

SPILL PREVENTION CONTROL AND COUNTERMEASURE PLAN

FAIRBANKS INTERNATIONAL AIRPORT
FAIRBANKS, ALASKA



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FINAL
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ACRONYMS AND ABBREVIATIONS

| | |
|--------|---|
| AAC | Alaska Administrative Code |
| ADEC | Alaska Department of Environmental Conservation |
| AMF | Airport Maintenance Facility |
| APF | FAI Airport Police and Fire |
| ARFF | Airport Rescue and Firefighting |
| AST | aboveground storage tank |
| CERCLA | Comprehensive Environmental Response, Compensation, and Liability Act of 1980 |
| CFR | Code of Federal Regulations |
| DOT&PF | Alaska Department of Transportation & Public Facilities |
| DSA | drum storage area |
| EPA | Environmental Protection Agency |
| FAA | Federal Aviation Administration |
| FAI | Fairbanks International Airport |
| FNSB | Fairbanks North Star Borough |
| FPPO | Facility Pollution Prevention Officer |
| FRP | Facility Response Plan |
| GHRWTP | Golden Heart Regional Wastewater Treatment Plant |
| NRC | National Response Center |
| OWS | oil water separator |
| PE | Professional Engineer |
| RA | Regional Administrator |
| SPAR | Division of Spill Prevention and Response |
| SPCC | Spill Prevention, Control, and Countermeasure |
| STI | Steel Tank Institute |
| SWPPP | Storm water Pollution Prevention Plan |
| U.S. | United States |
| UST | underground storage tank |
| WRCC | Western Regional Climate Center |

1.0 PLAN ADMINISTRATION

The State of Alaska Department of Transportation & Public Facilities (DOT&PF) owns and operates the Fairbanks International Airport (FAI) in Fairbanks, Alaska. This Spill Prevention Control and Countermeasure (SPCC) Plan was developed specifically to address only those facilities owned and operated by DOT&PF. This SPCC Plan was developed to meet requirements of Title 40 Code of Federal Regulations (CFR) 112.7 and 112.8 for onshore non-production facilities and takes into account revisions of 40 CFR 112 through December 2023.

This SPCC Plan does not apply for tenants who conduct business, park aircraft, or otherwise use FAI property. FAI lease stipulations require that these leaseholders independently prepare and maintain SPCC Plans and other environmental control documents, as required.

DOT&PF-owned and operated bulk storage containers are divided into 11 drainage areas to match the FAI Storm Water Pollution Prevention Plan (SWPPP). Within each drainage area, SPCC-regulated bulk storage containers are identified and discussed.

1.1 MANAGEMENT APPROVAL (40 CFR 112.7)

FAI is committed to preventing discharges of oil to navigable waters of the United States (U.S.) and the environment, and to maintaining the highest standards for spill prevention control and countermeasures through the implementation, regular review, and amendment to this SPCC Plan. This SPCC Plan has the full approval of management and FAI commits the necessary resources required to control and remove and quantify oil discharged that may be harmful.

The Environmental Manager is the Designated Person accountable for oil spill prevention at the facility, reports to management, and has the authority to commit the necessary resources to implement this SPCC Plan.

Angie Spear

Date:

Fairbanks International Airport Manager

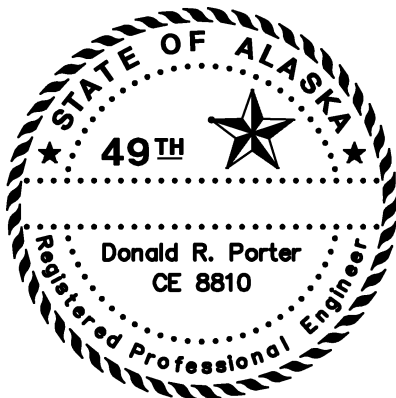
1.2 PROFESSIONAL ENGINEER CERTIFICATION (40 CFR 112.3(D))

I hereby attest:

- I am familiar with the requirements of this part (40 CFR, Parts 112.1 – 112.8)
- I or my agent has visited and examined this facility
- This SPCC Plan has been prepared in accordance with good engineering practice, including consideration of applicable industry standards, and with the requirements of 40 CFR, Parts 112.1 – 112.8
- That procedures for required inspections and testing have been established
- This SPCC Plan is adequate for the facility
-

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

This certification will expire in five years, if there is a change in the facility design, construction, operation, or maintenance which materially affects the potential for discharge of oil into or upon navigable waters or adjoining shorelines.



Name: Donald R. Porter

Title: Group Manager- Utilities

Date: 21 December 2023

Registration No.: CE 8810

State Registration: State of Alaska

1.3 ENGINEER'S OBSERVATIONS

To comply with EPA spill prevention measures presented in 40 CFR, Parts 112.1 – 112.8, the corrective actions listed in **Table 1-1** must be implemented. These compliance items were identified following a physical inspection on 16 November 2023.

Table 1-1: Compliance Items

| Compliance Item | Reference | Recommended Solution | Proposed Completion Date | Compliance Item Resolved | |
|--|---|--|--------------------------|--------------------------|----------|
| | | | | Date Resolved | Comments |
| Container Identification. All tanks, containers, and drum storage areas require labels that include the container IDs, tank capacity, and tank contents. | 40 CFR 112.7 (a)(3)(i); Section 2.2 of SPCC Plan | Place labels with necessary information on each tank. | April 2024 | | |
| Spill Response. Spill response kits are not readily accessible for tanks AST 1, AST 8a, or TBD2. | 40 CFR 112.7 (a)(3)(iv); Sections 3.2 & 5.3 of SPCC Plan | Add a petroleum spill kit near listed tanks where they are quickly and easily accessible. | January 2024 | | |
| Secondary Containment. Detailed inspections of the Environmental Building's 5,000-gallon secondary containment tank/sump (UST 19) are not being performed. | 40 CFR 112.7 (e) & 112.8 (c)(4); Section 4.2.3 of SPCC Plan | Develop procedures to regularly monitor sump level. Perform annual leak test on sump, possibly via hydrostatic testing. If not possible, decommission the tank and store oil drums on spill pallets. | January 2024 | | |
| Tank Identification. There is a tank labeled "Terminal Boiler Emergency Fuel Tank" that is stored outside the northwest side of the Airport Maintenance Facility that is not properly listed or labeled. | 40 CFR 112.7 (a)(3)(i); Section 2.2.1 of SPCC Plan | Determine the status of this tank (labeled "Empty Tank" under Out-of-Service containers in Appendix B), then label it with necessary information. If no longer in use, ensure it is officially decommissioned. | April 2024 | | |

1.4 APPLICABILITY (40 CFR 112.1)

The procedures outlined in this SPCC Plan reflect the current requirements of 40 CFR, Parts 112.1 to 112.8. As provided by 40 CFR 112.1, a SPCC Plan is required for all non-transportation-related facilities that could reasonably be expected to discharge oil, either directly or indirectly, into or upon navigable waters of the U.S. or adjoining shorelines, or into or upon the waters of the contiguous zone, or in connection with activities under the Outer Continental Shelf Lands Act or the Deepwater Port Act of 1974, or that may affect natural resources belonging to, appertaining to, or under the exclusive management authority of the U.S., except in the following select instances that are directly pertinent to FAI (summarized from 40 CFR 112.1(d)):

- Owner/operator subject to EPA jurisdiction and meets both of the following criteria:
- The aggregate aboveground capacity to store oil is 1,320 gallons or less
- An underground storage capacity of oil that is less than 42,000 gallons, excluding capacity covered by 40 CFR 280 or 281 (underground storage tank [UST] regulations)
- Container stores less than 55 gallons of oil

DOT&PF-operated portions of FAI have an aggregate aboveground oil storage capacity of approximately 19,000 gallons and has the potential to result in a discharge to wetlands or other surface water bodies. Therefore, the facility meets the applicability requirement and an SPCC Plan is required.

1.5 LOCATION OF SPCC PLAN (40 CFR 112.3(E))

A complete copy of this SPCC Plan will be maintained in the Environmental Manager's office in the main terminal. This SPCC Plan will be available for review as needed during normal business hours.

1.6 SPCC PLAN REVIEW (40 CFR 112.3, 112.5)

This section describes the circumstances and frequency under which this SPCC Plan must be reviewed and amended.

1.6.1 CHANGES IN FACILITY CONFIGURATION (40 CFR 112.3(D), 112.5)

FAI will periodically review, evaluate, and amend this SPCC Plan for changes in the facility design, construction, operation, prevention, and control technologies and/or maintenance that materially affects the facility's potential for an oil discharge in accordance with 40 CFR 112.5.

If necessary, FAI will make needed revisions to the SPCC Plan no later than six months after the change occurs. The revised SPCC Plan must be implemented as soon as possible following a technical amendment, but no later than six months from the date of the amendment in accordance with 40 CFR 112.3(d). The Facility Pollution Prevention Officer (FPPO) (**Section 1.1**) is responsible for initiating and implementing the revisions to the SPCC Plan.

Amendments reflecting technical changes requiring certification by a Registered Professional Engineer (PE) and include:

- Commissioning or decommissioning containers
- Reconstruction, replacement, or installation of piping systems
- Construction or demolition that might alter secondary containment structures
- Changes of product or service, revisions to standard operation, modification of testing/inspection procedures, and use of new or modified industry standards or maintenance procedures
- Other changes which materially affect the facility's potential to discharge oil

Non-technical amendments can be completed by FAI but must be documented. Non-technical amendments include:

- Change in the name or contact information (e.g., telephone numbers) of individuals responsible for the implementation of this SPCC Plan
- Change in the name or contact information of spill response or cleanup contractors

Changes shall be noted on the Review and Revisions Log and documented using the SPCC Modification Form, both included in **Appendix A**. For modifications involving technical changes, the SPCC Modification Form is signed and stamped by a PE. Completed SPCC Modification Forms are maintained with this SPCC Plan for as long as this SPCC Plan is valid, or until the SPCC Plan is recertified at the end of five years.

1.6.2 SPCC PLAN REVIEW (40 CFR 112.5(B))

This SPCC Plan must be completely reviewed and evaluated at least once every five years, regardless of changes made in accordance with **Section 1.1**. Necessary revisions must be made within six months of the five-year review. A registered PE must certify a technical amendment to the SPCC Plan in accordance with 40 CFR 112.3(d). The review must take place no later than five years from the date stamped in the PE certification, but prior to the expiration date of the PE certification provided in **Section 1.1**.

Reviews are recorded in the Review and Revisions Log located in **Appendix A**, and documentation of changes to the plan must be recorded and signed on the SPCC Plan Modification Form (**Appendix A**). If the SPCC Plan is determined to be satisfactory, then a signed entry shall note that no changes were made.

1.6.3 AMENDMENT BY REGIONAL ADMINISTRATOR (40 CFR 112.4)

If an oil spill exceeds 1,000 gallons in a single event, or two oil spills exceed 42 gallons within a 12-month period, the U.S. Environmental Protection Agency (EPA) Regional Administrator (RA) must be notified within 60 days of the incident. Notification details are found in **Section 1.1**.

1.7 PLANNED CHANGES IN OPERATION (40 CFR 112.7)

There are no current plans for changes in operation at FAI.

1.8 RECORDS (40 CFR 112.7(E), 112.7(F)(1), 112.8(C)(6))

A copy of the following records will be kept for at least three years in FAI's Environmental Office:

- Records, signed by the appropriate supervisor or inspector, of inspections and tests required in this SPCC Plan
- Containment discharge log form
- Training and discharge prevention briefings records

1.9 COMPLIANCE WITH APPLICABLE REQUIREMENTS (40 CFR 112.7(A)(2))

All FAI containers on site comply with the applicable requirements of 40 CFR 112. No equivalent environmental measures have been utilized at these facilities. Compliance items are listed in **Table 1-1** together with expected dates by when these items must be brought into compliance.

1.10 CROSS-REFERENCE WITH SPCC PROVISIONS (40 CFR 112.7)

This SPCC Plan does not follow the exact order presented in 40 CFR 112. Section subheadings identify the relevant section(s) of the SPCC Plan rule. **Table 1-2** presents a cross-reference of plan sections relative to applicable parts of 40 CFR 112.

Table 1-2: CFR 112.1 to 112.8 SPCC Cross-References

| Provision | Regulation Topic | SPCC Plan Section |
|---------------------------------|--|--------------------------|
| CFR 112.1 | Applicability | Section 1.4 |
| CFR 112.3(d) | Professional Engineer Certification | Section 1.2 |
| CFR 112.3(e) | Location of SPCC Plan | Section 1.5 |
| CFR 112.4 | Amendment by Regional Administrator | Section 1.6.3 |
| CFR 112.3 / 112.5 | Plan Review | Section 1.6 |
| CFR 112.7 | Management Approval | Section 1.1 |
| CFR 112.7 | Cross-Reference with SPCC Rule | Section 1.10 |
| CFR 112.7 | Planned Changes in Operation | Section 1.7 |
| CFR 112.7(a)(2) | Compliance with Applicable Requirements | Section 1.9 |
| CFR 112.7(a)(3) | Facility Information | Section 2.0 |
| CFR 112.7(a)(3)(i) | Oil Storage Containers | Appendix B |
| CFR 112.7(a)(3)(ii) | Discharge Prevention Measures | Section 3.0 |
| CFR 112.7(a)(3)(iii) | Discharge and Drainage Controls | Section 4.0 |
| CFR 112.7(a)(3)(iv) | Countermeasures | Section 5.0 |
| CFR 112.7(a)(3)(v) | Material Disposal | Section 5.6 |
| CFR 112.7(a)(3)(vi) | Contacts | Appendix E |
| CFR 112.7(a)(4) | Discharge Notification | Section 5.4 |
| CFR 112.7(a)(5) | Discharge Response | Section 5.3 |
| CFR 112.7(b) | Potential Discharge and Flow Direction | Section 5.1 |
| CFR 112.7(c) | Containment and Diversionary Structures | Section 3.2 |
| CFR 112.7(d) | Practicability of Secondary Containment | Section 3.3 |
| CFR 112.7(e) | Inspections, Tests, and Records | Section 3.4 |
| CFR 112.7(f)(1) | Training and Discharge Prevention Procedures | Section 3.5 |
| CFR 112.7(f)(2) | Pollution Prevention Officer | Section 2.1.1 |
| CFR 112.7(g) | Security | Section 3.6 |
| CFR 112.7(h) | Tank Truck Loading/Unloading Racks | Section 3.7 |
| CFR 112.7(i) | Brittle Fracture Evaluation | Section 3.7 |
| CFR 112.7(j) | Conformance with Applicable State and Local Requirements | Section 3.8 |
| CFR 112.7(k) | Qualified Oil-Filled Operational Equipment | Section 3.7 |
| CFR 112.7(a)(3)(iii) / 112.8(b) | Facility Drainage | Section 4.1 |
| CFR 112.8(c)(1) | Bulk Storage Container Construction | Section 4.4.1 |
| CFR 112.8(c)(2) | Secondary Containment | Section 4.4.2 |
| CFR 112.8(c)(3) | Drainage of Diked Areas | Section 4.3 |
| CFR 112.8(c)(4) | Buried Metallic Storage Tanks | Section 4.4.3 |
| CFR 112.8(c)(5) | Partially Buried and Bunkered Storage Tanks | Section 0 |
| CFR 112.8(c)(6) | Facility Inspection | Sections 3.4 |
| CFR 112.8(c)(7) | Heating Coils | Section 0 |
| CFR 112.8(c)(8) | Overfill Prevention System | Section 4.4.4 |
| CFR 112.8(c)(9) | Effluent Treatment Facilities | Section 4.4.5 |
| CFR 112.8(c)(10) | Visible Discharges | Sections 4.4.6 and 5.2 |
| CFR 112.8(c)(11) | Mobile and Portable Containers | Section 4.4.7 |
| CFR 112.8(d) | Transfer Operations, Pumping and In-Plant Processes | Section 4.5 |

2.0 FACILITY INFORMATION

This section generally describes aspects of the physical location and features of FAI. Relevant drawings are provided as follows in **Appendix C**:

Table 2-1: Drawing Reference

| Drawing Identifier | Description |
|--------------------|---------------------------------------|
| C-01 | Vicinity Map |
| C-02 | Drainage Area Map |
| C-03 | Drainage Area 1 - Container Locations |
| C-04 | Drainage Area 3 - Container Locations |
| C-05 | Drainage Area 9 - Container Locations |

2.1 GENERAL FACILITY INFORMATION (40 CFR 112.7(A)(3))

Table 2-2: Facility Information Table

| Parameter | Description | | |
|--|--|--|--|
| Facility Name | Fairbanks International Airport | | |
| Facility/Mailing Address | 6450 Airport Way, Ste 1, Fairbanks, AK 99709 | | |
| Latitude/Longitude | 64° 48' 51" N / 147° 51' 31" W | | |
| Facility Type | International Airport | | |
| Date of Initial Operations | 1952 | | |
| Owner/Operator | Alaska Department of Transportation & Public Facilities | | |
| Primary Contacts | <table border="0"> <tr> <td>Jake Matter Environmental Manager 907.474.2598 Jake.matter@alaska.gov</td> <td>Angie Spear Airport Manager 907.474.2529 Angie.spear@alaska.gov</td> </tr> </table> | Jake Matter Environmental Manager 907.474.2598 Jake.matter@alaska.gov | Angie Spear Airport Manager 907.474.2529 Angie.spear@alaska.gov |
| Jake Matter Environmental Manager 907.474.2598 Jake.matter@alaska.gov | Angie Spear Airport Manager 907.474.2529 Angie.spear@alaska.gov | | |

2.1.1 FACILITY POLLUTION PREVENTION OFFICER (40 CFR 112.7(F)(2))

The FPPO is responsible for spill prevention at the facility. The FPPO must be familiar with the SPCC Plan and is responsible for notifying FAI of necessary changes. The FPPO for FAI is the Environmental Manager.

2.2 FACILITY DESCRIPTION (40 CFR 112.7(A)(3))

FAI is owned and operated by DOT&PF. This Plan specifically covers the DOT&PF buildings at FAI and FAI operations. FAI's principal mission is the operation of the airport and associated facilities in support of domestic and international air traffic. The facility layout is shown on **Drawing C-02** in **Appendix C** and includes containers listed in **Appendix B**.

In addition to the primary FAI facility, there are numerous lease holders and tenant facilities located on airport property which provide aircraft refueling, charter aircraft services, vehicle rental, air freight, and other aviation-related support services. FAI is not responsible to provide individual SPCC Plans for tenants who conduct business, park aircraft, or otherwise use FAI property for their purposes.

2.2.1 PHYSICAL LAYOUT

FAI is located at 6450 Airport Way within the Fairbanks North Star Borough (FNSB), approximately four miles west of downtown Fairbanks, Alaska near the confluence of the Chena and Tanana Rivers (**Drawing C-01**). Aircraft activity at FAI includes major air carrier operations, cargo operations, commuter/air taxi operations, and general aviation operations. Runway facilities include an 11,800-foot paved runway, a general aviation 6,500-foot paved runway, a 2,900-foot general aviation/ski strip gravel runway, and a 5,400-foot float plane runway, all of which are oriented northeast-southwest.

FAI is a 24/7 facility with three main operational centers: the Terminal for administrative and operational offices, an AMF for heavy equipment maintenance and trades staff, and the Airport Response Center (ARC) which houses FAI's police, firefighters, dispatch, operations staff, and has shops to support airfield maintenance.

Numerous lease holders and tenant facilities are located on airport property which are not covered under this SPCC Plan. Tenants provide aircraft refueling, charter aircraft, vehicle rental, air freight, and other aviation-related support services. The facility has been in operation at this location since 1952.

Storm water drainage at FAI is subdivided into 11 areas with different discharge points. Storm water from FAI travels via sheet flow and/or flows through ditches and pipes to surrounding ponds and wetlands that ultimately drain towards the Chena and Tanana Rivers. Most of the facility's ground surface area is paved with asphalt, however unpaved areas exist at FAI consisting of compacted gravel, grass, and low-lying shrubs. **Drawing C-02** shows the storm water conveyance system and general surface water flow direction at FAI.

2.2.2 OIL-FILLED CONTAINERS

Container or equipment descriptions and the capacities and types of oil in containers present at the facility are listed in **Appendix B** and further described below. The locations of each container and associated drainage areas listed in **Appendix B** are shown in **Drawings C-03 through C-05**. Included in the oil container table are:

- All bulk storage containers, ASTs and USTs, not subject to 40 CFR 280 or 281
- All containers with an oil storage capacity of 55 gallons or more
- Oil-filled operational equipment with an oil capacity of 55 gallons or more. This includes oil storage containers which support the function of the operational equipment, such as hydraulic systems, lubricating systems and transformers.
- No transformers at FAI contain mineral oil, therefore they are not regulated by SPCC regulations.

Not included in the oil storage container table are:

- Motive power containers, defined as onboard bulk storage container used primarily to power the movement of a motor vehicle or ancillary onboard oil-filled operational equipment
- USTs subject to the technical requirements of the ADEC UST program requirements under Alaska Administrative Code (AAC) Title 18, Chapter 78 (18 AAC 78)
- Oil-water separators (OWS) or other containers that are used exclusively for wastewater treatment and are not used to store accumulated oil
- Oil storage containers with capacities of less than 55 gallons

- Containers that are "permanently closed" per the requirements discussed in this SPCC Plan.

If other tanks, containers, or equipment are purchased as permanent storage containers or added as operational equipment, the SPCC Plan will be revised within six months of placing these containers or equipment in service.

BULK STORAGE CONTAINERS – STATIONARY AST

There are 11 stationary oil-containing ASTs at the facility. Capacities range from 100 gallons to 5,000 gallons. All are shop-fabricated welded steel tanks and constructed for oil storage. One day-tank is self-diked construction (AST 30) and located inside the AMF within Drainage Area 1 (**Drawing C-03**). Two tanks are single wall construction (ASTs 15 and 16) located within Drainage Area 3 (**Drawing C-04**). The remaining eight are double-walled tanks located within Drainage Areas 1, 3, and 9 (**Drawings C-03 through C-05**). All the ASTs are equipped with overflow protection either by an automatic shut valve or level sight gauge, as noted in **Appendix B**.

BULK STORAGE CONTAINERS – PORTABLE AND MOBILE TANKS

Portable containers such as 55-gallon drums that contain oil are located in multiple areas of FAI including inside the AMF (drum storage area [DSA] 4), Field Maintenance Facility (DSA 5), and Environmental Building (DSA E). These drum areas are contained inside buildings with concrete floors and are either connected to an OWS or a UST that serves as secondary containment.

MOBILE REFUELER

There is one mobile refueler at FAI that is a single-wall, 100-gallon tank mounted on the bed of a truck. The tank is mounted on Unit 212 truck which is typically parked inside the Field Maintenance shop when not in use.

BULK STORAGE CONTAINERS – NON-REGULATED UST

FAI includes one heating oil UST at the AMF (UST 11A) and one empty heating oil UST at the FAA Base Building (UST FAA). Neither USTs are subject to ADEC UST program requirements and are therefore regulated under this SPCC Plan. UST 11A is an STI-P3 double-wall constructed tank with a protective coating and galvanic cathodic protection with a 5,000-gallon capacity and is identified on **Drawing C-04**. A voltmeter is used to test the cathodic protection of the tank annually.

UST FAA is empty, and a sign is posted on the fill pipe indicating the tank is abandoned. FAI no longer uses this UST, as it was replaced with AST FAA. UST FAA has been permanently closed. See Permanently Closed / Out of Service Containers section for additional information.

CONTAINER IDENTIFICATION

Stationary bulk oil storage containers are clearly marked with capacities, tank IDs and content. At a minimum, stationary containers should be clearly marked with the following:

- Container ID, corresponding with the container list located in **Appendix B**, if practical
- Container contents
- Container capacity.

All the containers are missing one or more of these three markings. This has been noted as a compliance item in **Table 1-1**.

PERMANENTLY CLOSED / OUT OF SERVICE CONTAINERS

For SPCCs, the ADEC term “out of service” and EPA term of “permanently closed” are used interchangeably because the respective requirements are equivalent. At FAI there is one oil container, UST FAA, that is known to be permanently closed. One additional tank, currently identified as “Empty Tank” in **Appendix B** and “Empty AST” on **Drawing C-03**, is presumed to be out-of-service but this determination could not be made during the November site visit performed in support of this SPCC Plan update. This tank must be properly labeled and decommissioned, if necessary, which is listed as a compliance item on **Table 1-1**. In order to be considered permanently closed and removed from the oil-containing tank inventory, containers must meet the following requirements:

- Liquid and sludge have been removed from the container and connecting lines
- Lines and piping have been disconnected from the container and blanked off
- Valves have been closed and locked
- Conspicuous signs have been posted on each container stating that it is a permanently closed container and noting the date of closure.

Prior to placing an out of service tank back into service, the tank must be inspected per Steel Tank Institute (STI) SPO01, *Standard for the Inspections of Aboveground Storage Tanks*.

3.0 DISCHARGE PREVENTION – GENERAL

FAI recognizes that spill awareness and planning procedures are key components to spill prevention. The facility operates in a manner that provides highly reliable procedures in the handling, transfer, and storage of petroleum products. Discharge prevention measures include procedures for transfer of product to storage tanks, training of personnel in spill awareness and prevention, and appropriate design and inspection of oil-filled containers, including secondary containment and discharge controls.

3.1 GENERAL SPILL PREVENTION (40 CFR 112.7(A)(3)(II))

ASTs are properly maintained to prevent leakage of oil through pipe connections, valves, and other parts of the tank. Visible leaks sufficiently large enough to cause the accumulation of oil will be noted during routine inspections and operation and repaired as soon as possible. Personnel are at the facility during normal business hours, and a spill would quickly be discovered during routine operations and appropriate actions taken to remedy.

All bulk storage containers are refilled by a private commercial fuel supplier tanker truck under contract with FAI, and spill prevention during this process is the responsibility of the contractor. The contractor is responsible for their employees' training in spill prevention and oil product management to ensure proper visual observation is performed during fueling. Fuel tanker truck transfer procedures followed at each bulk storage container (ASTs and USTs) are:

- Prior to commencing fuel transfer, the existing fuel level in the storage tank must be measured and verified by the driver to confirm that sufficient storage tank volume is available to receive the volume of fuel to be transferred.
- Fuel transfer personnel must be properly trained in fuel handling and transfer procedures, personal protective equipment, and emergency response actions.
- Smoking is not allowed at any time during fuel transfer.
- Fuel Tanker Trucks will be equipped with emergency spill response equipment adequate to handle small releases.
- The fuel transfer truck must utilize wheel chocks.
- The fuel transfer driver must conduct a visual reconnaissance of the area and the storage tank prior to initiating fuel transfer to confirm site conditions are amenable to transferring fuel.
- The driver is required to remain at the vehicle at all times while fuel is being transferred.
- Throughout the fuel transfer process, the driver will remain alert and must maintain unobstructed visual contact of the delivery truck, transfer hose(s) and the storage tank.
- Throughout the fuel transfer process, the driver must remain within 25 feet of all components of the fuel transfer process, including the tank truck pumps and valves, fuel transfer line, and storage tank.
- Unless specifically needed for fuel transfer, all vehicle engines and motors will be turned "off."
- Fuel transfer operations are to be performed only in areas designated for such purposes.
- The drain valve on the delivery truck is to be closed and all fuel in the transfer line annulus is to be drained into the storage tank prior to disconnecting the fuel transfer line.
- Prior to departure, the driver will confirm all tank truck valves are secure and no leakage is present, as well as confirm the storage tank valves and access gates are locked and secure. Fuel volume transfer will be logged as part of the delivery report.

- Deviation from these procedures or observed problems must be immediately reported to the fuel supplier and appropriate FAI personnel.

FAI personnel directly involved with handling and transfer of oil products receive appropriate training in spill prevention and oil product management, addressed in **Section 3.5** of this SPCC Plan. Oil transfers from bulk fuel tanks into vehicles, or from drums into other bulk storage containers, are performed in conformance with the procedures for bulk fuel transfers presented above.

All used oil ASTs are filled by FAI personnel on an 'as-necessary' basis. An unknown quantity of used oil is burned at FAI in a used oil heater located above AST 15 and AST 16. The remaining used oil is transported off-site and ultimately recycled or disposed of by a contracted waste management company under contract with the State of Alaska.

3.2 CONTAINMENT AND DIVERSIONARY STRUCTURES (40 CFR 112.7(C))

Sized secondary containment is described in **Section 4.4.2**. For oil discharges outside of secondary containment, FAI utilizes multiple containment and diversionary structures, some of which alternate depending on the season.

Spill response equipment are located at the ARC fuel station, near the fire training area, and inside the Environmental Building, ARC building, FAA building and AMF building. Absorbent pads are also stored in some FAI trucks. Spill response equipment varies slightly at each location but always consist of sorbent pads and granules. The FAI Police and Fire Department maintains a Spill Response Trailer in the ARC Building which is stocked with a variety of spill containment and cleanup equipment for larger releases.

All bulk storage containers at this facility have integral secondary containment (double-walled or self-diked ASTs) or are located inside buildings with concrete floors connected to an oil-water separator or secondary containment tank. The concrete floors at the AMF shop, Field Maintenance Facility (located within the ARC Building), and Aircraft Rescue and Firefighting (ARFF) shop at the ARC building are designed to slope towards floor drains that are connected to an OWS. At the Environmental Building the floor is sloped towards a floor drain that drains into an underground 5,000-gallon tank (UST 19) on the east side of building which serves as secondary containment.

When in one location for at least 24 hours, the mobile refueler is staged inside the Field Maintenance Facility within the ARC Building where the building floor drains are connects to an OWS.

3.3 PRACTICABILITY OF SECONDARY CONTAINMENT (40 CFR 112.7(D))

Secondary containment has been found practicable for this facility (**Appendix B**).

3.4 INSPECTIONS, TESTS, AND RECORDS (40 CFR 112.7(E))

Inspections and tests of oil containers and secondary containment are conducted on a regular frequency dependent upon the type of container and its use. Monthly and annual inspections are conducted by appropriately trained company personnel, and include container supports and foundations as well as impoundment areas. The following sections describe these inspections. STI SPO01, *Standard for the Inspections of Aboveground Storage Tanks*, is used as the standard for all shop-fabricated tank inspections. Inspection and test records are kept by the Environmental Manager.

According to STI SPO01, leak testing is not required for shop-fabricated ASTs that are classified as Category 1. All the tanks at FAI are either constructed with double-walled or self-diked secondary containment and equipped with overflow prevention devices and are therefore classified as Category 1 tanks, except for the drums stored in DSAs as noted in **Section 2.2.2**. If visual inspection indicates a potential for tank failure, integrity testing will be conducted or the tank will be removed from service.

UST 11A does require periodic cathodic protection testing and constant leak detection monitoring to satisfy ADEC UST regulations.

3.4.1 MONTHLY INSPECTIONS

Visual inspections must be conducted monthly to monitor and record the condition of each oil container. The checklist provided in **Appendix D**, or an equivalent worksheet is used for these visual inspections. Portable containers such as drums and totes may be inspected as a group if they are stored in a common area. Visible leaks or spills must be promptly cleaned up and the problem corrected.

Secondary containment for containers of volume 55 gallons or greater are inspected monthly along with the tank inspections. Spills, precipitation, debris, and other materials that could reduce the volume of the secondary containment are removed as soon as practicable.

Valves, piping, and other parts or accessories connected to oil containers are considered part of the container and included in the inspections. ASTs, valves, and piping will be visually examined as stated. The examination will include the following elements:

- General condition and appearance,
- Need of maintenance,
- Foundation and supports
- Additionally, spill cleanup equipment inventory must be checked monthly to identify materials requiring replacement. The inspections of spill response equipment will be recorded on the inspection checklist.

All ASTs will be inspected monthly for presence of water according to STI SPO01. If after four consecutive inspections no water is present inside an AST, inspection frequency for the presence of water in the AST may be reduced to annually. Water-indicating paste on a dipstick or another suitable method/device may be used to check for water in the ASTs. If water is detected, the water will be removed by a qualified service contractor.

3.4.2 ANNUAL INSPECTIONS

A more thorough inspection is conducted annually. The Annual Inspection Checklist (**Appendix D**) identifies the items included in the annual inspection.

3.4.3 CERTIFIED INSPECTIONS AND TESTING

There are no tanks at FAI that require certified inspections or testing per STI SPO01.

Certified inspections and testing of shop-fabricated steel tanks and containers by an STI-certified inspector will be conducted as specified in STI SPO01. In general, tanks with capacities of 5,000 gallons or less which have appropriate environmental controls (such as secondary containment and spill control) and are routinely inspected and problems corrected as defined in **Sections 3.4.1 and 3.4.2**, do not require periodic inspection by certified inspectors. Tanks with capacities greater than 5,000 gallons are required to have periodic certified inspections.

The underground secondary containment tank at the Environmental Building must be leak tested annually to ensure its integrity is maintained. This has been noted as a compliance item in **Table 1-1**. Repairs are performed based on the results of these inspections.

The UST cathodic protection system is tested by an ADEC Certified UST Inspector at least once every three years.

3.4.4 INSPECTION RECORDS

At a minimum, all completed inspection and test forms must be signed by the individual who conducted the inspection and retained on file in the Environmental Department for at least three years. Copies of the inspections will also be filed in the Environmental Department at FAI. Records of corrective actions taken must be maintained for the service life of the tank.

3.5 TRAINING AND DISCHARGE PREVENTION PROCEDURES (40 CFR 112.7(F)(1))

FAI recognizes that all oil-handlers must be trained and kept current in the operation and maintenance of equipment to prevent discharges, discharge procedure protocols, applicable pollution control laws, rules, and regulations, general facility operations, and the contents of this SPCC Plan. New facility personnel with oil-handling responsibilities will be provided with this same training.

FAI will conduct annual SPCC discharge prevention training for all personnel active with SPCC inspections, oil or fuel transferring, and other practices related to handling oils. Online and on-site training is conducted by the Environmental Manager or designee who is knowledgeable of the contents of this SPCC Plan and SPCC federal and local regulations. At a minimum, the training will include:

- The purpose of this SPCC Plan
- Identification of spill sources
- Spill containment and cleanup procedures
- Spill notification procedures
- Review fuel and oil transfer procedures not previously in this SPCC Plan
- Summarize findings of monthly visual inspections and monthly mechanical checklist items
- All known discharges in the past review period and a full explanation of cause of discharge and methods to prevent future spill
- Malfunctioning equipment and components at ASTs, USTs, and associated piping
- New or revised precautionary measures to prevent discharges
- Maintenance and operation of equipment

Personnel training is documented and maintained on file in the Environmental Office for at least three years.

3.6 FACILITY SECURITY (40 CFR 112.7(G))

A minimum level of site security at each facility and storage tank is required, as well as engineering judgment regarding higher levels of facility protection and security as site-specific conditions warrant. FAI maintains its own uniformed police and fire department which performs regular patrols of all basins discussed in this SPCC plan. Specific security measures include:

- Fencing or Controlled Access around ASTs: FAI facilities have secured and controlled access or are routinely monitored by FAI police and operations personnel 24 hours per day, 365 days per year. Therefore, the entire facility is in a secured environment.
- Bollards: Protective bollards or concrete barriers have been installed where the potential for collision with tanks exists, including the ARC fuel station.
- Lighting: Most bulk storage container sites have adequate overhead lighting from security lighting and/or general facility lighting and interior building lighting. The 5,000-gallon AST at the Fire Training Area is not lit; however, it is within the facility security fence and the tank is normally used during daytime hours.

3.7 NON-APPLICABLE REQUIREMENTS (40 CFR 112.7(H)(I)(K))

The following requirements of 40 CFR 112.7 do not apply to FAI for the listed reasons:

- Tank car and truck loading/unloading racks
- FAI does not contain this equipment.
- Brittle fracture evaluation
- All tanks are shop-built tanks and are therefore exempt from this evaluation
- Qualified oil-filled operational equipment.
- FAI does not contain oil-filled equipment.

3.8 CONFORMANCE WITH STATE AND LOCAL REQUIREMENTS

FAI also complies with ADEC's Spill Prevention Preparedness and Response Division requirements. Regulations in 18 AAC 75 dealing with Class 2 facility AST registration has been repealed effective October 18, 2023. ASTs at Class 2 Facilities will no longer be required to be registered with ADEC and Class 2 Facilities will be exempt from ADEC oversight.

4.0 DISCHARGE PREVENTION – NON-PRODUCTION ONSHORE FACILITIES

This section of the SPCC Plan specifically addresses the FAI is an onshore facility not directly involved in the production of oil, and subject to spill prevention requirements of 40 CFR 112.8 for onshore facilities (excluding production facilities). The SPCC regulation has specific requirements regarding facility drainage, standards for bulk oil storage containers, provision of secondary containment size, and facility transfer operations under 40 CFR 112.8. **Drawings C-02 through C-05** show the general drainage area boundaries and more detailed views of drainage areas where oil storage containers are located. **Drawing C-02** shows the generalized layout of the storm water system.

4.1 FACILITY DRAINAGE (40 CFR 112.7(A)(3)(III), 112.8(B))

FAI is developed with large, paved areas, surface drainage (ditches and culverts), and a storm water system. The FAI facility is split into 11 drainage basins, but only three have SPCC-regulated containers sited within their boundaries (Drainage Areas 1, 3, and 9). Storm water discharges from most bulk storage containers that escape secondary containment discharge to the storm water system through catch basins or to surface drainage. **Sections 4.1.1 through 4.1.11** discuss Drainage Areas. **Drawing C-02** identifies the location of the storm water system piping and discharge locations associated with storm water outfalls.

4.1.1 DRAINAGE AREA 1 (SOUTHWEST WETLANDS)

Drainage Area 1 includes the AMF, Buildings 44, 47, 48, 50, and the Regulator Building. This area mostly consists of a gravel surface that is generally flat which helps prevent the rapid spread of fluids. Runoff from this area collects in ditches and swales south of Drainage Area 1. These areas are paved or gravel surfaces. Runoff from this area is collected by drop inlets and ditches and discharges to the South Pond located between the runways of the South Terminal Pond located north of the terminal building.

Spills resulting from oil storage in Drainage Area 1 would be collected by the storm water system and discharged to the South Pond or South Terminal Pond depending on the location of the spill. Valves or OWS are not installed in the storm water system to prevent spilled oil in Drainage Area 1 from reaching the South Pond. The South Pond and South Terminal Pond are located on the FAI facility and function as a diversion system to prevent an uncontrolled discharge of oil from leaving the facility in accordance with 40 CFR 112.8(b)(4).

Spills resulting from oil storage in the remainder of Drainage Area 1 would infiltrate into unpaved areas on the facility or enter the storm water system and be conveyed through drop inlets and ditches discharging to the South Pond of South Terminal Pond. Drainage Area 1 is shown on **Drawing C-03**.

4.1.2 DRAINAGE AREA 2

No regulated containers are installed in this drainage area.

4.1.3 DRAINAGE AREA 3 (SOUTH TERMINAL POND)

Drainage Area 3 includes the main terminal, ARC Building, dump and incinerator buildings, Hydrant Building, Sand Storage Building, and Environmental Building. These areas are paved or gravel surfaces. Runoff from this area is collected by drop inlets and ditches and discharges to the South Terminal Pond located in front of the terminal building.

Spills resulting from oil storage in the main terminal parking lot would be collected by the storm water system and discharge to the South Terminal Pond. Valves or OWS are not installed in the storm water system to prevent spilled oil in Drainage Area 3 from reaching the South Terminal Pond. The South Terminal Pond is located on the FAI facility and functions as a diversion system to prevent an uncontrolled discharge of oil from leaving the facility in accordance with 40 CFR 112.8(b)(4).

Spills resulting from oil storage in the remainder of Drainage Area 3 would infiltrate into unpaved areas on the facility or enter the storm water system and be conveyed through drop inlets and ditches discharging to the South Terminal Pond. Drainage Area 3 is shown on **Drawing C-04**.

4.1.4 DRAINAGE AREA 4

No regulated containers are installed in this drainage area.

4.1.5 DRAINAGE AREA 5

No regulated containers are installed in this drainage area.

4.1.6 DRAINAGE AREA 6

No regulated containers are installed in this drainage area.

4.1.7 DRAINAGE AREA 7

No regulated containers are installed in this drainage area.

4.1.8 DRAINAGE AREA 8

No regulated containers are installed in this drainage area.

4.1.9 DRAINAGE AREA 9 (EAST WETLANDS)

Drainage Area 9 includes the FAA Base Building. Storm water from this area enters drop inlets and is transmitted through open ditches and culverts along University Avenue South. Storm water may discharge to the wetlands east of the road at two points when the water levels are high. It is assumed that most snowmelt and storm water infiltrates into the ground. Spills resulting from oil storage in this area would follow the same routing as storm water and be contained within the facility ditches. Drainage Area 9 is shown on **Drawing C-05**.

4.1.10 DRAINAGE AREA 10

No regulated containers are installed in this drainage area.

4.1.11 DRAINAGE AREA 11

No regulated containers are installed in this drainage area.

4.2 DEICING BASINS

FAI has two dedicated aircraft deicing basins, North and South Basins, used to contain deicer-laden snow and snowmelt during the spring to prevent direct discharge to surface waterbodies. The North Basin is located in Drainage Area 4 at the north end of the main runway and the South Basin is located at the south end of the main runway. FAI has another deicing

basin, the Heavy Aircraft deicing basin, only used in case of an emergency. In the spring, FAI discharges deicer-laden snowmelt from each basin to the Golden Heart Utilities Regional Wastewater Treatment Plant (GHRWTP), or it is directed to vegetated swales for infiltration. An OWS is located at each deicing basin to provide treatment of water prior to discharge to sanitary sewer. During non-freezing conditions (i.e., spring/summer), valves are opened to allow storm water to discharge directly to the environment. Prior to snowfall, the basin valves are closed. FAI maintains and operates these basins year-round and coordinates approval to discharge to the local wastewater treatment plant. Oil contained inside the OWS is removed as needed (but at least annually) by vacuum truck and properly disposed.

4.3 DIKED AREAS (40 CFR 112.8(C)(3))

No diked areas are located at FAI.

4.4 BULK STORAGE CONTAINERS (40 CFR 112.8(C))

The Container List in **Appendix B** summarizes the construction, volume, content, secondary containment, and overfill and discharge controls of bulk storage containers at FAI.

4.4.1 CONSTRUCTION (40 CFR 112.8(C)(1))

FAI-owned oil containers are constructed of steel, in accordance with industry specifications. The design and construction of associated piping is compatible with the characteristics of the oil product they contain and with temperature and pressure conditions.

Conventional corrosion protection methods include paint and other coatings. Corrosion protection for the facility's exterior, aboveground storage, and distribution elements is achieved by painting exposed metal surfaces and minimizing contact with ground surface.

4.4.2 SECONDARY CONTAINMENT (40 CFR 112.8 (C)(2))

Properly sized impermeable secondary containment is provided for oil storage containers greater than 55 gallons. To ensure the containment is free of cracks, holes or debris that may inhibit containment capabilities, monthly visual inspections are scheduled.

4.4.3 COMPLETELY BURIED METALLIC STORAGE TANKS (40 CFR 112.8(C)(4))

The one active UST at FAI stores heating oil (UST 11A). This UST is STI P3 coated, double-walled, and includes cathodic protection. Cathodic protection systems are to be regularly tested by an ADEC Certified UST Inspector.

A 5,000-gallon UST (UST 19) at the Environmental Building serves as secondary containment for the building. It is unknown whether the container is protected from corrosion through coating or cathodic protection. This tank requires regular leak testing to ensure its integrity is maintained, which is noted as a compliance item in **Table 1-1**.

The underground storage tank at the FAA Base Building (UST FAA) is empty and out-of-service and has been permanently closed.

4.4.4 OVERFILL PROTECTION SYSTEMS (40 CFR 112.8(C)(8))

40 CFR 112.8(c) requires container installations be engineered or updated in accordance with good engineering practice to avoid discharges. At least one of the following devices must be provided per container:

- High-level liquid alarms with audible or visual signal at constantly attended operation (requires regular tests to ensure proper operation)
- High-level liquid pump cutoff system (requires regular tests to ensure proper operation)
- Direct audible or code signal communication systems
- Fast response system for liquid level determination (requires regular tests to ensure proper operation)

The ASTs have sufficient overfill prevention systems as noted in Appendix B. Environmental protection for overfills is also provided by at least one of the following:

- Determination of product quantity prior to the transfer
- Continuous observation of product transfer

4.4.5 EFFLUENT TREATMENT FACILITY (40 CFR 112.8(C)(9))

Floor drains within AMF and ARC buildings are connected to in-floor drains and an OWS, which is connected to the sanitary sewer. Floor drains and OWS are observed frequently for levels of accumulated liquids and oil. The OWS at the AMF has a total capacity of 200 gallons and an oil reservoir capacity of 100 gallons. The AMF stores up to 660 gallons of oil in 55-gallon drums and up to 100 gallons of oil in AST 30, which has self-diked construction as secondary containment. The ARC building has two OWS: one connected to the wash bay floor drains and the other connected to the field maintenance shop and ARFF shop floor drains. The two OWS at the ARC each have an oil reservoir capacity of 53 gallons. The ARC stores up to 1,320 gallons of oil in 55-gallon drums and up to 800 gallons of oil in AST 15, AST 16, and Unit 212 (mobile refueler).

The three OWS are equipped with a high-level sensor for the oil reservoir that activates an audible alarm. The OWS are inspected periodically to ensure proper operation of equipment. Accumulated oil the OWS is removed and properly disposed in accordance with **Section 5.6**. FAI maintenance personnel maintain OWS treatment and disposal records as part of their monthly inspections. These records will be maintained in accordance with customary and regular business practices.

4.4.6 VISIBLE DISCHARGES (40 CFR 112.8(C)(10))

If a visible discharge is observed which results in loss of oil from seams, gaskets, piping, pumps, valves, rivets and bolts, FAI personnel will promptly correct the problem and safely remove the oil from the secondary containment area as soon as possible. Fluids are regularly removed from secondary containment (**Section 4.4.2**) and disposed of according to the waste disposal method described in **Section 5.6** of this SPCC Plan.

4.4.7 MOBILE AND PORTABLE CONTAINERS (40 CFR 112.8(C)(11))

Mobile and portable containers that are stationary, unattended, and not under the direct oversight or control of facility personnel are positioned inside buildings so as not to be subject to precipitation. Secondary containment is provided by spill pallets or concrete floors with drains connected to OWS.

Active portable containers (e.g., during product transfers, container transport, or preparation for activities involving the container) are not always provided with secondary containment. However, general containment procedures as described in **Section 3.0** are applied to active portable containers.

4.4.8 NON-APPLICABLE REQUIREMENTS (40 CFR 112.8(C)(5), 112.8(C)(7))

The following elements related to bulk storage containers do not exist at the FAI facility:

- Partially buried metallic bulk storage tanks
- Internal heating coils

4.5 TRANSFER OPERATIONS, PUMPING, AND IN-PLANT PROCESSES (40 CFR 112.8(D))

Existing underground piping systems installed prior to August 16, 2002, do not require modification to meet SPCC protective wrapping and/or cathodic protection and/or fully enclosed secondary containment according to 40 CFR 112.8(d)(1). If sections of such buried piping are exposed, they must be inspected and repaired or replaced, as necessary, to meet corrosion protection requirements specified under this section. If corrosion damage is found, additional examination and corrective action shall occur based on the magnitude of the damage. If a portion of the existing buried piping is repaired or replaced, these sections must be modified to include corrosion protection in accordance with SPCC specific methods or alternatives designed by a corrosion professional.

Above-grade pipe supports were designed by a registered engineer and appear adequate. No special site access restrictions appear necessary to warn site vehicular traffic of above-grade or underground pipeline conflicts in normally trafficked areas. Additionally, ASTs and piping are protected by bollards and/or concrete barriers where the potential for collision is high.

Aboveground valves, piping, and appurtenances will be regularly inspected. During the inspection the general condition of items, such as flange joints, expansion joints, valve glands and bodies, catch pans, pipeline supports, locking of valves, and metal surfaces shall be assessed. The integrity and leak testing of buried piping shall occur at the time of installation, modification, construction, relocation, or replacement. For the smaller diameter fuel oil supply and return lines observed at these sites, integrity testing must include the above listed visual inspection and pressure testing in accordance with current mechanical building and fire codes.

Underground SPCC-regulated (as well as UST-regulated) product lines are double-walled with corrosion-resistant secondary containment.

5.0 DISCHARGE RESPONSE

This SPCC Plan provides information to ensure prompt notification, response, proper cleanup, and disposal for a potential oil spill at FAI. Airport employees who handle oil, or who may discover or respond to a spill, are provided refresher training annually. Airport Safety Officers, Hazardous Materials Officers, and several Field Maintenance and Operations personnel are trained in hazardous materials spill response. Airport Safety Officers are also certified firefighters. FAI personnel receive OSHA-required Hazard Communication Training and are made aware that, after personal safety, protection of waters of the U.S. is a priority during a spill response.

Uncontrolled discharge of oil to waters of the U.S., in addition to contamination of land and groundwater by oil, is prohibited by state and federal laws/regulations. Immediate action must be taken to control, contain, and recover discharged product. This section discusses the basic response and cleanup procedures in the event of an oil spill at FAI facilities.

A Substantial Harm Determination was completed for FAI and is included in **Appendix A**. It was determined that a Facility Response Plan (FRP) is not required.

5.1 POTENTIAL DISCHARGE AND FLOW DIRECTION (40 CFR 112.7(B))

Three of the 11 drainage areas have FAI-operated SPCC-regulated storage containers as discussed in **Sections 4.1.1 4.1.3, and 4.1.9**. **Table 5-1** presents expected volume, discharge rate, and general direction of flow for oil spills that may occur from equipment that has a reasonable potential for failure and means for containment for the most likely failures that could result in an oil spill. Only typical failure modes and the most likely quantity of oil to be discharged have been addressed. Spill volumes associated with a catastrophic event such as an earthquake or major fire are of much larger magnitudes than that of a single tank rupture but have a much lower probability of occurring. The largest potential spill due to such an event would involve the destruction of all oil-filled containers at the site. However, with properly designed, constructed, maintained secondary containment, and trained personnel, the potential for a spill event is minimized.

5.1.1 BUILDING DRAINAGE

Several buildings managed by FAI contain SPCC regulated containers as listed in **Appendix B** and have measures to manage potential discharges.

Drainage inside the AMF building, Sand Storage building, and ARC building is sloped towards floor drains connected to OWS prior to discharge to the GHRWTP. The ARC building has two OWS: one connected to the wash bay floor drains and the other connected to the field maintenance shop and ARFF shop floor drains. The four OWS are inspected at least quarterly for accumulation of oils. Oils contained inside the OWS are removed as needed (but at least annually) by vacuum truck and properly disposed. Maintenance of the OWS is recorded on a nearby log sheet.

Drainage inside the Environmental Building is sloped toward one floor drain connected to a 5,000-gallon UST (UST 19). No part of this system is exposed to precipitation, and the UST contains a sump and is designed to be emptied by vacuum truck. The UST/sump is inspected monthly for the accumulation of liquids. Leaks or spills caught in the underground sump are removed as necessary and properly disposed. At no time are the contents of the sump system discharged to the environment. In addition, a leak test is performed annually to ensure the integrity of the sump.

Table 5-1: Potential Oil Spill Considerations

| Potential Oil Spill | Location | Direction of Flow | Rate of Flow | Total Quantity (gallons) | Response Procedures |
|---------------------|--|--|--------------|---|---|
| Tank leak | AST 1, AST 30, AST 8a, AST ARC, AST 9a, AST 3a, AST 15, AST 16, TBD 2, and AST FAA | Within secondary containment (i.e., double-wall tank, self-diked tank, or inside building equipped with an OWS). | 2 | Total tank capacity (100, 275, 1,000, 1,200, 2,000, 2,500 or 5,000) | Transfer tank contents from containment to spill response tank, mobile refueler, or vacuum truck. Close and lock all valves until tank is repaired or replaced. |
| Bulk fuel offload | AST 3a, AST 9a, and AST FAA | Depending on the tank, a release would spread (with partial containment by snow during winter months) towards drainage ditch at the facility located approximately 100 feet south from tanks 3a and 9a, and 150 feet east from tank FAA. | 20 | 100 | Bulk fuel transfers are monitored by the fuel delivery contractor, and response to an oil discharge would be rapid. Tanks are equipped with an overfill catchment basin with capacity of approximately 5 gallons. |
| Bulk fuel offload | AST 1 and AST 8a | Depending on the tank and location of release, potential release spreads with partial containment by gravel/vegetation or snow north from tanks | 20 | 100 | Bulk fuel transfers are monitored by the fuel delivery contractor, and response to an oil discharge would be rapid. Tanks are equipped with an overfill catchment basin with capacity of approximately 5 gallons. |
| Piping failure | Fuel lines between tanks and buildings/equipment | Same as for bulk fuel offloading (see above) | 40 | 1,000 | Personnel would detect during routine operations or inspections and would close valves to isolate failure area. Absorbents, booms, and diversion trenches will be employed as needed. |

5.2 SPILL DISCOVERY (40 CFR 112.7(A)(3)(IV), 112.8(C)(10))

A spill at FAI will most likely be discovered during routine visual inspections by FAI personnel. The planned response will depend on spill severity and initial responders will be on-site personnel. Additional personnel will be contacted by FAI Communication Center as needed. **Appendix E** contains a list of emergency contacts for spill response at FAI.

Monthly and annual tank inspection assessment checklists, discussed in **Section 3.4**, are designed to identify leaks and spills. Tanks and respective containment are visually monitored for leaks/discharges by personnel during product transfer and monthly inspection. Piping and outside areas are observed during inspections for leaks, spills, and discoloration or staining.

5.3 RESPONSE TO A SPILL (40 CFR 112.7(A)(3)(IV), 112.7(A)(5))

This SPCC Plan provides information for prompt notification and response, and proper cleanup and disposal for a potential oil spill at FAI. Since spill response must begin immediately after a spill is discovered, it is important that FAI employees who may discover a spill are familiar with this SPCC Plan prior to responding to a spill. Small spills can typically be handled by on-site personnel or the fuel contractor.

The FAI maintains emergency response equipment and materials sufficient to address a spill at the facility. This equipment is located around the airport property to address spills including but not limited to the ARC fuel station, near the fire training area, and inside the Environmental Building, ARC building, FAA building and AMF building. FAI also maintains a Spill Response Trailer in the ARC Building stocked with a variety of spill containment and cleanup equipment.

The following FAI communication systems can be utilized in the event of an emergency:

- Telephones and cell phones.
- 800 MHZ radio system: FAI has mobile radio units in FAI-operated vehicles. The radios can be used to contact response personnel working in the field at the time of a release and to direct on-site response activities.
- Communication Center: FAI Communication Center will act as the Command Center in the event of an emergency and will maintain open communication lines.

A "minor" discharge is defined as one that poses no significant harm or threat to human health and safety or to the environment. Minor spills can usually be cleaned up by FAI personnel. Spill notifications will be made as discussed in **Section 5.4** of this SPCC Plan. Minor discharges are generally those where:

- The quantity of product discharged is less than 10 gallons of oil and does not reach water,
- Discharged material is easily stopped and controlled at the time of the discharge,
- Discharge is localized near the source,
- Discharged material is not likely to reach water,
- There is little risk to human health or safety,
- There is little risk of fire or explosion.

A "major" discharge is defined as one that cannot be safely controlled or cleaned up by facility personnel. The Dispatch Center will obtain support for managing the spill. A major discharge is defined as follows:

- The discharge is large enough to spread beyond the immediate discharge area
- The discharge material enters a body of water
- The discharge requires special equipment or training to clean up
- The discharged material poses a hazard to human health or safety
- There is a danger of fire or explosion

The following are the initial response efforts that should be followed when an oil spill is discovered and can be applied to a hazardous material spill. These initial response efforts will be implemented upon discovery.

SPILL RESPONSE ACTIONS

- 1) Protect Yourself and the Public
 - a) Human health and safety always takes the highest priority
 - b) Be aware of electrical hazards. Make the scene electrically safe.
 - c) Determine exposure routes from chemical/oil (inhalation, absorption, ingestion, etc.)
 - d) Wear/use proper protective gear (gloves, boot covers, eye protection, etc.)
 - e) Be prepared in case of fire.
- 2) Stop Ignition Sources and Flow of Product
 - a) If possible, stop the spill at the source
 - b) Shut off all drains and valves
 - c) Turn off sources of ignition
 - d) Shut down pumps and machinery
 - e) Determine if spill can possibly enter sewers or drains, or spread toward ditches/culverts or a water body
- 3) Notifications: Alarm or Operator-Triggered
 - a) All spills: Notify your supervisor and FAI Communications Center
 - i) Telephone #: 907-474-2530
 - ii) Radio Ops Channel (155.9250 MHz)
 - b) Provide the following information:
 - i) Location and source of spill
 - ii) Estimated volume and area impacted by oil spill
 - iii) Date and time of spill discovery
 - iv) If oil is flowing off-site
 - v) Impacts to personnel
 - vi) Cause of spill (if known)
 - vii) Information on immediate response
 - c) Notifications to state and federal agencies will be made as discussed in Section 1.1 of this SPCC Plan.
- 4) Secure the Area
 - a) Barricade the spill area from vehicle access to minimize the spread of oil.
 - b) If spill has spread off-site, barricade the spill area from public access.
 - c) Limit entry to the spill area to authorized personnel wearing appropriate protective gear.
 - d) If raining, cover spill to prevent spreading (if possible).
 - e) If a spill is inside a building, provide ventilation. Open doors, turn on ventilation system, etc.
 - f) Post warning signs as appropriate.
- 5) Control and Contain the Spill
 - a) General:
 - i) Use buckets or drums to catch oil that is leaking or spilling from equipment, even if a secondary containment basin is present.

- ii) For relatively small spills, apply an absorbent to the surface of the oil and reapply until there is enough to absorb all liquid.
 - iii) Use booms, soil, snow, or other absorbent material to intercept or divert flow.
 - iv) Pads, pillows, and/or loose sorbent materials should be placed on top of the spilled materials, while a sorbent or containment material/boom should be placed so that it encircles the spilled material or blocks the flow of the spill.
- b) To Water:
- i) Divert spill away from drains and/or waterways. If the discharge has reached or is likely to reach a waterway, call for the assistance and deploy booms or underflow dams.
 - ii) Where applicable, prevent discharge into storm drains by sealing off with an impenetrable material, such as a rubber mat and/or dikes.
- c) To Soil or Secondary Containment:
- i) If a secondary containment basin is present and the spill is overshooting the basin boundaries, deflect the oil so that it will accumulate within the basin.
 - ii) Prevent spills from migrating off the immediate area by constructing dikes or ditches around the spill, and/or berming the area with soils or snow at the leading edge of flow.
 - iii) If rainfall is occurring, divert runoff from the containment area.

5.4 SPILL NOTIFICATION (40 CFR 112.7(A)(3)(VI), 112.7(A)(4))

After discovering a spill and performing the immediate actions listed above, proceed with notifications according to the FAI reporting procedures as soon as possible. The FAI employee discovering the spill will notify the FAI Communications Center. The FAI Communications Center (located in the ARC building shown on **Drawing C-04**) is responsible for contacting the emergency spill response-trained maintenance personnel, FAI Airport Police and Fire (APF) (located in the ARC building shown on **Drawing C-04**), Environmental Manager, and/or third-party contractors as required. The Environmental Manager will ensure documentation of the spill and report to the pertinent regulatory agencies. Both local responders and the State Emergency Response Commission will be contacted regarding the spill, if required.

5.4.1 ALASKA DEPARTMENT OF ENVIRONMENTAL CONSERVATION (ADEC)

Notification of ADEC fulfills all state agency notification requirements per 18 AAC 75.300. If the notification and reporting matrix indicates that a notification must be made immediately, the notification will be made within 30 minutes of spill discovery and should be made by telephone. For notifications required within 48 hours, the notification may be made by telephone, or the ADEC spill notification form located in **Appendix E** may be used to fax the necessary information.

Submittal of an Oil and Hazardous Materials Incident Final Report is required by State regulation 18 AAC 75.300(e). This report is due within 15 days of cleanup completion, or within 15 days of discharge if no cleanup occurs. The FAI Environmental Manager will ensure the incident report is submitted to ADEC.

Spills of 1 to 10 gallons to land must be recorded in a spill log (**Appendix E**). This log is provided to ADEC monthly.

5.4.2 NATIONAL RESPONSE CENTER (NRC)

The NRC must be notified for any spill discharged in quantities that may be harmful, as described in 40 CFR 110, into or upon the navigable waters of the U.S. or adjoining shorelines, or when spills exceed a Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (CERCLA) reportable quantity. An oil sheen on navigable waters would require NRC notification. Notification of the NRC fulfills all federal notification requirements. The following data must also be collected and relayed to the NRC:

- Spill details (material and volume)
- Location of spill (latitude and longitude)
- Safety issues (evacuations and injuries)
- Description of all affected media
- Cause of spill
- Actions to mitigate effects of discharge
- Description of evacuations
- A list of agencies notified

5.4.3 ENVIRONMENTAL PROTECTION AGENCY (40 CFR 112.4(A))

Should a facility have one spill event of more than 1,000 gallons, or two spill events of 42 or more gallons each within any 12-month period, the FAI Divisions Operations Manager will notify the EPA RA of the following within 60 days of the occurrence, as required by 40 CFR, Section 112.4 (a):

- Name and location of the facility, and contact name, telephone number and email,
- Description of the facility, including maps, flow diagrams, and topographical maps as necessary,
- Maximum storage or handling capacity of the facility and normal daily throughput,
- The cause of the spill, including failure analysis of the system or subsystem in which the failure occurred,
- Corrective action and countermeasures taken, including a description of equipment repairs and replacements,
- Additional preventive measures taken or contemplated to minimize the possibility of recurrence,
- Such other information as the EPA RA may reasonably require pertinent to the SPCC Plan or the spill event.
- This information will be submitted to EPA Region 10 and the Alaska EPA offices by the Environmental Manager.

5.5 SPILL CONTAINMENT AND CLEANUP

After the initial response procedures have been completed, trained FAI personnel will start cleanup efforts as soon as possible to limit the environmental impact of the release, following applicable regulations. Cleanup efforts will restore the affected area to its pre-spill condition to the maximum extent possible. If additional assistance is needed beyond FAI personnel capabilities for cleanup, the Environmental Office shall be contacted and will make arrangements with additional qualified contractors to assist in the spill cleanup.

5.5.1 MINOR LEAKS AND SPILLS

Minor releases are defined as small releases that are contained within secondary containment and will not pose a threat to navigable waters of the U.S. at FAI. Slow leaks and spills should be detected during routine operations or inspections and

corrected. Due to the expected quick response of FAI employees and the secondary containment system, it is unlikely that a discharge of oil will reach navigable waters.

Minor releases at FAI-owned and operated bulk storage containers may come into direct contact with flooring, soil, or pavement at several FAI locations during fuel or oil transfer. If a spill is found, employees will repair the leak immediately, if possible. However, if major repairs are required to stop the oil from leaking, the oil may continue to leak into secondary containment or temporary containment until the leak can be repaired. Specific spill response requirements are in **Section 5.3**.

5.5.2 OIL SPILLS TO CONTAINMENT AREAS

Large oil spills within a secondary containment dike may be removed via drainpipe, pumping or vacuum truck. A portable pump will be used to pump the oil into drums or portable tanks, or a vacuum truck will be used, depending upon the quantity released. The secondary containment will be visually inspected for leaks. If the containment is damaged, it will be repaired. If the containment is damaged, it will be repaired; however, employees must inspect containment and remove accumulated oil regularly to ensure there is no overtopping. Specific spill response requirements are in **Section 5.3**. Pumps are inspected on a regular basis to ensure proper performance, and to discover and mitigate leaks.

5.5.3 OIL SPILLS OUTSIDE OF CONTAINMENT AREAS

Oil spilled outside of containment will be cleaned up as soon as possible to prevent the spreading of the contamination. Contaminated gravel, soil or snow will be removed and managed per applicable requirements. Samples will be submitted to a certified laboratory for analysis, if required. Spills affecting groundwater will be investigated, monitored, and managed by a contractor approved and coordinated by FAI in consultation with the pertinent regulatory entities.

5.5.4 TRANSPORTATION-RELATED SPILLS

Fuel spills that occur during delivery from a fuel supply vendor are the responsibility of the vendor, though FAI will assist with the cleanup as necessary. The vendor is responsible for complying with all local, State and Federal transportation and fuel spill response regulations. FAI requires the vendor to implement their own spill response plan and maintain pollution liability insurance.

5.6 WASTE DISPOSAL (40 CFR 112.7(A)(3)(V))

Materials used to clean up spills shall be disposed of in accordance with applicable local, State and Federal regulatory requirements. Minor releases are typically contained on absorbents that are thermally destroyed at third-party permitted facilities. Moderate releases of free product are typically recovered by FAI or third-party vacuum trucks and disposed of in accordance with applicable regulations. Catastrophic releases of free product will be recovered by FAI and third-party personnel using necessary means. Recovered usable product will be re-entered into the system, if possible. Used materials will be disposed of in accordance with applicable regulations.

5.7 CLEANUP CONTRACTORS AND EQUIPMENT SUPPLIERS

Waste resulting from a major discharge response will be removed and disposed of by a cleanup contractor or equipment supplier. Information on local companies, including contact information is included in **Appendix E**.

6.0 REFERENCES

- ADEC. (2023a). *18 AAC 75: Oil and Other Hazardous Substances Pollution Control*. 5 February 2023.
- ADEC. (2023b). *Report a Spill*. Retrieved November 14, 2023, from <https://dec.alaska.gov/spar/ppr/spill-information/reporting/>
- EPA. (2021). *40 CFR Part 112: Oil Pollution Prevention*. 1 July 2021.
- EPA. (2023). *40 CFR Part 110: Discharge of Oil*. 12 June 2023.
- NFPA. (2023). *NFPA 30: Flammable and Combustible Liquids Code*. 2023.
- NOAA. (2023). *National Weather Service*. Retrieved November 14, 2023, from <http://hdsc.nws.noaa.gov>
- Steel Tank Institute. (2009). *Recommended Practice R912: Installation Instructions for Shop Fabricated Stationary Aboveground Storage Tanks for Flammable, Combustible Liquids*. 1 June 2009.
- Steel Tank Institute. (2018). *Standard SPO01: Standard for Inspection of Aboveground Storage Tanks*. January 2018.
- United States Code. (2018). *U.S.C, Title 33, 1251 et seq, Clean Water Act*. 4 December 2018.
- WRCC. (2023). *Western U.S. Climate Summaries*. Retrieved November 14, 2023, from <https://wrcc.dri.edu/Climate/summaries.php>

Appendix A – Modifications, Review, and Substantial Harm Criteria Forms

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| SPCC Plan Modifications Form | A-01 |
| Review and Revisions Log | A-02 |
| Certification of the Applicability of the Substantial Harm Criteria | A-03 |

Appendix B – Container List

Appendix C – Drawings

Vicinity Map.....C-01

Drainage Area Map.....C-02

Drainage Area 1 – Container Locations.....C-03

Drainage Area 3 – Container Locations.....C-04

Drainage Area 9 – Container LocationsC-05

Appendix D – Checklists

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|--|------|
| Monthly Integrity Inspection Checklist (Stationary Aboveground Bulk Oil Storage Containers)..... | D-01 |
| Monthly Integrity Inspection Checklist (Portable Oil Storage Containers)..... | D-02 |
| Annual Integrity Inspection Checklist (Stationary Bulk Oil Storage Containers)..... | D-03 |

Appendix E – Emergency and Spill Response Information

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|--|------|
| Emergency Notification and Contact Numbers | E-01 |
| Agency Contact Information..... | E-02 |
| List of Alaska Spill Cleanup Contractors..... | E-03 |
| Environmental Spill Notification Flow Chart..... | E-04 |
| Spill Notification and Reporting Matrix..... | E-05 |
| ADEC Monthly Spill Log..... | E-06 |
| ADEC Oil and Hazardous Substances Spill Notification Form..... | E-07 |
| ADEC Spill Reporting Placard..... | E-08 |