

ATTACHMENT M:

PHASE I HERRERA ESA 2010

**PHASE I ENVIRONMENTAL SITE
ASSESSMENT REPORT**

**Youth Service Center
Seattle, Washington**

**Tax Parcels
2908700085
7949300095**

Prepared for

King County Real Estate Services Section
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Work for this project, including preparation of this report, was performed in accordance with the American Society of Testing and Materials (ASTM) Standard E 1527-05, the Environmental Protection Agency (EPA) All Appropriate Inquiry (AAI) standards and requirements for conducting Phase I environmental site assessments, and with generally accepted professional standards that are currently practiced within this geographical area. This report is intended for the exclusive use of King County. This report is not meant to represent a legal opinion. No other warranty, express or implied, is made. Any use of this report made by third parties, or any reliance on or decisions made based on it, is the responsibility of that third party. Herrera accepts no responsibility for damages incurred by any third party resulting from decisions made based on this report. This report is based only upon available information and records.

Introduction

Involved Parties

Herrera Environmental Consultants, Inc. (Herrera) (see Appendix A for assessor resume) has completed a Phase I Environmental Site Assessment (ESA) for the Youth Service Center (YSC) property, located at 1211 East Alder Street in Seattle, Washington 98122 (Figure 1). The work was conducted under On-Call Environmental Hazard Services Procurement Contract No. B21945B, between King County and Herrera. The assessment was performed prior to renovation of the property to determine the potential for presence of hazardous substances prior to construction. King County is the property owner.

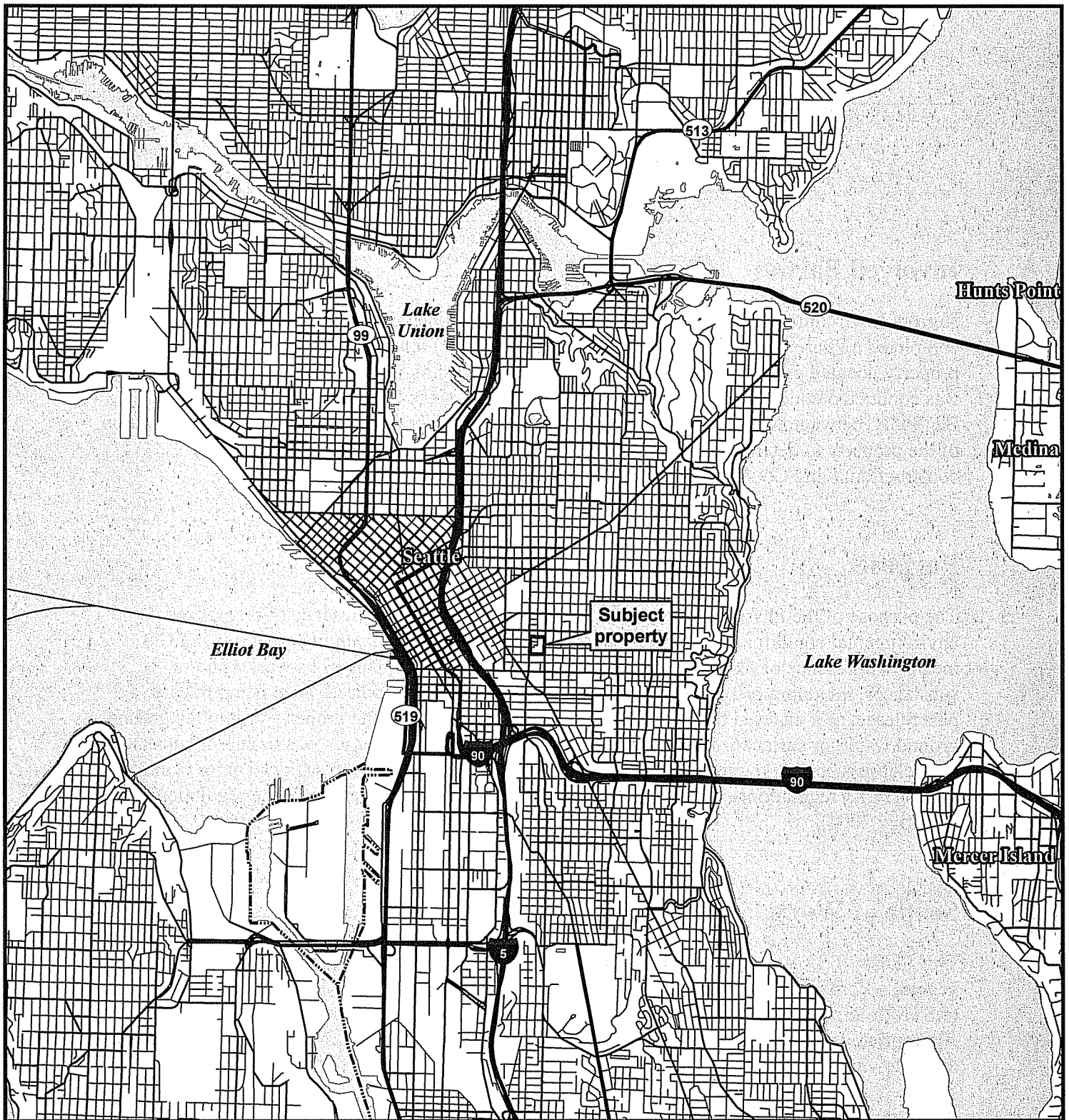
Purpose

The purpose of the Phase I ESA was to evaluate the likelihood for presence of recognized environmental conditions at the Site. The term *recognized environmental conditions* (RECs) means the presence or likely presence of regulated hazardous or dangerous wastes and/or substances, including petroleum products, under conditions that indicate an existing release, a past release, or a material threat of a release into the structures of the property or into the ground, ground water, or surface water of the property. Hazardous or dangerous wastes and/or substances and release reporting requirements are defined by the Washington State Model Toxics Control Act (MTCA) regulations (Ecology 2007) and the Washington Dangerous Waste regulations (Ecology 2004).





Scope of Work

This Phase I ESA was performed on behalf of King County Facilities Management Division in general accordance with American Society of Testing Materials (ASTM) Standard E 1527-05 (ASTM International 2005) and the U.S. Environmental Protection Agency (U.S. EPA) All Appropriate Inquiry (AAI) standard (40 CFR Part 312). The Phase I ESA scope of work included the following subtasks:

- Review of readily available information regarding current uses of the properties and their surroundings
- Review of readily available information from various sources with respect to the historical uses of the properties, including aerial photographs, Sanborn fire insurance maps, historical maps, and other resources



Legend

-  Subject property
-  Highway
-  River
-  City limit

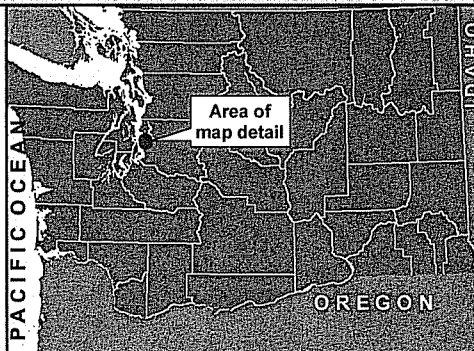
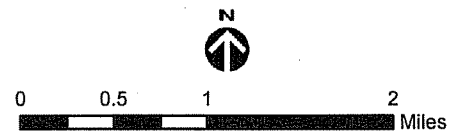


Figure 1.
Vicinity map, Youth Service Center, Seattle,
Washington.



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- Review of federal, state, and local environmental database records identifying properties with known or suspected environmental conditions
- Conduct a visual reconnaissance of the property and cursory reconnaissance of the immediate site vicinity to observe existing conditions, and to help identify potential or actual environmental impacts posed by hazardous materials
- Conduct an interview with the subject property owner and/or manager, as well as neighboring property owners, if available.
- Evaluate whether conditions exist that might result in onsite migration from offsite sources
- Evaluate whether conditions exist that might result in offsite migration of onsite contaminants by air emissions, ground water, or other media.

The scope of this project did not include an audit of environmental regulatory compliance issues or permits, wetland delineation, or collection and testing of environmental samples, including those for radon gas, lead-based paint, polychlorinated biphenyls (PCBs), asbestos, soil, and/or groundwater. A separate hazardous building materials survey was conducted concurrently with this assessment and is reported on separately.

Site Description and Physical Setting

Site Description and Physical Setting

The site consists of two parcels covering a total of 8.59 acres, located in the south central portion of Section 41, Township 25 North, Range 4 East of the Willamette Meridian, in King County. The two parcels are identified by Tax ID numbers 2908700085 and 7949300095. A site vicinity plan, including the subject property, is presented in Figure 2.

The subject property is situated at latitude 47.59909 North and longitude -122.33136 West on land that slopes down to the south from approximately 260 to 220 feet above mean sea level (EDR 2010). The site is currently used as a juvenile detention center by King County. Approximately 65 percent of the site is covered by impervious surfaces that include building roofs and paved parking areas. Buildings cover approximately 35 percent of the property; the remainder is composed of parking lots, paved walkways, and lawn/landscaped areas. Catch basins in the paved areas drain surface water to the City stormwater system. The site is bordered by residential and commercial/industrial properties on all sides.

Asset Description

King County property records indicate the following:

Building Number	Building Area (ft ²)	Building Construction Date	Building Type	Current Use	Heating System
1	90,792	1951	2 story reinforced concrete	Cafeteria, hospital, gymnasium	Package unit
2	64,500	1971	6 story reinforced concrete	Office and court	Package unit
3	40,144	1971	2 story reinforced concrete	Youth center dormitory	Package unit
4	30,750	1974	2 story reinforced concrete	Youth center dormitory	Package unit
5	4,459	1970	1 story reinforced concrete	Gymnasium	Package unit
6	4,108	1968	2 story reinforced concrete	Indoor swimming pool room	Package unit
7	95,719	1990	2 story masonry	Office, jail, gymnasium	Package unit

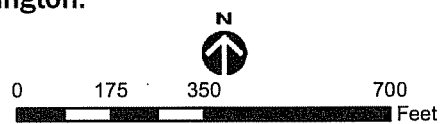
Source: King County 2010.



Legend

- Subject property
- Reported release site (see Table 2)
- Historical site of concern (see Table 3)
- Underground storage tank (onsite)

Figure 2.
Site map, Youth Service Center, Seattle,
Washington.



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Aerial photograph: USDA, 2009
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Regional and Site Geology and Hydrogeology

Geology

The subject property is located within the southern portion of the Puget Sound Lowland physiographic region. The Puget Sound Lowland has undergone physiographic and depositional changes due to at least five glacial episodes. The last glaciation that occurred in the region was the Vashon Stade of the Fraser Glaciation, which ended approximately 13,500 years ago. The advance of the Vashon Glacier deepened and widened the north/south trending valleys situated between the Olympic Mountains and the Cascade Range in western Washington State. In the Seattle area, the Vashon Stade is represented by four stratigraphic units (from oldest to youngest): Lawton Clay, Esperance Sand, Vashon Till, and Vashon recessional deposits that make up the Vashon Drift (Galster and Laprade 1991).

As the Vashon glacial lobe advanced south and blocked the northern portion of the Puget Sound basin, a lake was formed and fine-grained sediments were deposited. This glaciolacustrine deposit, known as the Lawton Clay, is reported to be present in the Seattle area as high as 150 feet above mean sea level. A fine- to medium-grained sand unit was deposited above the Lawton Clay by meltwater streams issuing from the advancing ice sheet as it neared the Seattle area. This sand unit is called the Esperance Sand Member. The Lawton Clay and Esperance Sand are sometimes intermixed and interbedded, and the contact between the two soil types may be gradational. Both of these deposits were overridden by an estimated 3,000 feet of ice, which consolidated them into hard or dense layers. A mantle of the Vashon till was deposited on top of the Esperance Sand and Lawton Clay.

The subject property likely rests on Vashon glacial till and outwash sediments. Glacial till typically consists of a heterogeneous mix of gravelly sand, with scattered cobbles and boulders in a clay/silt matrix. It is very dense and is locally referred to as hardpan. Excavation can be difficult due to its compact nature (Sound Transit 1999).

Regional and Site Hydrology (Surface Water, Wetlands, Stormwater Runoff)

The subject property sits at the center of a north-south trending trough, with the potential to accept surface flow from a wide arc, extending from the northwest, swinging through the north to the northeast. Surface water leaves the site to the south. Surface flow typically is intercepted by the City stormwater collection system, so that only site runoff comes onto the property; however, historical intense rainfall events have resulted in significant site flooding. There are no wetlands or surface water bodies mapped in the vicinity of the subject property.

Hydrogeology (Groundwater)

Groundwater in the Seattle area generally occurs above the Esperance Sand/Lawton Clay contact and emerges along hillsides as springs. Limited groundwater may be found in the Vashon till as

perched layers. Groundwater is primarily recharged by direct infiltration and seepage from surface waters, precipitation, and surface runoff. The likely direction of regional groundwater flow beneath the subject property is toward the northwest and Puget Sound. Based on surface topography, shallow groundwater likely flows to the south.

No monitoring wells or soil boring logs were readily available for the subject property and immediate vicinity to evaluate ground water conditions. Because of the location of the subject property in a minor valley and variable upslope and downslope conditions, sites to the northwest, north, and northeast of the subject property that may be crossgradient have been considered potentially upgradient.

Environmental Database Review

Regulatory Agency Databases

A review of regulatory agency records was conducted for the property and surrounding area to identify known or suspected sources of contamination that could adversely impact the subject properties (EDR 2010). Records were obtained using Environmental Data Resources, Inc. (EDR), a commercial database service that searches U.S. EPA and Washington State Department of Ecology (Ecology) records. The commercial database search report was reviewed for accuracy of site locations and was modified appropriately. Table 1 provides a summary of the databases reviewed; the complete commercial database search report is included in Appendix B with figures identifying locations of the reportable sites. The search radii are based on a starting point situated at the center of the property. Each site located in the search was assigned the individual identifier (ID code) shown in Table 2.

Table 1. Regulatory database source lists.

Agency	List Acronym/ID ^a	Description	Search Radius	Number of Sites Located
U.S. EPA	NPL	National Priority List	1 Mile	1
U.S. EPA	CORRACTS	RCRA Corrective Actions	1 Mile	0
Ecology	CSCSL/CSCSL-NFA	Confirmed and Suspected Contaminated Sites List/No Further Action	1 Mile	49
U.S. EPA	Delisted NPL	Delisted National Priority List	1/2 Mile	0
U.S. EPA	CERCLIS/NFRAP	Sites Currently Under Review	1/2 Mile	2
Ecology	HSL/SHWS	CSCSL sites scored by Ecology	1/2 Mile	10
U.S. EPA	TSDF	Permitted RCRA Treatment, Storage, and Disposal Facilities	1/2 Mile	0
Ecology	LUST	Leaking Underground Storage Tank Sites	1/2 Mile	16
Ecology	ICR/VCP	Independent Cleanup Report/Voluntary Cleanup Program	1/2 Mile	49
Ecology	SWLF	Permitted Solid Waste Landfills, Incinerators, or Transfer Stations	1/2 Mile	0
Ecology	Brownfields	Local Brownfields	1/2 Mile	5
Ecology	UST	Regulated Underground Storage Tanks	1/8 Mile	1
U.S. EPA	ERNS	Emergency Response Notification System	0 Mile	0
U.S. EPA	RCRA-LQG	RCRA Registered Large Quantity Generators of Hazardous Waste	0 Mile	0
U.S. EPA	RCRA-SQG	RCRA Registered Small Quantity Generators of Hazardous Waste	0 Mile	0
Ecology	SPILLS	Reported Spills	0 Mile	0

RCRA = Resource Conservation and Recovery Act.

^a See Appendix B for definitions of database acronyms.

Table 2. Summary of sites with known or suspected environmental conditions based on regulatory record searches, Youth Service Center property.

Site Name	Site Address	REC ^a Y/N	Justification	Distance ^b	ID Code	Type	Condition	Contaminant	Media
KING CNTY YOUTH SERVICES	1211 E ALDER ST	Y	Existing UST	Onsite	A1, A2, A3	FINDS, UST	Generator fuel storage, no reported release	Diesel fuel	NA
CAPITOL HILL ARCO	427 12TH AVE	N	No reported release	Approx 500 feet northwest	D13	FINDS, UST	Petroleum fuel storage in three USTs	Petroleum products	NA
TD AUTO BODY & REPAIR	1209 E FIR ST	N	Downgradient from site	Approx 500 feet south	E19	FINDS, CSCSL	Petroleum release reported, awaiting remedial action	Petroleum product	Soil
B & B AUTO REPAIR SEATTLE	151 12TH AVE	N	Downgradient from site	Approx 500 feet south	E20	UST	Petroleum fuel storage in two USTs	Petroleum products	NA
151 12TH AVE	151 12TH AVE	N	Downgradient from site	Approx 500 feet south	E21	LUST, SPILLS	Spill reported	Petroleum products	Unknown
JEFFERSON STREET BUS BARN	1398 E. JEFFERSON ST.	N	Distance from site	Approx 500 feet northeast	G25, G26	FINDS, CSCSL, ICR	Tank release	Petroleum product	Soil
FORMER NU WAY CLEANERS III	117 12TH AVENUE	N	Downgradient from site	Approx 500 feet south	H29	BROWNIE LDS	Historical dry cleaner releases	Petroleum products, solvents	Soil, groundwater
PROVIDENCE HOSPITAL	1506 JEFFERSON ST.	N	Distance from site	Approx 750 feet northeast	30	ICR	Tank release	Petroleum product	Soil
BLUE WHALE/SEATTLE UNIVERSITY	610 13TH AVE.	N	Distance from site	Approx 900 feet north	N56	UST, LUST, ICR	Tank release, reported cleaned up	Petroleum products	Soil
METAL LAUNDRY INCORPORATED	614 12TH	N	Distance from site	Approx 1,000 feet north	65	CSCSL, HSL	4 USTs removed in 1996	Solvents	Soil, groundwater

Notes:

^a RECs are "recognized environmental conditions" listed in the Conclusions section of this report and are the outcome of the entire Phase I ESA discernment process.

^b Distance of the listed site relative to the subject property, as determined by area reconnaissance.

FINDS Facility Index System/Facility Registry System

CSCSL Confirmed and Suspected Contaminated Sites List

ICR Independent Cleanup Report

LUST leaking underground storage tank

UST underground storage tank

No contaminant release has been reported for the subject property; the property is listed only on the state underground storage tank (UST) database.

A review of the EDR database search report, including sites listed in the orphan site summary, identified two sites with documented releases and one site (Capitol Hill ARCO) that manages hazardous materials in significant quantities located within a 1/8-mile radius and upgradient of the Site. These are discussed below.

Known or Suspected Contaminant Releases

The Comprehensive Environmental Response, Compensation, and Liability Information System (CERCLIS) database contains data on potentially hazardous waste sites that have been reported to the EPA by states, municipalities, private companies, and private persons pursuant to Section 103 of CERCLA. CERCLIS sites designated as “No Further Remedial Action Planned” (NFRAP) have been removed from CERCLIS. NFRAP sites include those where, following an initial investigation, no contamination was found, contamination was removed quickly without the need for the site to be placed on the National Priority List (NPL), or the contamination was not serious enough to require Federal Superfund action or NPL consideration. One site was identified within one mile of the subject property. The Lower Duwamish Superfund site is actually located more than 1 mile downgradient from the subject property and poses no potential to impact the YSC.

The Confirmed and Suspected Contaminated Sites List (CSCSL) compiled by Ecology records contaminant release sites that may or may not already be listed on the CERCLIS list. CSCSL sites designated as “No Further Action” are not deleted from the database when cleanup activities are completed; instead, a NFA code is entered based upon the type of NFA determination issued for the site. Three sites were identified within 0.5 mile and upgradient of the subject property. The Metal Laundry site is located approximately 1,000 feet north and the Jefferson Street Bus Barn and Providence Hospital sites are located approximately 500 feet and 750 feet northeast, respectively. The Metal Laundry site is discussed further below; the other two sites experienced petroleum releases to soil and were reportedly cleaned up in the 1990s.

The Leaking Underground Storage Tank (LUST) list compiled by Ecology includes reported active and inactive leaking underground storage tanks. A review of the LUST list revealed one site located within 0.5 mile and upgradient of the subject property. The Blue Whale/Seattle University site experienced a petroleum release to soil that was reportedly cleaned up in the 1990s.

The Washington State Voluntary Cleanup Program (VCP), and its predecessor Independent Cleanup Reports (ICR), lists compiled by Ecology include remedial action reports received either from the owner or operator of a hazardous materials release site. These actions have been conducted without Ecology oversight or approval and are not under an order or decree. A review of the list revealed three sites within 0.5 mile and upgradient of the subject property. The

Jefferson Street Bus Barn, Providence Hospital, and Blue Whale/Seattle University sites have reportedly been cleaned up, and are unlikely to impact the subject property.

Other Relevant Sites Considered

The Underground Storage Tank (UST) register compiled by Ecology includes registered active and inactive underground storage tanks. A registered underground storage tank is defined in Underground Storage Regulations Chapter 173-360 of the Washington Administrative Code (WAC). Heating oil tanks are not regulated or registered. A review of the UST list revealed one site within 0.25 mile and upgradient of the subject property. Capitol Hill ARCO manages three USTs and has not reported any releases to the environment.

Site File Review Summary

Summarized below is the Ecology regulatory site file and EDR report information reviewed on the major property of concern identified in the regulatory database. It is not considered a REC.

Metal Laundry, 614 12th Avenue

This site is located approximately 1,000 feet north of the subject property. It has operated as dry cleaner and metal plating facilities in the past. Solvents have been released to soil and groundwater, resulting in a plume that has reached the southern property boundary. Monitoring wells installed onsite indicate the presence of floating product near the center of the property, with the leading edge of the plume extending beneath East Cherry Street (RETEC Group 2007). Due to distance from the YSC, this site is not considered a REC.

Historical Records Review

The report sections below describe historical land uses and explain the reasons for including or omitting the associated suspect environmental conditions from further consideration as concerns for the subject property.

Maps, Directories, and Other Sources

The history of land use at and surrounding the Site was evaluated to identify past uses with potential adverse effects on environmental conditions, primarily through the use of potentially hazardous materials. Historical information was obtained by reviewing readily available public agency and library documents.

The following site history is based on a compilation of information obtained from these sources:

- Property and building characteristics information obtained from the King County parcel viewer website (King County 2010)
- Sanborn Library maps obtained from EDR, Inc. (2010) for years 1893, 1905, 1949, 1950, and 1969 (Appendix C)
- Aerial photographs obtained from EDR, Inc. (2010) for years 1956, 1965, 1968, 1977, 1980, 1985, 1990, and 2006 (Appendix D)
- Seattle city directories obtained for 1937, 1940, 1943-45, 1948-1949, 1951, 1953, and 1960
- King County tax assessor records (WSA 2010).

Site History

Prior to development as the YSC, the subject property was developed as single family and apartment housing. The 1940 City Directory identified Lasalle Oil Burner Co on the subject property (not in the 1937 or the 1943 directories). The 1949 Sanborn fire insurance map indicates the property bounded by East Spruce Street, 12th Avenue, East Alder, and 14th Avenue primarily with houses and apartments, with one auto repair shop on the southwest corner of the YSC property. The 1950 Sanborn fire insurance map indicates this entire area without buildings. King County building records indicate that the first YSC building was erected in 1951, with additions made in 1968, 1970, 1971, 1974, and 1990. Tax Assessor information identified the YSC as having an oil burner in the 1951 record. The 1956 aerial photograph indicates the Spruce Wing as built out. Both the 1965 aerial photograph and Sanborn fire insurance map indicate the YSC

configuration as unchanged. The 1977 aerial photograph indicates development of the site to include the tower, the Alder Wing to the northeast, and the large parking lot to the northwest. Since then, modifications to the buildings have occurred, primarily within the approximate 1977 footprint. Development of the property north of East Alder Street required the demolition primarily of houses and apartments, according to the 1969 Sanborn fire insurance map.

Adjacent Site History

The YSC has historically been surrounded by single family houses, apartments, and small commercial businesses. Numerous auto repair and clothing cleaner facilities have been located adjacent to the YSC property over the years (Table 3). These businesses have no records of chemical releases and do not appear on regulatory databases; however, they have been identified by EDR from historical information sources. The distances provided in Table 3 were measured from the address cited to the YSC building footprint, as a measure of potential to impact the remodel based on groundwater as a transport mechanism. All sites are considered RECs because they are nearby and upgradient of the YSC; however, their potential to impact the property is considered to be small.

Existing Related Reports

Following review of available electrical, mechanical, and site civil drawings for the YSC, King County provided historical building electrical drawings from 1969, 1989, and 1990 (Appendix E). The 1969 drawing indicates the presence of a 1,000 gallon diesel oil UST that appears to be located beneath the southwest corner of the existing tower, with fuel lines extending northwest to a day tank and generator in the building. The 1990 as-built drawing indicates an “existing fuel tank” at the same general location with fuel lines extending northwest into the building; the tank and lines are labeled “to be removed”. The 1990 drawing also indicates a buried fuel tank outside the northwest corner of the Spruce Wing, with fuel lines extending south into the building supporting a day tank. The 1989 Site Plan indicates an engine generator inside the building at this location. Mechanical and site civil drawings did not indicate the presence of features associated with hazardous substances.

Interview with Local Government Officials and Others

According to the Seattle Fire Marshal, there are no records of tank removal at the YSC on file (Seattle 2010).

Table 3. Summary of sites with suspected environmental conditions based on historical activities, Youth Service Center property.

Site Name	Site Address	REC ^a Y/N	Justification	Distance ^b	ID Code	Type	Contaminant	Media
HILL S AUTO REPAIR	314 12TH AVE	Y	Distance to site	Approx 150 feet west	B4	Historical Auto Stations	Petroleum products	NA
TETS AUTO REPAIR	317 12TH AVE	Y	Distance to site	Approx 150 feet west	B5	Historical Auto Stations	Petroleum products	NA
KONO GARAGE	321 12TH AVE	Y	Distance from site	Approx 150 feet west	B6	Historical Auto Stations	Petroleum products	NA
BOB S AUTO REPAIR	305 12TH AVE	Y	Distance from site	Approx 150 feet west	B7	Historical Auto Stations	Petroleum products	NA
FULLER SERV U DRY CLEANERS	320 14TH AVE	Y	Distance from site	Approx 150 feet west	8	Historical Cleaners	Solvents	NA
NW PERKINS MOTORS	217 12TH AVE	Y	Distance from site	Approx 50 feet west	C9	Historical Auto Stations	Petroleum products	NA
JOHNSON PAUL R	212 12TH AVE	Y	Distance from site	Approx 50 feet west	C10	Historical Auto Stations	Petroleum products	NA
KONO Y TKIO	407 12TH AVE	Y	Distance from site	Approx 350 feet northwest	D11	Historical Auto Stations	Petroleum products	NA
FRANS BROS	417 12TH AVE	Y	Distance from site	Approx 350 feet northwest	D12	Historical Auto Stations	Petroleum products	NA
LAW S CLEANERS AND HATTERS	452 12TH AVE	Y	Distance from site	Approx 450 feet northwest	D15	Historical Cleaners	Solvents	NA
ROBERTSON S CLEANERS	460 12TH AVE	Y	Distance from site	Approx 450 feet northwest	16	Historical Cleaners	Solvents	NA
LEE WING HAND LAUNDRY	1222 E JEFFERSON ST	Y	Distance from site	Approx 450 feet northwest	F22	Historical Cleaners	Solvents	NA
DONG GOM	1220 E JEFFERSON ST	Y	Distance from site	Approx 450 feet northwest	F22	Historical Cleaners	Solvents	NA
Auto Repair	320 12 th AVE	Y	Distance from site	Onsite	Sanborn	Historical Auto Repair	Petroleum products	NA

Notes:

^a RECs are "recognized environmental conditions" listed in the Conclusions section of this report and are the outcome of the entire Phase I ESA discernment process.^b Distance of the listed site relative to the subject property buildings, as determined by area reconnaissance.

Results of Site Reconnaissance

On March 30, 2010, a Herrera representative conducted visual reconnaissance of the subject property, and an interview was conducted with the facility maintenance supervisor, Peggy Wickard (Appendix F). The purpose of the site visit was to identify visible indications of hazardous or potentially hazardous substances historically used or currently used, generated, stored, or disposed of on the subject property and on nearby properties. Site reconnaissance notes are provided in Appendix G. A general visual reconnaissance of adjacent properties was also conducted during the site visit, restricted to what could be observed from public areas.

Site Setting and Observations

The subject property includes the seven structures described in the Asset Description section earlier in this report. All of the buildings were built on poured concrete foundations and are heated by steam delivered via underground piping from the Seattle Steam Company.

Only the basement area beneath the 6-story courtroom/office tower building and a tunnel associated with the Alder wing was observed during the site visit. Approximately 100 gallons of paint, paint thinner, and drywall mud compound in 1-gallon and 5-gallon containers was observed stored in the tunnel associated with the Alder wing; no stained concrete or indications of spills was observed where the paint was stored. A small quantity of approximately 15 paint containers were also observed on a cart near the kitchen loading dock; according to the maintenance supervisor the paint is awaiting pickup by a contracted disposal company. The maintenance supervisor stated that there are several janitor closets with floor drains located throughout the facility buildings; stains observed at these locations in the past are believed to be associated with typical mop water and rust (the facility currently uses Emerald Green biodegradable cleaners).

One of the two boiler rooms located at the facility was observed. Numerous pipes wrapped in insulation, heat exchangers, and an air compressor was observed in the room. Some water/condensate ponded on the floor was observed, but no stains were present. An asbestos survey underway at the facility will include testing samples of the pipe insulation in the boiler rooms (reported separately).

Vicinity Reconnaissance

Areas surrounding the subject property gently slope to the south-southeast. The subject property is surrounded on all sides by residential and a few commercial properties. An ARCO gas station was observed upgradient to the northwest of the subject property at the intersection of East Jefferson Street and 12th Avenue. An auto repair facility, H&I Automotive, was also observed at 317 12th Avenue.

Miscellaneous Environmental Concerns

Polychlorinated Biphenyls

Since the early 1920s, electrical transformers, fluorescent light ballasts, and other electrical equipment have used mineral oil mixed with varying quantities of PCBs as dielectric fluid. The U.S. EPA currently regulates PCBs through the Toxic Substances Control Act of 1976 that dictates the use, labeling, storage, record-keeping, and disposal of PCBs (40 Code of Federal Regulations [CFR] 761). Transformers and equipment manufactured after July 1979 are required to be PCB-free and labeled accordingly.

Five electrical transformers mounted on top of three utility poles were identified adjacent to the west side of the subject property along 12th Avenue. Based on the transformer serial numbers, all were manufactured in 1985 and contain less than 50 parts per million PCBs (Dinehart 2010). Information for transformers observed adjacent to the east, and cross-gradient or down-gradient of the subject property along 14th Avenue was not obtained.

Asbestos-Containing Materials

Hazardous building material survey reports are being prepared under separate cover, based on surveys conducted concurrently with this assessment.

Lead-Based Paint

Lead was a common additive in most interior and exterior oil-based paints prior to the 1950s. In the early 1950s, other ingredients became more popular, but some lead pigments, corrosion inhibitors, and drying agents were still used. A voluntary standard was adopted in 1966 to limit the lead content in interior paint; however, buildings constructed in the 1960s and 1970s are not necessarily free of lead-based paint. Up to 1977, exterior paints continued to contain significant amounts of lead. After 1977, lead content in paint was limited to no more than 0.06 percent.

Hazardous building material survey reports are being prepared under separate cover, based on surveys conducted concurrently with this assessment.

Findings

Herrera has performed a Phase I Environmental Site Assessment in general conformance with the scope and limitations of ASTM Practice E 1527 and U.S. EPA AAI standards of the property at 1211 East Alder Street. No exceptions to, or deletions from, this practice were required during the assessment. This assessment has revealed evidence of recognized environmental conditions in connection with the subject property.

The subject property consists of two parcels covering 8.59 acres. One parcel is used primarily as a parking lot and the other primarily supports the YSC buildings. One emergency generator diesel fuel UST exists on the property. It is a double wall steel tank registered with Ecology, complies with current regulations, and features an electronic leak detection system; no evidence of a leak has been identified. A diesel fuel UST was historically used to support emergency generator use in the basement on the west side of the tower. City Directory information indicates that between 1937 and 1943, the Lasalle Oil Burner Company was located near the southwest corner of the YSC property and the 1949 Sanborn fire insurance map indicates that an auto repair shop was located a little further north on the property. After significant site development, it is unlikely that residual contamination associated with either of these businesses still exists. Tax assessor information for 1951 indicates the use of an oil burner onsite; other information indicates that building heat has always been supplied by the Seattle Steam Company.

A hazardous building materials survey currently being conducted throughout the property buildings will identify existing asbestos, lead-based paint, PCBs, and mercury, if they exist.

An environmental regulatory database search revealed one site nearby and upgradient of the YSC with a release of chemicals to groundwater. Solvent releases from the Metal Laundry site has resulted in minor offsite migration that is not expected to impact the YSC. Two other sites located nearby and upgradient of the YSC have released petroleum products to soil and were reportedly cleaned up in the 1990s. The Capitol Hill ARCO gas station identified at 427 12th Avenue manages petroleum products in USTs, but has not reported a release. No other sites of concern were identified on regulatory databases.

Thirteen sites of concern were identified as historical auto stations or historical cleaners (Table 3 and Figure 2). These sites operated in the past, prior to release reporting requirements. It is possible that any of these historical sites have released chemicals to the environment; it is unknown whether they have impacted the YSC. These sites are considered RECs; however, the chance of impacts to the subject property is minor. It is also possible that homes located on the YSC property prior to development may have used heating oil stored in USTs.

Based on the results of this Phase I ESA, there is a low likelihood of contamination present on the site; however, it would be prudent to collect soil samples from areas prior to excavation that coincide with activities related to historical hazardous substance use (e.g. historical UST, Lasalle Oil Burner Company, and auto repair facility).

I declare that, to the best of my professional knowledge and belief, I meet the definition of Environmental Professional as defined in 40 CFR §312.10. I have the specific qualifications based on education, training, and experience to assess a property of the nature, history, and setting of the subject property. I have developed and performed the all appropriate inquiries in conformance with the standards and practices set forth in 40 CFR Part 312. The Assessor's resume is provided in Appendix A.

A handwritten signature in black ink, appearing to read 'Peter Jowise', with a long horizontal flourish extending to the right.

Peter Jowise

Principal Waste and Energy Services

Data Gaps

There were no significant data gaps affecting the ability of the environmental professional to identify conditions indicative of releases or threatened releases.

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