arrive. If an employee must leave the assembly area during an emergency evacuation, he/she must first notify a supervisor or another employee.
3. Anyone who requires immediate medical treatment should notify his/her supervisor. Designated facility personnel will likely have injured personnel transported to the FHL medical clinic.
4. After being accounted for, all employees will leave the facility as directed by their supervisors.

The IOSC will announce alternate evacuation plans, if necessary. If the facility does not need to be evacuated, the facility building will serve as an onsite assembly shelter.

Medical Support

Emergency Medical Support is available 24 hours a day by dialing 911. Note that if calling 911 from a mobile phone, be prepared to specify that you are on FHL. If outside the cantonment area, Range Control can be contacted to dispatch emergency medical support.

Medical support includes both treating victims and protecting personnel from toxic exposure. Triage and treatment activity typically occurs during the initial phases of the incident. Initially, victims may be injured by respiratory exposure or direct contact with HMs, resultant fires, or explosions. During release abatement and cleanup, victims may be injured by respiratory exposure or the physical stress of using protective clothing for a prolonged time.

5.4 Containment, Cleanup, and Disposal

Procedures for containing, cleaning up, and disposing of spills at potential spill sites begin on page 3-1. Initial spill-response procedures begin on page iii.

The SPCC Program Manager will evaluate the effectiveness of cleanup efforts and may recommend strategies to prevent or mitigate risks.

Appendix A

MAPS

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Appendix B

PREVENTION, INSPECTIONS, TESTING, AND LOGS

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Preventative Maintenance

Preventative maintenance involves the periodic lubrication, adjustment and replacement of worn parts in all equipment where equipment failure could result in a release of oils or hazardous materials, or impede response efforts. Systems that are used for the storage or transfer of petroleum products, hazardous materials, or hazardous wastes are required to have scheduled, routine preventative maintenance. Specific areas include:

- Bulk petroleum storage equipment including all tanks (aboveground and underground), associated piping, pumps, and corrosion control equipment; and
- Refueling trucks and associated piping.

ASTs and associated above and belowground pipes transferring petroleum products should be protected from corrosion either by protective coating, cathodic protection or stainless steel construction.

Inspections

Inspections play a large role in the prevention of releases. Facility personnel inspect those areas containing petroleum products or hazardous materials including hazardous waste points, fuel storage locations, vehicle storage locations, and hazardous material storage areas.

Facility personnel perform monthly and annual inspections, as described in this section of the SPCC Plan and IAW the provisions and the checklists presented in Steel Tank Institute (STI) SP001. The personnel performing these inspections are knowledgeable of storage facility operations, characteristics of the liquid stored, the type of AST and its associated components. The scope of inspections and procedures is covered in the training provided to employees involved in handling oil at the facility. The routine inspections focus specifically on detecting any change in conditions or signs of product leakage from the tank, piping system, and appurtenances.

Regular visual inspection of the major POL storage areas in a facility is critical to prevent or minimize the possibility of leaks or spills from this area. Regular preventative maintenance is performed on many of the components that comprise the POL complex, as per 40 CFR §112.7(e) and §112.8(c)(6). This includes a review, at a minimum, of the integrity of the following critical components of the POL storage areas:

- Storage Tanks
- Storage Drums
- Piping
- Pump Systems
- Containment Berms

Visual Inspections

The Tank Inspections table provides details including tank type, inspection frequency, type of inspection, and documentation to properly inspect the following components:

- Shop-fabricated steel tanks
- Aboveground fuel piping
- 55-gallon drums

Visual Inspection Checklists

Information is provided below on the inspection checklists to be used for the visual inspections:

Shop-fabricated Aboveground Storage Tanks

For aboveground shop-fabricated tanks, inspections are conducted utilizing the Aboveground Bulk Container Inspection Checklist in this appendix. A routine in-service visual inspection must be performed at least monthly on all such tanks.

Portable Containers

For portable containers (in this case, 55-gallon drums), a routine visual inspection must be performed monthly on all portable containers containing POL and hazardous materials. **Note: It is highly recommended that the facility replace the portable containers prior to the dates requiring formal tests be performed on these containers.** Refer to the Tank Inspections table for the inspections and frequencies for the portable containers at FHL.

Tank Inspections

Tank Type (Size)	Type of Inspection	Inspection Frequency	Inspection Documentation
Shop-fabricated ASTs	Periodic Inspections	Initially	SPCC Program Manager
		Monthly	Aboveground Container Monthly Inspection Checklist
		Annually	SPCC Program Manager
Portable container(s) (all 55-gallon drums containing POL or hazardous material)	Visual External Inspection	Monthly	Aboveground Container Monthly Inspection Checklist

All completed inspection forms must be attached to this Plan, archived at the facilities, or centrally located in the Environmental Office. If a problem is noted on the inspection report, it is the responsibility of the inspector to identify the problem to the SPCC Program Manager who will assist in resolving the problem quickly. Corrective action for a leak that is not contained by secondary containment and has the potential to enter groundwater must be taken of immediately. Corrective action for an observed leak contained by secondary containment must be initiated within 24 hours. If a deficiency is found during the visual inspection of the AST, immediately notify the SPCC Program Manager for information on integrity testing. Refer to the Tank

Inspections table on the previous page for the inspections and frequencies for the tanks installed at FHL.

Integrity Testing

FHL is deviating from the integrity testing provision of §112.8(c)(6) and §112.12(c)(2) for all shop-fabricated ASTs under 50,000 gallons, mobile storage tanks/refuelers and portable containers of 55 gallons or greater. This is based on good engineering practice after considering the tank installation and the requirements of STI Standard SP001 and alternative measures implemented by the facility. All ASTs and portable containers installed at FHL are on impermeable protection barriers and are situated to allow for visible detection of leaks around the portable container, tank, concrete pad, containment, or convault. Under SP001, the tanks are considered Category 1 tanks (AST with spill control and with continuous release detection method [CRDM]).

IAW inspection procedures outlined in this SPCC Plan, if signs of leakage or deterioration from the tank are observed by facility personnel, the tank is to be inspected by a tank inspector certified by the American Petroleum Institute (API) or STI to assess its suitability for continued service, according to STI SP001. If the leakage or deterioration results in a release of oil, consult the Initial Spill-Response Procedures on page ix for notification requirements.

The tank's physical configuration, combined with monthly and annual inspections, ensures that any small leak that could develop in the tank shell will be detected before it can become significant, escape secondary containment, and reach the environment. This approach provides ***equivalent environmental protection*** to the non-destructive shell evaluation component of integrity testing required under §112.8(c)(6), since it provides an appropriate and effective means of assessing the condition of the tank and its suitability for continued service.

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Rainwater Release Inspection Log

Copy and complete this form before discharging rainwater from secondary containment.

Location of containment area: _____

Name of person that examined the water: _____

Is there visual evidence that water in containment area has been contaminated?

Yes _____

No _____

Visual Indicators:

- Sheen
- Discoloration
- Other, explain _____

Fuel Type:

- MOGAS Diesel
- JP-4 JP-8

Name of person authorizing the release: _____

Approximate volume of water being released: _____

Date and time release began: ____/____/____

____:____ AM / PM

Date and time release ended: ____/____/____

____:____ AM / PM

Can contamination be removed using available absorbents and other supplies?

Yes _____

No _____

If yes, remove contamination prior to discharge.

If no, arrange for removal of the contaminated water in accordance with the hazardous waste plan and contact the environmental office to arrange for disposal of water.

Contents of drum(s): _____

Number of drum(s): _____

Person turning in wastes: Name: _____

Phone: (____) _____

Disposition of drum(s): _____

Person accepting drum(s): Name: _____

Phone: (____) _____

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Appendix C
SUPPORTING INFORMATION

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CROSS REFERENCE MATRIX (40 CFR §112.7)

40 CFR §112	Requirement Description	Chapter
§112.7	General requirements for SPCC Plans for all facilities and all oil types	Chapters 1, 2, and 4 Appendix B
§112.7(a)	General requirements; discussion of facility's conformance with rule requirements; deviations from Plan requirements; facility characteristics that must be described in the Plan; spill reporting information in the Plan; emergency procedures	Chapters 1, 2, and 4 Appendix B
§112.7(b)	Fault analysis	Chapters 1 and 2
§112.7(c)	Secondary containment	Chapters 3 and 4
§112.7(d)	Contingency planning	Chapter 1
§112.7(e)	Inspections, tests, and records	Chapter 4 Appendix A
§112.7(f)	Employee training and discharge prevention procedures	Chapter 4
§112.7(g)	Security (excluding oil production facilities)	Chapter 4
§112.7(h)	Loading/unloading (excluding offshore facilities)	Chapter 4
§112.7(i)	Brittle fracture evaluation requirements	Chapter 4
§112.7(j)	Conformance with State requirements	Chapter 4
§112.7(k)	Qualified Oil filled Operational Equipment	Chapter 4
§112.8, §112.12	Requirements for onshore facilities (excluding oil production facilities)	Chapter 4
§112.8(a), §112.12(a)	General and specific requirements	See Chapters listed above
§112.8(b), §112.12(b)	Facility drainage	Chapters 1 and 4
§112.8(c), §112.12(c)	Bulk storage containers	Chapters 3 and 4
§112.8(d), §112.12(d)	Facility transfer operations, pumping, and facility process	Chapter 4
§112.12	Requirements for Animal Fats and Oils and Greases, and Fish and Marine Mammal Oils; and for Vegetable Oils, including Oils from Seeds, Nuts, Fruits, and Kernels (excluding production facilities)	Not Applicable
§112.9	Requirements for onshore oil production facilities	Not Applicable
§112.10	Requirements for onshore oil drilling and workover facilities	Not Applicable
§112.11	Requirements for offshore oil drilling, production, or workover facilities	Not Applicable

CROSS REFERENCE MATRIX (40 CFR §109.5)

40 CFR §109.5	Requirement Description	Chapter
§109.5	General Requirements of Spill Contingency Plan	Chapter 4
§109.5(a)	Defined Response Personnel	Chapter 1 and 2
§109.5(b)	Notification Procedures	Chapter 2
§109.5(c)	Resource Capability Provisions and Commitments	Chapter 4 and 5
§109.5(d)	Oil Discharge Discovery and Notification Actions	Chapter 1 and 2
§109.5(e)	Recovery and Enforcement Measures	Chapter 5

Professional Engineer Certification

The undersigned Registered Professional Engineer is familiar with the requirements of Part 112 of Title 40 of the *Code of Federal Regulations* (40 CFR §112) and has visited and examined the facility, or has supervised examination of the facility by appropriately qualified personnel. The undersigned Registered Professional Engineer attests that this Spill Prevention, Control, and Countermeasures (SPCC) Plan has been prepared in accordance with good engineering practice, including consideration of applicable industry standards and the requirements of 40 CFR §112; that procedures for required inspections and testing have been established; and that this SPCC Plan is adequate for the facility. [40 CFR §112.3(d)]

This certification in no way relieves the owner or operator of the facility of his/her duty to prepare and fully implement this SPCC Plan in accordance with the requirements of 40 CFR §112. This SPCC Plan is valid only to the extent that the facility owner or operator maintains, tests, and inspects equipment, containment, and other devices as prescribed in this SPCC Plan.

Signed: _____

Michael Ernst, PE
Licensed Professional Engineer

Management Responsibility

In accordance with 40 CFR §112.7, the responsibility for oil spill control at FHL has been assigned as identified below:

Fort Hunter Liggett is committed to providing the manpower, equipment, facilities, and materials required to establish precautionary measures and to expeditiously control and remove any harmful quantity of oil or hazardous materials discharged from FHL.

By signature, I certify that I have reviewed and approved this SPCC Plan and agree to implement the necessary changes.

Signed: _____ Date: _____

Printed Name: _____ Position: _____

Document changes in management personnel and responsibility on page B-9.

Transfer of Management Responsibility

By signature, I certify that I have reviewed this SPCC Plan and assume responsibilities previously assigned to the person indicated on page B-5.

Signed: _____ Date: _____

Printed Name: _____ Position: _____

Transfer of Management Responsibility

By signature, I certify that I have reviewed this SPCC Plan and assume responsibilities previously assigned to the person indicated above.

Signed: _____ Date: _____

Printed Name: _____ Position: _____

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By signature, I certify that I have reviewed this SPCC Plan and assume responsibilities previously assigned to the person indicated above.

Signed: _____ Date: _____

Printed Name: _____ Position: _____

Certification of the Applicability of the Substantial Harm Criteria IAW 40 CFR §112 Appendix C

Facility Name: Fort Hunter Liggett
Facility Addresses: Jolon, CA 93928-7090

1. Does the facility transfer oil over water to or from vessels and does the facility have a total oil storage capacity greater than or equal to 42,000 gallons?

Yes _____ No X

2. Does the facility have a total oil storage capacity greater than or equal to 1 million gallons and does the facility lack secondary containment that is sufficiently large to contain the capacity of the largest aboveground oil storage tank plus sufficient freeboard to allow for precipitation within any aboveground oil storage tank area?

Yes _____ No X

3. Does the facility have a total oil storage capacity greater than or equal to 1 million gallons and is the facility located at a distance (as calculated using the appropriate formula in Attachment C-III to this appendix or a comparable formula 1) such that a discharge from the facility could cause injury to fish and wildlife and sensitive environments? For further description of fish and wildlife and sensitive environments, see Appendices I, II, and III to DOC/NOAA's "Guidance for Facility and Vessel Response Plans: Fish and Wildlife and Sensitive Environments" (see Appendix E to this part, section 13, for availability) and the applicable Area Contingency Plan.

Yes _____ No X

4. Does the facility have a total oil storage capacity greater than or equal to 1 million gallons and is the facility located at a distance (as calculated using the appropriate formula in Attachment C-III to this appendix or a comparable formula 1) such that a discharge from the facility would shut down a public drinking water intake 2?

1: If a comparable formula is used documentation of the reliability and analytical soundness of the comparable formula must be attached to this form.

2: For the purposes of 40 CFR §112, public drinking water intakes are analogous to public water systems as described at 40 CFR §143.2(c).

Yes _____ No X

5. Does the facility have a total oil storage capacity greater than or equal to 1 million gallons and has the facility experienced a reportable oil spill in an amount greater than or equal to 10,000 gallons within the last 5 years?

Yes _____ No X

Certification

I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document, and that based on my inquiry of those individuals responsible for obtaining this information, I believe that the submitted information is true, accurate, and complete.

Signature: _____

Name (please type or print): _____

Title: _____

Date: _____

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Record of Changes

By signing below, the reviewer is certifying the following, “I have completed the review and evaluation of the SPCC Plan for Fort Hunter Liggett will (will not) amend the plan as a result.” Complete the table below indicating required changes/amendments. If no changes/amendments are required, write ‘No changes or amendments required’ under the “Nature of Change/Amendment” column.

Review Date	Signature of Reviewer	Nature of Change/Amendment (include page number)	PE Re-Certification Required? (Yes/No)

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Implementation Schedule

The items in the Implementation Schedule are the upgrades needed at FHL to minimize release potential and bring the facility into compliance with the applicable regulations and with this SPCC Plan. Revise and update the schedule as tasks are completed and as new tasks arise.

Action Required	Regulatory Reference	Implementation Date
Provide adequate secondary containment for drums at building 176A, Central Hazardous Waste Facility	40 CFR 112.8(b)(11) requires drums be positioned or located to prevent a discharge and must have a secondary means of containment sufficient to contain the capacity of the largest single compartment or container with sufficient freeboard to contain precipitation.	
Provide adequate secondary containment for 1,200 gallon Used Oil AST at Building 176A or permanently close tank.	<p>40 CFR 112.8(b)(11) all bulk storage tanks be provided a secondary means of containment for the entire capacity of the largest single container and sufficient freeboard to contain precipitation.</p> <p>Permanently closed means:</p> <p>(1) All liquid and sludge has been removed from the tank and any connecting lines; and</p> <p>(2) All connecting lines and piping have been disconnected from the tank and blanked off, all valves (except for ventilation valves) have been closed and locked, and conspicuous signs have been posted on the tank stating that it is a permanently closed container and noting the date of closure.</p>	
Provide adequate secondary containment for waste grease container at DFAC.	40 CFR 112.8(b)(11) requires portable containers be positioned or located to prevent a discharge and must have a secondary means of containment sufficient to contain the capacity of the largest single compartment or container with sufficient freeboard to contain precipitation.	

SPCC Plan Compliance Table

Function	Information Location	Frequency			
		Weekly	Monthly	Annually	As Needed
Aboveground Container Inspection Checklist	Appendix A Page A-7		X		
Response Equipment Checklist	Appendix A Page A-9		X		
Annual SPCC Plan Training Roster	Appendix A Page A-11			X	
Rainwater Release Inspection Log	Appendix A Page A-13				X
Inspections and Integrity Testing	Appendix A Page A-4			X	
Spill Response Contractor Agreements					X

Acronyms

AEC	- U.S. Army Environmental Command
API	- American Petroleum Institute
AR 200-1	- Army Regulation 200-1
ASPA	- Aboveground Petroleum Storage Act
AST	- Aboveground Storage Tank
Cal/EMA	- California Emergency Management Agency
Cal/EPA	- California Environmental Protection Agency
CRDM	- Continuous Release Detection Method
CERCLA	- Comprehensive Environmental Response, Compensation, and Liability Act
CFR	- Code of Federal Regulations
CUPA	- Monterey County Health Department
DES	- Directorate of Emergency Services
DFAC	- Dining Facility
DoD	- Department of Defense
DOL	- Directorate of Logistics
DPW	- Directorate of Public Works
EO	- Environmental Officer
ECBM	- Environmental Compliance Branch Manager
ECNCO	- Environmental Compliance Non-Commissioned Officer
ECO	- Environmental Compliance Officer
EQCC	- Environmental Quality Control Committee
F&ES	- Fire and Emergency Services
FGS	- Final Governing Standards
FHL	- Fort Hunter Liggett
HAZWOPER	- Hazardous Waste Operations and Emergency Response
HM	- Hazardous Material
HMWC	- Hazardous Materials Waste Coordinator
HW	- Hazardous Waste
IAW	- In Accordance With
IC	- Incident Commander
IHMWMP	- Integrated Hazardous Material and Waste Management Plan
IOC	- Installation Operations Center
IOSC	- Installation On-Scene Coordinator
IRT	- Installation Response Team
MFT	- Mobile Fuel Tanker
MPRC	- Multi-Purpose Range Complex
NRC	- National Spill Response Center
O&M	- Operations and Maintenance
OWS	- Oil/Water Separator
PCB	- Polychlorinated Biphenyls
PE	- Professional Engineer
POL	- Petroleum, Oil, and Lubricant
PPE	- Personal Protective Equipment
ppm	- parts per million
RQ	- Reportable Quantity
SAP	- Satellite Accumulation Point
SPCC	- Spill Prevention, Control, and Countermeasures

- STI - Steel Tank Institute
- TSCA - Toxic Substance and Control Act
- USAG - United States Army Garrison
- USEPA - United States Environmental Protection Agency
- UST - Underground Storage Tank