

Chapter Organization

Subchapter 1	Program Scope and Installation Requirements for Partially Excluded UST Systems
Subchapter 2	UST Systems: Design, Construction, Installation, and Notification
Subchapter 3	General Operating Requirements
Subchapter 4	Release Detection
Subchapter 5	Release Reporting, Investigation, and Confirmation
Subchapter 6	Release Response Action
Subchapter 7	Out-of-Service UST Systems and Closure
Subchapter 8	Financial Responsibility
Subchapter 9	Lender Liability
Subchapter 10	Operator Training
Subchapter 11	UST Systems with Field-Constructed Tanks and Airport Hydrant Fuel Distribution Systems
Subchapter 12	Permits and Variances
Subchapter 13	Enforcement

Major Changes

New requirement	Reference in proposed regs
Monthly and annual walkthrough inspections	§36
Sump and under dispenser containment testing once every three years	§35(a)(2)
Annual inspection of overfill prevention equipment	§35(a)(3)
Before return to use following repair to spill or overfill prevention equipment, the repaired equipment must be tested or inspected	§33(a)(8)
Phase out of ball floats for overfill protection	§20(f)(3)
Required notification before change to storing a regulated substance containing >10% ethanol or >20% biodiesel; documentation of compatibility	§32(b) and (c)
Metal pipe sections and fittings that have released product as a result of corrosion or other damage must be replaced, not repaired	§33(a)(3)
In three years, release detection for UST systems installed before August 9, 2013 that store fuel solely for use by emergency power generators	§10(a)(1)(B)
Earlier reporting of initial abatement steps (20 days), initial site characterization (45 days), and free product removal (45 days)	§§62(b), 63(b), 64(a)(4)
Tanks temporarily closed for one year must be permanently closed, unless the department grants an extension; a site assessment is required for an extension request	§70(c)

Training programs for Class A and Class B Operators must include reporting, recordkeeping, testing, inspections, and environmental and regulatory consequences of releases	§242
Re-training timeline for Class A and Class B Operators of UST system determined to be out of compliance reduced to 30 days (from 90 days)	§244(c)
Additional regulation of airport hydrant systems and UST systems with field constructed tanks	subchapter 11
In ten years, secondary containment for tanks installed prior to August 9, 2013	§20(b)(2)
Other changes	Reference in proposed regs
Technical specifications added to requirements for automatic tank gauging (ATG) and interstitial monitoring when each is being used to meet release detection requirements	§43(4) and (7)
Statistical inventory reconciliation (SIR) allowed; technical specifications added to requirements for SIR being used to meet release detection requirements	§43(8)
More specific information about release detection recordkeeping	§45
Clarification of certain conditions under which a suspected release may be resolved within 24 hours and not require notification and further investigation	§50
Update to site cleanup criteria: Default Tier 1 Screening Levels table	§65.3(e)
Changes to permit fees	§335
Allowing out of state trustees (financial institutions) regulated by state authority	§§102, 103
Adding subchapter 9 Lender Liability	subchapter 9

Frequently Asked Questions

GENERAL

Question: Why are the UST regulations being updated again?

Answer: The Hawaii Administrative Rules (HAR) must be updated to be at least as stringent as the federal rules, which were revised in 2015, and some state-specific changes are also being proposed. The new federal rules improve environmental protection by increasing emphasis on properly operating and maintaining equipment. The lack of proper operation and maintenance of UST systems has been found to be one of the main causes of release of regulated substances to the environment. New requirements such as regular release detection equipment testing, walkthrough inspections, and proper operation and maintenance are key for preventing and quickly identifying releases.

Question: The regulations look different. How and why have they been reorganized?

Answer: The new chapter number is 280.1. The chapter has been reorganized to conform more closely with the organization of the federal rules it is modeled after (Title 40 Code of Federal Regulations [CFR] Part 280). This means that some material that is the same or similar in the 2013 Hawaii Administrative Rules (HAR) is found in a different part of the proposed chapter. For example, operator training is moved from subchapter 4 to subchapter 10.

The section numbers in subchapters 1 to 11 mostly correspond with the section numbers in 40 CFR part 280 subparts A to K. When sections do not correspond closely, a different section number has been used.

Subchapters 9 and 11 contain new material based on the federal rules. Codes of practice, based on the federal rules, are included in a separate section at the end of each applicable subchapter.

Question: What happened to the forms that use to be in the Appendices? Are the forms being updated?

Answer: The forms have been removed from the appendices to allow the department to update the forms as needed without going through the Hawaii Administrative Rules rulemaking process. The forms will be updated at the time the new regulations become effective and will be posted on the UST program website. Future updates to the forms will also be posted to the website.

Question: Are there new definitions in the proposed rules?

Answer: Yes, the following definitions in §10 are new:

- Airport hydrant fuel distribution system or airport hydrant system
- Belowground release
- Class A operator, Class B operator, Class C operator
- Connected piping

- Containment sump
- Dispenser system
- EPA
- Field-constructed tank
- Hazardous substance
- Hazardous substance UST system
- Noncommercial purposes
- On the premises where stored
- Temporary closure or temporarily closed
- Under-dispenser containment or UDC
- Underground release
- Upgrade

APPLICABILITY

Question: Are there any exemptions to the proposed regulations, or are all USTs covered?

Answer: There are many different reasons a tank could be excluded from regulation. There have been some changes to applicability. See §10 (Applicability) and the definition “Underground Storage Tank” in §12 (Definitions).

Question: Is my facility a regulated airport hydrant system (AHS)?

Answer: There are several factors in this determination. If the system meets the definition of an airport hydrant fuel distribution system in §250 and ten percent or more of the system volume is underground (including piping), it may be a regulated AHS. Because of the large piping volumes used in this type of system, an AHS may be a regulated UST system even if all storage tanks are above ground tanks. For additional information, see: <https://www.epa.gov/ust/underground-storage-tank-ust-technical-compendium-about-2015-ust-regulations#ahs>

Question: How are field constructed tanks and airport hydrant systems regulated?

Answer: Although most of the regulations in the proposed chapter 11-280.1 will apply to field constructed tanks and airport hydrant systems, there are variations in effective dates and certain technical requirements, such as release detection methods for tanks larger than 50,000 gallons. The requirements for field constructed tanks and airport hydrant systems are in subchapter 11, corresponding to subpart K in the federal regulations. The questions and answers below pertain to all tanks except subchapter 11 tanks, unless specifically noted. See the section below titled "Airport hydrant systems and field constructed tanks".

EFFECTIVE DATES

Question: When is the effective date of the new requirement to perform monthly walkthrough inspections?

Answer: The effective date of this requirement will be the effective date of the new regulations for all tanks. Since the requirement is to inspect every thirty days, the first walkthrough inspection must be completed by thirty days after the effective date of the new regulations. The first annual walkthrough inspection must be completed by one year after the effective date of the new rules.

Question: How often do the proposed rules require integrity testing of spill and overfill equipment and sumps used for interstitial monitoring? When does this requirement become effective?

Answer: Spill and overfill equipment must be integrity tested annually, and this requirement is already in effect. The testing of containment sumps is a new requirement that will become effective on the effective date of the new rules. Since these sumps must be integrity tested every three years, the first test must be completed by three years after the effective date of the new rules.

Question: What are the effective dates for the new requirements in the proposed regulations?

Answer: The effective dates of most new requirements in the proposed regulations will be the effective date of the regulations. The effective date is soon after the rules are adopted and signed by the Governor (estimated September 2018). The department will hold an official public hearing and public comment period before adopting the rules.

Some regulations must be complied with beginning a certain number of years after the effective date of the new regulations. Effective dates for certain requirements are complicated because they depend on the date of installation or replacement of the tank, piping, etc. The table below summarizes effective dates for the new requirements.

Requirement	Implementation timeline
Secondary containment and interstitial monitoring for new and replaced tanks and piping	Owners and operators must begin meeting these requirements on August 9, 2013
Under-dispenser containment for new dispenser systems	
Annual spill prevention equipment testing	
Annual release detection equipment testing	
Flow restrictors (ball float valves) in vent lines may no longer be used to meet the overflow prevention requirement at new installations and when an existing flow restrictor is replaced	Owners and operators must begin meeting these requirements on the effective date of the new rules
Notifying before storing a regulated substance containing >10% ethanol or >20% biodiesel; demonstrating compatibility	
Metal pipe sections and fittings that have released product as a result of corrosion or other damage must be replaced, not repaired	
Re-training timeline for Class A and Class B Operators of UST system determined to be out of compliance reduced to 30 days (from 90 days)	
Training programs for Class A and Class B Operators must include reporting, recordkeeping, testing, inspections, and environmental and regulatory consequences of releases	Training programs must begin meeting these requirements for Class A and B Operators completing training on or after the effective date of these rules in order to be approved
Earlier reporting of initial abatement steps (20 days), initial site characterization (45 days), and free product removal (45 days)	Owners and operators must begin meeting these requirements for releases confirmed on or after the effective date of the new rules
Tanks temporarily closed for one year must be permanently closed, unless the department grants an extension; a site assessment is required for an extension request	Owners and operators must begin meeting this requirement for tanks temporarily closed for one year after the effective date of the new rules
Monthly walkthrough inspections	Owners and operators must conduct the first test or inspection by 30 days after the effective date of the new rules

Requirement	Implementation timeline
Annual walkthrough inspections	Owners and operators must conduct the first inspection by one year after the effective date of the new rules
Annual inspection of overfill prevention equipment	
Release detection for UST systems that store fuel solely for use by emergency power generators ¹	Owners and operators must begin meeting these requirements three years after the effective date of the new rules
Release detection for airport hydrant fuel distribution systems and UST systems with field-constructed tanks ²	
Containment sump testing for sumps used for piping interstitial monitoring ¹	Owners and operators must conduct the first test or inspection by three years after the effective date of the new rules
Tank secondary containment (except airport hydrant systems and field constructed tanks) ¹	Owners and operators must begin meeting this requirement ten years after the effective date of the new rules
Tank secondary containment or allowed alternative (airport hydrant systems and field constructed tanks) ²	Owners and operators must begin meeting this requirement twenty years after the effective date of the new rules

¹ UST systems installed on or after August 9, 2013 must meet these requirements at installation.

² UST systems installed on or after the effective date of the new rules must meet this requirement at installation.

SECONDARY CONTAINMENT AND INTERSTITIAL MONITORING

Tanks

Question: Why is the department requiring secondary containment for all USTs installed prior to 8/9/2013 (ten years after the effective date of the new regulations)?

Answer: Data collected by EPA shows a higher number of releases from single-walled tanks compared with secondarily contained tanks (80 FR 41566, p. 41573). Secondary containment will reduce the chances of release to the environment by containing leaks within a secondary area and detecting them before they reach the environment. Many states already require secondary containment for all tanks, with requirements that have been in place for ten years or

longer. In addition, by the time this requirement is in effect, all single walled USTs operating within the state will be over 30 years old, and most will be 40 or more years old.

Question: New tanks and piping installed on or after August 9, 2013 must use interstitial monitoring for release detection. Can tanks installed prior to August 9, 2013 that have all components necessary to perform interstitial monitoring use another form of release detection?

Answer: Yes, tanks and piping installed before August 9, 2013 can use another allowable form of release detection even if associated piping has secondary containment and interstitial monitoring.

Question: Do new or replacement fiberglass clad steel tanks need interstitial monitoring?

Answer: All tanks and piping installed on or after August 9, 2013 must have secondary containment and interstitial monitoring. Not all fiberglass/steel combination tanks are considered secondarily contained. A tank has secondary containment if there are two walls separated by an interstitial space that can be monitored for leaks.

Piping

Question: When is secondary containment required when piping is replaced?

Answer: Any piping installed on or after August 9, 2013 must have secondary containment. When replacing a section of piping, it is most practical to replace the entire piping run with secondarily contained piping at one time. All piping installed on or after August 9, 2013 is also required to use interstitial monitoring for release detection.

Question: Are there any exceptions to the requirements for secondary containment and interstitial monitoring of piping installed after 8/9/2013?

Answer: Yes, piping for petroleum UST systems that meets the conditions in §41(b)(3)(A) to (E), also known as “safe suction piping” is not required to have secondary containment and is not required to have release detection. There are also exceptions for certain piping associated with airport hydrant systems and field constructed tanks.

OVERFILL PREVENTION

Phasing out of ball floats

Question: If I replace an existing flow restrictor (ball float valve) in a vent line after the effective date of the rules, can this continue to meet the overfill prevention requirement?

Answer: No. When overfill prevention is installed or replaced after the effective date of the rules, a ball float valve cannot be used to meet the overfill prevention requirement.

Question: If a tank owner and operator is using a high-level alarm set to 90 percent capacity to meet the overfill prevention requirements, can the tank owner still install a ball float valve set at a higher level as a second line of defense after the effective date of the rules?

Answer: Yes. When overfill prevention equipment is installed or replaced after the effective date of the rules, owners and operators may not use flow restrictors in vent lines (also called ball float valves) to meet the overfill prevention requirement. However, a ball float valve may be used for reasons other than meeting the overfill prevention requirement, as long as the flow restrictor does not interfere with the operation of the overfill prevention equipment being used to meet the requirement.

Inspections

Question: Are tank owners required to pull the automatic shut off device out of the tank during the periodic overfill inspection process?

Answer: The regulations do not require the automatic shutoff device be removed during the inspection. The inspection criteria are listed in §35(a)(3).

Question: Some UST systems use two or more of the overfill prevention options listed in the regulations. Do owners and operators have to inspect all overfill devices used on the tank or only the one being used to meet the overfill prevention requirement?

Answer: Only the method of overfill prevention being used to meet the overfill prevention requirements in §20(f) must meet the overfill prevention inspection requirement in §35. Owners and operators must ensure that any secondary overfill prevention method used does not interfere with the primary method. The system should not use an automatic shutoff device if the UST receives pressurized deliveries.

Spill bucket testing

Question: How often do the proposed rules require integrity testing of spill and overfill equipment? When does this requirement become effective?

Answer: Spill and overfill equipment must be integrity tested annually, and this requirement is already in effect.

Question: Are tank owners required to test double-walled spill buckets at least once every year if the interstitial space is periodically monitored and found to have integrity?

Answer: Annual testing is not required if the integrity of both walls of a double-walled spill bucket is periodically monitored. Owners and operators who check vacuum, pressure, or liquid

interstitial integrity indicators on spill buckets at least every 30 days and are considered to be periodically monitoring the integrity of both walls. However, a sensor in a dry interstice does not meet the requirement to periodically monitor the integrity of both walls.

SUMP TIGHTNESS TESTING

Question: How often do the proposed rules require integrity testing of sumps used for interstitial monitoring? When does this requirement become effective?

Answer: The testing of containment sumps is a new requirement that will become effective on the effective date of the new rules. Since these sumps must be integrity tested every three years, the first test must be completed by three years after the effective date of the new rules.

Question: Which sumps are subject to the new integrity testing requirement?

Answer: Containment sumps used as part of interstitial monitoring of double-walled piping, including under-dispenser containment (UDC) sumps, are subject to the new requirement. Sumps must be double walled with the integrity of both walls monitored every thirty days OR must be tightness tested every three years.

Question: Are tank owners required to test at least once every three years double-walled containment sumps used for interstitial monitoring, if the interstitial space is periodically monitored and found to have integrity?

Answer: Testing once every three years is not required if the integrity of both walls of a double-walled containment sump is periodically monitored. Owners and operators who check vacuum, pressure, or liquid interstitial integrity indicators on containment sumps at least annually are considered to be periodically monitoring the integrity of both walls. However, a sensor in a dry interstice does not meet the requirement to periodically monitor the integrity of both walls.

Question: Is containment sump testing required for double-walled piping systems that use sump sensors as a good management practice but rely on a method other than interstitial monitoring to meet the piping release detection requirement?

Answer: No. Integrity testing of containment sumps is not required if the release detection method meeting release detection requirements for the piping is not interstitial monitoring.

Question: What is required for sump tightness testing?

Answer: The sump must be double walled with the integrity of both walls monitored every thirty days OR the sump must be tightness tested every three years. The tightness testing can be done by using vacuum, pressure, or liquid testing and must meet one of these criteria:

- (i) Requirements developed by the manufacturer. (Note: Owners and operators may use this option only if the manufacturer has developed requirements.);
- (ii) Code of practice developed by a nationally recognized association or independent testing laboratory; or
- (iii) Requirements determined by the department to be no less protective of human health and the environment than the requirements listed in clauses (i) and (ii).

To use option (iii), the department must have *pre-approved* the specific testing method.

Under-dispenser containment testing

Question: Are tank owners required to test all UDC or only UDC used for both secondary containment and interstitial monitoring of pipes?

Answer: Periodic testing of containment sumps, including UDC, is required only when the containment sump is used for secondary containment of the piping and interstitial monitoring is used for release detection of that piping.

RECORDKEEPING AND REPORTING

Question: What new recordkeeping and reporting requirements are included in these regulations?

Answer: The only new requirement is to notify the department thirty days **prior** to switching to a regulated substance containing greater than ten percent ethanol, greater than twenty percent biodiesel, or a regulated substance identified by the department; demonstration of compatibility for these substances; and maintenance of records documenting compliance with this new requirement. See §32(b) and (c).

The existing requirements for reporting on initial abatement measures, initial site characterization, and free product removal following a release have been changed to require earlier reporting. Initial abatement measures taken must be reported to the department within 20 days and initial site characterization and free product removal must be reported within 45 days. (All of these reports were previously due within 90 days as part of the first quarterly report.) See §§62, 63, and 64.

Question: If these are the only changes, why is there a long list of requirements in §34(b) that appears to be new?

Answer: Most of the requirements on this list are not new, but listing all the reporting requirements in one place is new. This list refers to the section number where each requirement

is spelled out. The list is intended to help owners and operators ensure that they are up-to-date with all reporting requirements.

WALKTHROUGH INSPECTIONS

Question: When is the effective date of the new requirement to perform monthly walkthrough inspections?

Answer: The effective date of this requirement will be the effective date of the new regulations for all tanks. Since the requirement is to inspect every thirty days, the first walkthrough inspection must be completed by thirty days after the effective date of the new regulations.

Question: Do I need to use a specific form to document walkthrough inspections?

Answer: No, the regulations do not require a specific form. The documentation of inspection should cover all inspections requirements.

Question: Do all containment sumps need to be opened and visually inspected during the monthly inspection?

Answer: No, containment sumps that are not visually accessible and have heavy lids can be inspected annually. We recommend doing this inspection at the same time containment sumps are opened for annual testing of release detection equipment.

Question: If a sump has electronic monitoring, do inspections and testing still need to be performed?

Answer: Annual walkthrough inspections must be conducted on all containment sumps, independent of whether a sump has electronic monitoring, though it is possible the owner and operator may not be able to see much during visual inspection. Three year testing of containment sumps is also required even if a sump has electronic monitoring, except when the containment sump is double-walled and the integrity of both walls is periodically monitored.

RELEASE NOTIFICATION AND REPORTING

Question: What changes have been made to the requirements for reporting a suspected release?

Answer: Some clarifications have been added to §50 describing situations when observed unusual operating conditions or a release detection alarm would not need to be reported. The new clarifications are italicized.

1. The discovery of evidence of released regulated substances at the UST site or in the surrounding area must be reported to the department within 24 hours.

2. Unusual system operating conditions observed or experienced (such as the erratic behavior of product dispensing equipment, the sudden loss of product from the UST system, an unexplained presence of water in the tank, or liquid in the interstitial space of secondarily contained systems) must be reported to the department within 24 hours UNLESS ALL of the following are true:

(A) The system equipment or component is found not to be releasing regulated substances to the environment;

AND

(B) Any defective system equipment or component is immediately repaired or replaced;

AND

(C) *For secondarily contained systems, any liquid in the interstitial space is immediately removed.**

3. Monitoring results, including an alarm, that indicate a release may have occurred should be reported to the department within 24 hours UNLESS ONE of the following is true:

(A) The monitoring device is found to be defective, and is immediately repaired, recalibrated or replaced, and additional monitoring does not confirm the initial result;

OR

(B) *Any defective system equipment or component is immediately repaired or replaced, the leak is contained in the secondary containment, and any liquid in the interstitial space is immediately removed.**

OR

(C) In the case of inventory control described in section 11-280.1-43(1), a second month of data does not confirm the initial result or the investigation determines no release has occurred;

OR

(D) *The alarm was investigated and determined to be a non-release event (for example, from a power surge or caused by filling the tank during release detection testing).*

* The liquid in the interstitial space does not have to be removed if:

(1) The liquid is used as part of the interstitial monitoring method (for example, brine filled); or

(2) If the system uses a secondary barrier within the excavation zone rather than a double-walled tank and the interstitial monitoring system can function properly even with groundwater, soil moisture, or rainfall present, the liquid does not need to be removed.

Question: If the owner immediately responds to the alarm of liquid in an interstitial space, the liquid is removed, repairs made (if necessary), and everything is back in normal operating condition within 24 hours, is notification of the interstitial alarm condition still required to be made to the department within that 24-hour period?

Answer: Liquid in the interstitial space of secondarily contained systems is an unusual operating condition except when the interstitial space is filled with a liquid, such as brine, for interstitial monitoring. Alarms must be investigated and their cause determined to ensure a release of product to the environment has not occurred. If the alarm is caused by liquid in the interstice and the liquid is immediately removed according to §50(3)(B)(i) and defective system equipment is immediately repaired or replaced according to §50(3)(B)(ii), then owners and operators are not required to notify the department.

Question: What changes to release response reporting are proposed?

Answer: The existing requirements for reporting on initial abatement measures, initial site characterization, and free product removal following a release have been changed to require earlier reporting. Initial abatement measures taken must be reported to the department within 20 days and initial site characterization and free product removal must be reported within 45 days. (All of these reports were previously due within 90 days as part of the first quarterly report.) These reports must be in writing, but can be over e-mail, and must cover all the required information listed for each report in §§62, 63, and 64.

OPERATOR TRAINING

Training program requirements

Question: What changes are being made to operator training requirements?

Answer:

(1) A clarification has been added that **every** individual who meets the definition of Class C Operator is a Class C Operator and must receive appropriate training before assuming duties of a Class C operator. *“Class C operator” means the individual responsible for initially addressing emergencies presented by a spill or release from an UST system. The Class C operator typically controls or monitors the dispensing or sale of regulated substances.*

(2) A clarification has been added to the description of comparable examinations: A comparable examination must, at a minimum, test the knowledge of the Class A, Class B, or Class C Operator in accordance with the requirements of §11-280.1-242(1), (2), or (3), as applicable.

(3) Some minor changes have been made to the training requirement for Class A and Class B Operators: Class A and Class B Operator training must include the purpose, methods, and function of reporting, recordkeeping, testing, and inspections and the environmental and

regulatory consequences of releases. The 2013 regulations specify “release and suspected release reporting and response” but do not require Class A Operators to be trained about recordkeeping and reporting (other than release and suspected release reporting). Testing, inspections, and the environmental and regulatory consequences of releases are new required training components for both Class A and Class B Operators, although many training programs may already include these topics.

Question: Does my existing operator training program need to be re-approved by the department?

Answer: Yes, the department will need to re-evaluate all training programs to ensure that they conform with the new requirements. Training completed on or after the effective date of the new regulations must be from a training program approved by the department for the new requirements.

Retraining

Question: If I received training before the effective date of the new regulations, will it still be good when the regulations take effect, or will I need to get re-trained?

Answer: Operator training completed before the effective date of the new regulations will be honored by the department until the operator's next required training renewal (one year for Class C Operators, five years for Class A and Class B Operators).

Question: What changes have been made to re-training requirements?

Answer:

- (1) If the department determines the facility is out of compliance, Class A and Class B Operators must be retrained within 30 days (changed from 90 days).
- (2) The department has the option to waive this re-training requirement for Class A or Class B Operators, or both.

AIRPORT HYDRANT SYSTEMS AND FIELD CONSTRUCTED TANKS

Question: What new regulations apply to airport hydrant systems and field constructed tanks?

Answer: Previously, these types of tank systems were subject to limited regulation covering the following areas:

- Design and construction requirements for tanks and piping (corrosion protection)
- Release Reporting, Investigation, and Confirmation
- Release Response Action
- Closure and Change-in-Service

The proposed regulations apply all subchapters of chapter 11-280.1 to these types of tank systems, but there are some differences between the requirements applicable to most tank systems and the requirements applicable to these special tank types. The differences relate to piping secondary containment, release detection methods, and walkthrough inspections. Requirements for airport hydrant systems and field constructed tanks are located in subchapter 11 of the proposed regulations.

New requirements cover the following areas:

- UST system permitting and notification
- Spill and overflow control and under-dispenser containment
- Tank installation certification
- Compatibility
- Reporting and recordkeeping
- Walkthrough inspections
- Release detection
- Secondary containment
- Financial responsibility
- Operator training

Question: Why are field constructed tanks and airport hydrant systems being more heavily regulated now than in the past?

Answer: Airport hydrant systems are designed and function differently than conventional UST systems. They consist primarily of networks of large diameter underground piping operating at high pressure. Field constructed tanks are typically larger, and sometimes much larger, than factory constructed tanks, and are often associated with longer piping runs than typical USTs. The larger volumes of piping and tanks entail technical challenges for certain aspects of UST system operation, particularly release detection. When EPA made the original UST rules in 1988, regulation of airport hydrant systems and field constructed tanks was deferred until a later time when EPA could write requirements specific to these unique tank systems. Hawaii already requires airport hydrant systems and UST systems with field constructed tanks to comply with tank and piping corrosion protection, release reporting, investigation, and confirmation, release response action, and closure requirements. EPA updated its rules to add regulations for airport hydrant systems and field constructed tanks in 2015, and the department is now updating the Hawaii rules with the additional requirements covered by the new federal regulations.

Question: Why are airport hydrant systems and field constructed tanks allowed to use alternative release detection methods?

Answer: The large volume piping, long piping runs, and large size of tanks sometimes make typical leak detection methods impractical or unusable. For example, with a long piping run, temperature variations along the piping can lead to fluctuating line pressure, which could mask an existing release or falsely indicate that a release has occurred. In addition, very large tanks or large volume piping segments may need several days of inactivity to reach the equilibrium required for an accurate test result. This can be cost prohibitive and/or interfere with operations. However, release detection technologies have improved in the last 25 years and some alternative

release detection methods/method specifications are now available that have been designed specifically for airport hydrant systems and UST systems with large field constructed tanks.

Question: When does the permitting requirement become effective for an airport hydrant system or field constructed tank installed before the effective date of the new rules?

Answer: Airport hydrant systems and field constructed tanks installed prior to the effective date of the rules must be permitted by the department to operate by three years after the effective date of the rules.

Question: Is my facility a regulated airport hydrant system (AHS)?

Answer: There are several factors in this determination. If the system meets the definition of an airport hydrant fuel distribution system in §250 and ten percent or more of the system volume is underground (including piping), it may be a regulated AHS. Because of the large piping volumes used in this type of system, an AHS may be a regulated UST system even if all storage tanks are above ground tanks. For additional information, see: <https://www.epa.gov/ust/underground-storage-tank-ust-technical-compendium-about-2015-ust-regulations#ahs>

Question: How will the new regulations apply to the underground storage tanks at the Red Hill Bulk Fuel Storage Facility?

Answer: The installation date for the tanks at Red Hill was prior to the effective date of the new regulations, so §253 details the effective dates of each portion of the chapter for those tanks.

ENFORCEMENT

Question: The appendix listing penalty amounts associated with field citations is gone. Are the procedures or penalty amounts changing?

Answer: Field citation procedures will remain the same. Field citations and associated penalty amounts will be changing. Penalty amounts have been essentially the same since 2000 and are no longer adequate as deterrents. Although the items of noncompliance and the associated penalty amounts will no longer appear in the form of an appendix attached to the rules, the UST program expects to publish a new schedule of field citations and penalty amounts on its website at least thirty days prior to any changes in penalty amounts.