Portland Community College Health & Safety Manual	Dept: **Environmental Health and Safety**	
	Topic: **Chapter 22 — Environmental Protection and Stewardship**	
	Board Policy: **B507**	Revised Date: **December 2024**

Authority	**PCC Board Policy—B507** **Portland Community College is committed to providing a safe and healthy work and educational environment for our employees, students and visitors.**

Summary	**This chapter has been developed to provide information on the various environmental compliance topics and stewardship programs in place at Portland Community College (PCC) which promote air quality, land quality, and water quality protections. This chapter references several programs managed by a variety of departments at PCC and as such links and directions to those programs are provided as necessary.**

I. PURPOSE

Portland Community College (PCC) endeavors to protect the health and safety of its employees, students, and visitors as well as the environment around and affected by campus activities. This chapter has been developed to provide information on the various environmental protection and stewardship programs in place across PCC. As many of the programs are managed by different departments, brief descriptions for each are given along with references and links to more information.

II. AUTHORITY

Land
OAR 340 Division 90: Recycling and Waste Reduction
OAR 340 Division 64: Waste Tire Program
OAR 340 Divisions 100-103, 109-113, and 142: Hazardous Waste Management
OAR 340 Divisions 150: Underground Storage Tank Rules

Water
ORS 634.650-750: Integrated Pest Management
OAR 340 Division 44: Underground Injection Control
40 CFR 441: Dental Effluent Guidelines
40 CFR 141-148: Safe Drinking Water Act

III. RESPONSIBILITY

The responsibility for environmental protection and stewardship rests at all levels of the college as follows:

Supervisor/Manager/Deans

- Be familiar with environmental programs affecting their work area
- Ensure staff work safely and perform work tasks according to PCC procedures
- Ensure staff receive appropriate training for any environmental program that affects the department's work tasks.
- Manage any department specific equipment with environmental impacts in accordance with applicable regulations and manufacturer's recommendations.

Environmental Health & Safety (EH&S) responsibilities include:

- Facilitate required training for programs managed by the department
- Administer the Regulated Waste Program and facilitate third party waste management, transportation, & disposal operations
- Oversee the compliance aspects of PCC's underground storage tank (UST) systems
- Conduct inspections and facilitate third party testing and analysis of stormwater management systems as required by the Stormwater Monitoring Plan
- Ensure compliance with the stormwater permit
- Perform voluntary drinking water testing when deemed necessary

Facility Management Services (FMS) Maintenance

- Oversee maintenance and repair of campus facility systems
- Manage aboveground storage tanks (AST) connected to buildings systems
- Ensure domestic water segregation from non-potable water sources

FMS Grounds

- Oversee and maintain the Integrated Pest Management (IPM) Plan
- Serve as the IPM Coordinator for the district
- Conduct inspections and maintenance as required by the Stormwater Monitoring Plan

Sustainability Strategy

- Oversee PCC's recycling program
- Oversee PCC's composting program

FMS Central Distribution Services

- Manage UST maintenance and operation including the fuel card system

Transportation and Parking Services

- Conduct inspections and maintenance as required by the Stormwater Monitoring Plan

Dental Sciences

- Manage maintenance and repairs of department specific amalgam separator equipment.

Project Managers

- Ensure all projects are reviewed and conducted in compliance with relevant environmental safety programs
- Conduct waste operations in accordance with PCC recycling and hazardous waste procedures
- Communicate to EH&S regarding completion of projects that impact drinking water sources to ensure timely sampling and analysis
- Review the statement of work for all projects to determine if there will be any impact on environmental compliance; consult with EH&S as needed.

Employees

- Comply with all environmental health & safety programs relevant to their area of work
- Complete all trainings as required by environmental health & safety programs relevant to their area of work

IV. PROCEDURES

PCC complies with environmental protection regulations as mandated by the Oregon Department of Environmental Quality (DEQ), the Environmental Protection Agency (EPA), and other local, state, and federal authorities. These regulations cover many areas of work at the college and in some cases have specific training and reporting requirements. Due to the variety of regulated topics and the amount of management required, multiple departments share the responsibilities for overseeing these programs.

For each topic and area of interest, PCC has designated specific departments or managers to perform the required duties. These departments and managers work to develop procedures and programs for each topic as well as submit all required reports/information and maintain required documents according to regulations. If any of the topics require training, the

designated department will facilitate that training and ensure it is completed according to regulations.

There are three main areas of focus for environmental protection and stewardship: land quality, water quality, and air quality.

A. Land Quality Protections

The land we live on is one of our greatest resources. A large factor in ensuring PCC is a good steward of land quality is by providing programs and opportunities to protect against ground contamination at PCC facilities and reduce the waste that is taken to land-fills. This is accomplished through recycling and composting initiatives, minimizing waste by reducing the products used, proper management of hazardous waste, and/or through proper storage and maintenance of chemical storage areas.

1. Recycling and Composting

PCC has developed waste reduction programs for management, transportation, and proper disposal of a wide variety of solid waste materials after their useful life cycle. Two key programs managed by the Sustainability Strategy department are the recycling and composting programs outlined in the *Solid Waste Management Policy* and on the Sustainability website. The *Solid Waste Management Policy* covers policy goals, performance metrics and evaluations of the policy, as well as procedures and strategies used by PCC to reduce the amount of solid waste that is sent to land-fills. Also included are the types of recyclable waste generated by PCC and descriptions of the disposal method and handling procedures for those items.

Sustainability Strategy has worked in collaboration with Food and Vending Services to implement and improve the PCC composting program. Each PCC campus has pre-consumer composting in the Food and Vending Services' prep area where buckets are used to collect food waste. Both Sylvania and Rock Creek have post-consumer compost collection areas.

Some waste items generated at PCC have dedicated recycling programs established by DEQ. One such program is for the management, storage, and recycling of waste tires, the large majority of which is generated by the Automotive Service Technology department at the Sylvania campus.

For more information on PCC's recycling and composting programs, visit the Sustainability website.

2. Regulated Wastes

The Resource Conservation and Recovery Act (RCRA) outlines requirements for the management, storage, and disposal of specific waste streams which can create hazards to public health and the environment. These wastes are referred to as hazardous waste, universal waste, non-hazardous waste, and biological waste. Compliance with these waste requirements resides with department managers with oversight by EH&S and procedures outlined in *Chapter 21 - Regulated Waste Program*.

The *Regulated Waste Program* was developed to provide PCC employees with information and resources to maintain compliance around regulated waste practices and storage areas. The program outlines applicable compliance and reporting requirements, different regulated waste categories at PCC, procedures for storage, and procedures for disposal requests. It also includes supporting forms and fact sheets to be

used in managing a department's waste storage area.

All regulated waste at PCC is handled and disposed of through appropriate waste vendors according to the specific compliance requirements for that waste stream.

For more information on PCC's Regulated Waste Program, review *Chapter 21 - Regulated Waste Program*.

3. Storage Tanks

One of the biggest risks to the land quality from PCC comes from the potential for environmental hazards to enter the soil. There are many procedures in place to help prevent this through spill response plans as well as the Regulated Waste Program, but when the chemical storage container is an outdoor storage tank, additional controls and procedures are needed. DEQ has established regulations to protect against spills and releases from both above ground storage tanks (AST) and underground storage tanks (UST) and the Petroleum Equipment Institute (PEI) has several recommended practices for the proper maintenance and operation of these systems.

a. Above Ground Storage Tanks (AST)

There are several ASTs in use at PCC, many of which are used as fuel storage for emergency generators, boilers, and other equipment. These ASTs and the systems they are connected to are maintained by FMS Maintenance staff at each facility.

All ASTs in use at PCC are double walled tanks that provide protection against spills. Though they are not equipped with leak detection sensors, all ASTs are located in areas where visual leak inspections can be performed. When a tank needs to be refilled, a fueling vendor is contracted to perform the fueling and ensure there are no spills during that process.

The Sylvania campus has two ASTs for propane which fuel the heaters in the greenhouses. One of the tanks is also used for refueling the bottles for propane fueled material handling equipment. Due to the specific hazards present with ASTs and propane, any PCC employee who refills propane bottles must complete training.

For more information on PCC's ASTs, please contact Facilities Management Services (FMS).

b. Underground Storage Tanks (UST)

PCC has two facilities with USTs; the Sylvania campus has two tanks, and the Rock Creek campus has four. All tanks are registered with DEQ and an annual permit is maintained for their operation. All of PCC's USTs are used for the storage and dispensing of fuels for the various college vehicles and equipment as well as some academic coursework.

Each tank is equipped with spill prevention equipment including secondary containment and leak detection sensors as well as overfill prevention equipment to automatically shut off flow into the UST once it reaches a certain capacity. Each UST location is equipped with an Automatic Tank Gauge (ATG) for volume monitoring and leak detection. Management and repairs of all UST, ATG, and dispensing equipment are facilitated by FMS Central Distribution Services (CDS).

EH&S conducts monthly inspections of all UST systems to ensure each piece of equipment is working properly. These inspections are completed using forms developed by PEI and cover several items including checking the ATG and leak

detection system for alarms, ensuring the fill ports and tank access points are not damaged, and ensuring there is adequate spill response material on hand. Annual inspections are completed by a certified contractor which includes testing and calibrating sensors, line tightness testing to ensure there are no leaks between the tank and the dispensing equipment, and confirmation the ATG is operating properly.

DEQ has established three levels of operators for using and managing UST systems. PCC will have at least one employee trained as a Class A/B operator at all times. The Class A/B operator is responsible for ensuring regulatory compliance with inspections as well as providing training for Class C operators. Class C operators are employees whose primary tasks while operating the UST system include acting as the first responders in emergency situations like spills or alarms.

For more information on PCC's UST systems, please contact EH&S or CDS.

4. Spill Prevention, Controls, and Countermeasures

The Environmental Protection Agency (EPA) has requirements for spill prevention and response preparations for any facility that meets certain quantity thresholds of aboveground or underground chemical storage. At PCC, the four main campuses meet the threshold for aboveground storage and as such have Spill Prevention, Control, and Countermeasure (SPCC) Plans in place.

Each SPCC Plan contains site specific information on storage locations and volumes of select containers along with anticipated spill impact for those containers. There is also information about spill containment infrastructure and response procedures that will be implemented in the event of a spill. SPCC Plans are available for review upon request from EH&S.

B. Water Quality

Oregon DEQ is responsible for ensuring the health and safety of Oregon's waters for many uses such as drinking, recreation and agriculture as well as for ensuring fish populations are able to thrive. To help accomplish this, there are several regulations covering a variety of focuses to protect Oregon's rivers, lakes, streams and groundwater quality and keep these waters safe for a multitude of beneficial uses.

1. Integrated Pest Management

The State of Oregon has several programs in place regarding pesticide use which help promote the protection of state waterways and reduce the amount of highly toxic pesticides used. One such program is a requirement for all schools and community colleges to have an Integrated Pest Management (IPM) Plan. IPM is a process for achieving long-term, environmentally friendly pest suppression through a wide variety of tactics which reduce the food, water, and shelter those pests need.

PCC's IPM Plan includes methods for providing notification of pesticide use, training requirements for PCC employees, and recordkeeping for pesticide applications. The plan also contains information on various pests that could be found on PCC property and how to prevent them. For instances when pesticide use is unavoidable, PCC has adopted a list of low-impact pesticides to restrict use of any chemicals that are highly toxic or contain ingredients that are carcinogens.

PCC's IPM Plan is managed through the FMS Grounds department by the IPM Plan Coordinator. For more information on PCC's IPM Plan, please visit the FMS website.

2. Dental Mercury Amalgam

The EPA has established regulations for pretreatment of water used during dental procedures to reduce mercury amalgam discharges to water treatment facilities. PCC's Dental Sciences Program complies with these regulations through use of a mercury amalgam separator. The regulations require an amalgam separator which has at least a 95% removal efficiency (based on the size of the dental operation). Additional requirements include specifics for installation and operation of dental amalgam separators as well as ensuring each separator is maintained and inspected according to the manufacturer's specifications.

PCC's Dental Sciences Program maintains the mercury amalgam separator and ensures all inspections and maintenance is completed accordingly.

3. Stormwater Management

PCC utilizes a variety of stormwater management systems including bio swales, rain gardens, and underground injection control (UIC) systems which are managed through a Water Pollution Control Facility Permit. This permit requires that specific management procedures be outlined in a Stormwater Monitoring Plan (SWMP) and an Underground Injection Control System Management Plan (UICMP). The SWMP covers information on stormwater sampling, lab analysis, and reporting requirements. The UICMP covers PCC's UIC system inventory, site assessments, and compliance activities.

There are three departments at PCC responsible for stormwater monitoring and system maintenance. EH&S maintains and manages the permit and facilitates the sampling and reporting process, FMS Grounds manages the bio swales and outfalls at PCC's facilities to ensure they are performing properly, and Transportation and Parking Services maintains the roads and parking lot catch basins. Both EH&S and FMS Grounds conduct monthly inspections of the various stormwater management systems in accordance with the permit. Once a year, EH&S facilitates a third-party vendor to sample and analyze specific UIC locations for pollutants.

PCC's Water Pollution Control Facility Permit is a 10-year permit with each year having different reporting requirements. These annual reports are completed by EH&S with assistance from a consultant. Each annual report includes information on the inspections, sampling and analysis, and training that was performed for the year.

Any new construction or renovations which include the creation or alteration of any hardscapes can impact PCC's stormwater management systems. Project managers must review all project scopes to determine if there will be any impact on stormwater systems and consult with EH&S on any work that will.

For more information on PCC's stormwater protection procedures, visit the EH&S's website.

4. Drinking Water Testing

PCC's water comes from public water systems that are chlorinated and therefore no biological testing is required. Metals and other contaminants, such as dissolved solids, are also controlled by the public water system. Public water systems are required to be maintained and tested regularly by a local water district or water system owner. Because of this, independent sampling of the water supply is not necessary unless specific circumstances indicate it is needed.

Due to the age of some PCC facilities, it is possible that some water fixtures could

contain low levels of lead that might leach into the water. EH&S conducts voluntary district-wide drinking water testing each year to look for the presence of lead in an effort to identify sources and mitigate them. Water sampling is conducted in accordance with two EPA guidance documents; *Lead in Drinking Water in Schools and Non-Residential Buildings* and *3Ts for Reducing Lead in Drinking Water in Schools*.

Any drinking water sources that were impacted during construction or a renovation project are included in the annual sampling. It is important that project managers inform EH&S of projects that impact a drinking water source to ensure timely sampling. Additionally, there are specific compliance requirements for child care centers in Oregon which outline specific action levels and response times. EH&S works with the child care facilities managed by PCC to conduct the sampling and provide report information within the required time frame.

Any sample location with lead above the action level will be communicated to FMS for mitigation. Once mitigation is complete, the location is retested to ensure the water reflects acceptable levels per EPA's guidelines.

For more information on the annual drinking water testing, please visit the EH&S website.

C. Air Quality

In support of DEQ's mission to protect Oregon's environment, there are many air pollution controls in place for industries and transportation. PCC has programs in place to monitor air pollutants generated by operational and academic processes. Much of this information is managed by the Energy Resources Manager and Strategic Energy Management or through Sustainability Strategy and their Climate Action Plan. For more information on programs focused on air quality, reach out to Sustainability Strategy or the Energy Resources Manager.

V. TRAINING

There are different training requirements for the various programs and procedures described in this chapter. Recycling, dental mercury amalgam, and drinking water testing do not require program specific training. For the Regulated Waste Program and IPM training requirements, please review the program documents. Other training requirements are outlined below.

A. UST System Training

For Class A/ B operator training, PCC ensures employees receive DEQ approved training from a certified vendor.

Class C operator training is site specific due to the differences in emergency response equipment for each location. Class C operator training is provided by PCC's Class A/ B operator and includes information on:

- System equipment (pump, hose, nozzle)
- Tank monitoring equipment
- Location of emergency equipment and contact information
- Procedures in case of equipment malfunction
- Spill containment material and procedures
- Fuel card usage

B. Stormwater Management Training

There are several departments that receive training which includes information on stormwater system protection from accidental spills or illicit disposal. The training section specific to stormwater management covers information regarding proper disposal as well as spill prevention and spill response procedures.

VI. RECORDKEEPING

Each program has its own set of record keeping requirements which are managed by the department responsible for that program. Recycling and drinking water testing records are maintained by the departments which oversee those programs. More information can be found on their websites. The Regulated Waste Program and IPM records requirements are outlined in the program documents. Records for the dental amalgam separator are maintained by Dental Sciences. Other record keeping requirements are outlined below.

A. UST Records

Records for UST inspections and maintenance are managed through the FMS work order tracking system on a preventative maintenance schedule. Both EH&S and CDS attach required records to the corresponding work orders.

B. Stormwater Management Records

Many of the records maintained for stormwater management are needed for the annual report. Inspection records from EH&S are maintained on the FMS work order tracking system on a preventative maintenance schedule. Inspection records from FMS Grounds are maintained in the department manager's office.

Training records are maintained in the PCC learning management system.

Annual reports are submitted to DEQ and a copy maintained in the EH&S office.