CLEANUP ACTION STATUS REPORT

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Report prepared for:

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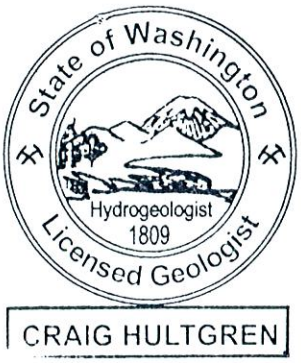

HydroCon

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ACRONYMS AND ABBREVIATIONS

bgs	below ground surface
BTEX	benzene, toluene, ethylbenzene, and total xylenes
CLARC	Cleanup Levels and Risk Calculation
DRPH	diesel range petroleum hydrocarbons
Ecology	Washington State Department of Ecology
EDB	ethylene dibromide
EDC	dichloroethane; 1,2
EFR	enhanced fluid recovery
EPA	United States Environmental Protection Agency
EPH	extractable petroleum hydrocarbons
HydroCon	HydroCon Environmental, LLC
GRPH	gasoline range petroleum hydrocarbons
µg/L	micrograms per liter
mg/Kg	milligrams per kilogram
MTCA	Model Toxics Control Act
NWTPH	Northwest Total Petroleum Hydrocarbon
ORPH	oil petroleum hydrocarbons
PAH	polynuclear aromatic hydrocarbons
PCS	petroleum contaminated soil
RI	remedial investigation
SES	SoundEarth Strategies
UST	underground storage tank
VOC	volatile organic compounds
VPH	volatile petroleum hydrocarbons
WAC	Washington Administrative Code

1.0 INTRODUCTION

HydroCon Environmental, LLC (HydroCon) prepared this Cleanup Action Status Report for the TOC Holdings Co. Facility No. 01-443, located at 4910 Leary Avenue Northwest in Seattle, Washington (hereinafter referred to as the Property).

1.1 DOCUMENT PURPOSE

This document was prepared at the request of the State of Washington Department of Ecology (Ecology) to provide a summary of historical land uses, results of prior environmental investigations, and a status for cleanup actions currently in progress for the Property and associated Site. The purpose of this report is to provide adequate data to support a consensus among TOC Holdings Co., their consultant HydroCon Environmental LLC, and Ecology regarding the following issues:

- Establishing the sources of petroleum hydrocarbons observed in wells located on the Property and off-Property.
- Chemicals of concern and the respective cleanup levels for the Property.
- Sampling and analytical requirements necessary to confirm that cleanup levels have been attained for the chemicals of concern in the media of concern for the Property.

1.2 DOCUMENT ORGANIZATION

This document is organized into the following sections:

- **Section 2.0, Site Background.** This section provides the location and description of the Property and summarizes the geologic and hydrogeologic setting and previous investigations. Note that discussions of site investigations compare analytical results to the Model Toxics Control Act (MTCA) Method A cleanup levels for the purpose of describing the nature and extent of impacted media. Section 4.3 develops and proposes the use of Method B cleanup levels for the Property.
- **Section 3.0, Source Evaluation.** This section discusses the nature of release(s) of hazardous substances and presents information on the historical uses of nearby properties.
- **Section 4.0, Status of the Cleanup Action.** This section presents the chemicals and media of concern and summarizes the trends in chemical concentrations in the media of concern.
- **Section 5.0, Conclusions and Recommendations.** This section provides an assessment of the current Site definition based on the current cleanup action status and the use of Method B cleanup levels, and makes a recommendation for site closure.
- **Section 6.0, Bibliography.** This section lists references used to prepare this document.
- **Section 7.0, Limitations.** This section discusses document limitations.

2.0 SITE BACKGROUND

The following subsections provide information related to the Property under review in this report. The Property is located 4910 Leary Avenue Northwest, Seattle, Washington. This section provides a description of the Property and the physical setting, a brief summary of the scope and findings of previous environmental investigations conducted on the Property, and a description of response actions. Primary sources of the following information are the Fourth Quarter 2014 Quarterly Groundwater Monitoring Report (HydroCon 2014), the Remedial Investigation (RI) report prepared by Sound Environmental Strategies Corporation (SES 2009), and the Interim Remedial Action Report (SES 2012).

2.1 LOCATION AND DESCRIPTION

The Property includes a single tax parcel (King County parcel number 276770-3340) that covers approximately 5,700 square feet (0.13 acres) of land. The Property is listed as 4910 Leary Avenue Northwest and is located approximately 5 miles northwest of downtown Seattle, Washington (Figure 1).

Improvements to the Property include a 1942-vintage building that is currently occupied by the Shelter Lounge. Exterior portions of the Property include an asphalt-paved parking lot and perimeter landscaping (Figure 2).

The Property was originally developed with a single-family residence by 1893 and developed as a retail gasoline station in 1922. The 1922-vintage building was replaced with a service station in 1942. The Property was unoccupied by 1964, after which the facility was dedicated to automotive repair. The Station Bistro and Cocktail Lounge occupied the Property between 2006 and 2008 and is currently occupied by the Shelter Lounge.

2.2 GEOLOGIC AND HYDROGEOLOGIC SETTING

The following sections provide a summary of the geology and hydrogeology beneath and in the vicinity of the Property.

2.2.1 Topography

The Property is located on a relatively flat surface at an approximate elevation between approximately 35 and 40 feet above mean sea level. Salmon Bay, the nearest surface water body, is located approximately 950 feet to the southwest of the Property (Figure 1). The topography in the vicinity of the Property is sloping toward the west-southwest.

2.2.2 Regional Geology

The native geologic materials underlying the area consist of glacial and non-glacial depositional materials to depths of more than 1,500 feet below ground surface (bgs). Fill materials predominate from the surface to depths of between 10 and 30 feet bgs. The area-wide fill generally consists of loose silt, sand, and clay with wood and construction debris, including creosoted railroad ties and old piers. Because of the thick fill layer in the region and the shallow depth to groundwater, shallow groundwater is frequently encountered within the fill deposits. Native soil underlying the fill material consists of stiff to loose silt and fine sand layers with occasional clay and peat layers.

2.2.3 Regional Hydrogeology

Shallow groundwater in the area is first encountered within the fill material at depths between 1 and 20 feet bgs. The saturated thickness of the shallow aquifer is between 20 and 30 feet. Shallow groundwater flows downward from the surrounding hillsides into Salmon Bay, although vertical

movement is limited due to the dense VGT and Lawton Clay confining layers that are located beneath the uppermost water-bearing interval. The general regional groundwater flow direction is toward the south-southwest.

2.2.4 Property Geology

Soils encountered in the borings completed on the Property and adjoining streets consisted of loose to medium dense sand with variable gravel and local stiff silt-rich interbeds to depths of approximately 6 to 9 feet bgs, much of which was interpreted to be fill material. The fill material is underlain by very dense sand to silty sand with variable gravel that extends to the full depth explored of 35 feet bgs. The very dense underlying soils are interpreted to be Quaternary Vashon Till. Geologic cross sections are included in Appendix A.

2.2.5 Property Hydrogeology

The hydrological conditions at the Property are characterized by a shallow unconfined water-bearing zone at depths ranging from 5.7 to 17.7 feet bgs. Groundwater flow directions measured at the site since 2002 are depicted in a rose diagram on Figure 3 and show a predominant south-southwest flow direction. Groundwater elevation contours for December 2014 are shown on Figure 4. A network of monitoring wells (MW01 through MW16) has been installed to monitor groundwater conditions at the site. The monitoring well logs are included in Appendix B. Well construction details are included in Table 1.

2.3 PREVIOUS INVESTIGATIONS

Between 2000 and 2008, a series of remedial excavations and subsurface investigations conducted on the Property and within the adjacent ROWs, as described below. The locations of excavations, soil borings, monitoring wells, and other Property features are shown on Figure 2. The soil and most groundwater analytical results are summarized on Figures 5, 6 and 7 and in Tables 2, 3 and 4. The following is a brief description of the major investigations. Additional details and references are provided the Remedial Investigation Report (SES 2009) and Interim Corrective Action Report (SES 2012).

2.3.1 2001 and 2001 Release Discovery

GeoEngineers conducted a site assessment beneath the former lubrication bay inside the existing building. Two hand auger borings were completed (H1 and H2). Soil and groundwater samples collected from these borings did not have concentrations of diesel- and oil-range petroleum hydrocarbons (DRPH and ORPH, respectively) in excess of the applicable MTCA Method A cleanup levels. However, the sample collected from boring H2 at a depth of 3.5 feet bgs contained a concentration of benzene that exceeded the MTCA Method A cleanup level (Table 2).

In March 2001, GeoEngineers oversaw the removal of a 125-gallon used oil underground storage tank (UST) from the northeast corner of the Property and the hydraulic hoist located in the site building. The soil sample collected from the limits of the hoist excavation (HS-1) did not have concentrations of DRPH or ORPH above cleanup levels. Soil samples N-SS-1 and N-SS-were collected from the limits of the used oil UST excavation. S-SS-1 had concentrations of gasoline-range petroleum hydrocarbons (GRPH) and ORPH above cleanup levels.

2.3.2 2001 and 2002 Subsurface Assessment

In 2001 and early 2002, 11 direct-push soil borings (GP-1 through GP-11), one hollow-stem auger boring (B-1), and the installation of five groundwater monitoring wells (MW01 through MW05) were installed in an effort to evaluate the vertical and lateral extent of petroleum contaminated soil (PCS) and petroleum-contaminated groundwater beneath the Site.

2.3.3 2004 UST Removal and Remedial Excavation

GeoEngineers performed a UST removal and remedial excavation at the Property, which included the removal of a 500-gallon gasoline UST, a 650-gallon gasoline UST, and the associated fuel delivery systems in the southern portion of the Property and an over-excavation of remaining PCS in the vicinity of the former used oil UST. Approximately 1,193 tons of PCS was excavated from the Property. Soil sample collected from the limits of these excavations (S1 through S21) indicated that PCS remained in place near the eastern and western boundaries of the southern excavation and near the northern boundary of the used oil UST excavation. The extent of the southern excavation was limited by the presence of adjoining ROWs.

2.3.4 2004 Groundwater Monitoring and Monitoring Well Installation

In November and December 2004, GeoEngineers installed two monitoring wells (MW01A and MW05A) to replace those that were decommissioned during the remedial excavation and UST removal conducted in 2004.

2.3.5 2005 Groundwater Monitoring and Neighborhood EDC Assessment

In March and June 2005, GeoEngineers continued the groundwater monitoring program and encountered concentrations of 1,2 dichloroethane [or ethylene dichloride (EDC)] that exceeded the cleanup level in groundwater collected from monitoring well MW03, located within the Leary Avenue Northwest ROW to the south of the Property. GeoEngineers subsequently conducted an assessment of possible sources of EDC in the vicinity of the Property. They identified eight potential sources of EDC (e.g., automotive repair facilities, former service station) within a 2-block radius (Figure 8) and 40 potential sources within 0.5 miles of the Property. Evidence cited by GeoEngineers suggests that the EDC contamination is likely a regional issue and is not associated with activities historically conducted at the Property.

2.3.6 2005 Subsurface Investigation

In October 2005, SES conducted a subsurface investigation to assess whether a magnetic anomaly identified beneath the 17th Avenue Northwest ROW was acting as a source of the EDC detected in groundwater beneath the adjacent Leary Avenue Northwest ROW. Six soil borings (P01 through P06, Figure 5) were advanced on the Property and adjoining ROWs during the investigation. Soil samples collected from P01 through P04 contained concentrations of GRPH and/or benzene that exceeded the applicable cleanup levels. Sampled P01 and PO2 were also analyzed for polynuclear aromatic hydrocarbons (PAHs) and none were detected Table 3. Reconnaissance groundwater samples collected from P02 through P05 were found to contain concentrations of GRPH and/or benzene that exceeded the applicable cleanup level. A concentration of DRPH that exceeded the cleanup level was detected in the sample collected from P05. EDC was detected at a concentration exceeding the cleanup level in the reconnaissance groundwater sample collected from boring P06.

2.3.7 2008 Supplemental Subsurface Investigation

In May and September of 2008, SES conducted a subsurface investigation (Borings BO2/MW06, B03/MW07, B04/MW8, B05/MW09, and B06/MW10, Figure 5) and collected groundwater samples to further evaluate the source and extent of GRPH, DRPH, ORPH, EDC, and BTEX in soil and groundwater beneath the adjacent Leary Avenue Northwest and 17th Avenue Northwest ROWs, as well as to investigate the cause of the magnetic anomaly observed within 17th Avenue Northwest. The magnetic anomaly within the ROW of 17th Avenue Northwest was explored by a limited excavation that was approximately 3.5 feet by 3 feet wide at the ground surface and extended to a total depth of approximately 5 feet. Metallic objects or other potential sources of the magnetic anomaly were not encountered in the course of the excavation activities, and no evidence of impacts such as petroleum odors or staining was observed during the excavation.

2.3.8 2009 Supplemental Subsurface Investigation

One soil boring (B07) was advanced on the Property, near the eastern Property boundary in the vicinity of soil samples S10, S13, and S4, where PCS had been left in place following the 2004 UST excavation (Figure 5). Soil boring B07 was completed as a 2-inch-diameter monitoring well (MW11).

2.3.9 Enhanced Fluid Recovery Interim Remediation Action

Between 2010 and 2013, SES conducted enhanced fluid recovery (EFR) events at the Property as part of an interim remedial action. The EFR events were intended to remove residual groundwater contamination and consisted of inserting a stinger hose into a well, sealing the wellhead and applying a vacuum to remove liquids and vapor from the well for a period of more than 6 hours. A total of approximately 110 gallons of liquid was removed from the subsurface during the two events. Three additional EFR events were conducted in July and August 2011, one EFR event in January 2012, and one EFR event in August 2013.

2.3.10 2012 Interim Cleanup Action

Remedial excavation activities were conducted in July and August 2012 (SES 2014, Figure 6). Approximately 214 tons of PCS was removed from the east side of the site and extending into the 17th Avenue Northwest ROW. Wells MW11A and MW15A, located within the excavation area were installed to replace decommissioned wells MW11 and MW15.

2.3.11 2014 Supplement Site Investigation

In December 2014, HydroCon conducted a supplemental site investigation at the site. The investigation consisted of installing seven temporary borings and collecting soil samples (HC-1 through HC-7, Figure 6). The purpose of the investigation was to further evaluate conditions near MW03, a well with historical EDC detections, and to further characterize soil conditions in the area of the 2012 remedial investigation.

Samples were also collected and analyzed for extractable petroleum hydrocarbons (EPH) by Northwest Method NWEPH and volatile petroleum hydrocarbons (VPH) by Northwest Method NWVPH (see Section 4.3).

2.3.12 2014 Utility Survey

Due to the potential for offsite impacts to the Property (see Section 3), and at the request of Ecology, HydroCon reviewed underground utility files at the Seattle Department of Planning and Development, Seattle Public Utilities, and Seattle City Light and contracted a private utility locator. The results of these efforts are shown on Figure 2 where the locations of water, sewer, storm, and gas lines are shown.

3.0 SOURCE EVALUATION

This section discusses historical land use at adjoining properties, the results of an Ecology file review, and existing data and information about the source(s) of petroleum hydrocarbons.

As described in Section 2, on-Property detections of petroleum hydrocarbons in soil and groundwater were confirmed to be associated with historic operations at the Property.

3.1 ADJOINING PROPERTIES

The Property and surrounding parcels are currently zoned for industrial use. The following is a summary of historical land use for adjoining properties presented by SES (2009). The adjoining properties are depicted on Figure 8.

- **North.** The north-adjoining property, located at 4918 Leary Avenue Northwest, is currently occupied by an equipment distributing facility. The 1893 and 1905 Sanborn Fire Insurance Maps indicate that the north-adjoining property was originally occupied by a single-family residence (SES 2009). King County Assessor records indicate that a single story auto sales building was constructed in 1915 and remodeled between 1918 and 1936. Nelson Chevrolet opened in 1922 and operated in this location until at least 1985, when Fuller O'Brian Corp. paint sales occupied the property (SES 2009).
- **West.** Leary Avenue Northwest, a City of Seattle ROW, provides the southwestern property boundary. An 18-inch-diameter sanitary sewer main and a water main are located beneath the Leary Avenue Northwest ROW. The properties on the southwest side of Leary Avenue Northwest were primarily occupied by residential structures or light industrial/warehouse facilities. In addition, the property listed at 4905 Leary Avenue Northwest, is currently occupied by a 1948-vintage service repair garage (Figure 8).
- **East/Southeast.** The eastern Property boundary is provided by 17th Avenue Northwest, a City of Seattle ROW. A 12-inch storm sewer main and a natural gas line are located beneath the 17th Avenue Northwest ROW. The properties on the east side of 17th Avenue Northwest are primarily occupied by residential, retail, and light industrial/warehouse facilities. A retail gasoline station equipped with a single fuel-dispensing pump island and two 550-gallon USTs was constructed at the property listed at 4810 17th Avenue Northwest in 1925 (SES 2009, Appendix A and B), and a retail gasoline station was visible on the property located on what is now the southeast corner of the intersection of 17th Avenue Northwest and Leary Avenue Northwest in the 1950 Sanborn Fire Insurance Map (SES 2009).

3.2 ECOLOGY FILE REVIEW

HydroCon requested copies of Ecology files for the nearby sites shown on Figure 8 and below.

Address	Site Name	Reason for Being Listed with Ecology	Presumed Hydrologic Position Relative to TOC 01-443
4930 Leary Ave. NW	BH Stordahl & Sons, Inc.	Hazardous Waste generator	Side gradient
4905 Leary Ave. NW	Hill Machine, Inc.	Hazardous Waste generator	Side gradient to downgradient
1546 NW Leary Way	Ballard Automotive, Inc.	Hazardous Waste generator	Side gradient
4810 17th Ave. NW	Mike Slattery	Underground Storage Tanks	Side gradient
1807 NW Dock Pl.	Kirsten Pipe Co., Inc.	Hazardous Waste generator	Side gradient to upgradient
1515 NW Leary Way	Ballard Auto Wrecking	Former gas station	Side gradient

The file request resulted in files for two sites: B.H. Stordahl & Sons at 4930 Leary Avenue Northwest and Ballard Auto Wrecking at 1515 Leary Avenue Northwest. The B.H. Stordahl site is located north of the Property, likely near Northwest Dock Place, but the exact location has not been determined. The company provides painting and wall covering for the commercial industry. Paint solvents are used and stored and toluene, acetone used for cleaning painting equipment. The file suggests that B.H. Stordahl operations began at this site in 1999. In 2001, Ecology notified the company that they were no longer required to provide pollution prevention planning documents due to not generating more than 2640 lbs of hazardous waste per year. The file contained no reports of releases.

Ballard Auto Wrecking is located approximately 0.2 miles southwest and hydrologically down gradient of the Property. The site was a former service station and wrecking yard and operations resulted in releases of gasoline, diesel, oil, and lead affecting soil and groundwater. Underground storage tanks (LUST 591693) and 330 tons of soil was removed in 2003. The site was removed from the Hazardous Sites List in 2011.

Based on information provided in the Ecology files, neither of these sites likely contributes to environmental conditions observed at the Property.

3.3 DISTRIBUTION OF PETROLEUM COMPOUNDS

EDC and petroleum contamination encountered in groundwater collected from monitoring wells located within the Leary Avenue Northwest ROW likely originated from an off-Property source(s) as demonstrated by the following observations.

None of the groundwater samples collected from monitoring wells located on or hydrologically upgradient of the Property (MW01A, MW05A, and MW02) contained concentrations of petroleum hydrocarbons, BTEX, or VOCs (including EDC) in excess of the laboratory reporting limits and/or the applicable cleanup level.

EDC has been detected in groundwater in ROW wells in Leary Avenue Northwest, but was not detected in soil samples collected from the Property in 2005, which focused in part on evaluating the distribution of EDC contamination in the southern corner of the site and adjacent ROWs.

GeoEngineers concluded that the EDC detections in groundwater collected from MW03 likely did not originate from the Property and may have been influenced by a leaking sewer line in Leary Avenue Northwest (Figure 2).

GRPH and or benzene were detected in groundwater from borings P01 and P02 and in wells MW09 and MW10 in 2005. Considering the upgradient hydrologic location of these boring and wells relative to the Property, the petroleum-contaminated soil and/or groundwater encountered in these borings does not appear to have resulted from a release at the Property.

These findings clearly demonstrate that the EDC encountered beneath the Leary Avenue Northwest ROW resulted from a release at a downgradient hydrologic position relative to the Property. In addition, the elevated concentrations of petroleum hydrocarbons detected in the groundwater samples collected from monitoring wells MW09 and MW10 and Borings P01 and P02 appear to have originated from a release at the retail gasoline station formerly located to the southeast of the Property at 4810 17th Avenue Northwest.

4.0 STATUS OF CLEANUP ACTIONS

This section provides the status of cleanup actions at the Property that commenced in 2004. Included are discussions of the chemicals and media of concern and cleanup levels, groundwater contamination trends over the course of the remedy, mass removal updates, and recommendations for achieving the final goal of a Site-specific "No Further Action" determination.

4.1 CHEMICALS OF CONCERN

Investigations to date have identified the chemicals of concern (COCs) in soil and groundwater for the Property as GRPH, ORPH, benzene, ethylbenzene, and total xylenes. EDC has been detected in off-Property groundwater, but has not been detected on the Property. Naphthalene has been tested and detected in groundwater on four occasions, and exceeded MTCA Method A cleanup levels in one sample (2009 in MW11).

4.2 CONFIRMED AND SUSPECTED SOURCE AREAS

Investigations to date indicate that elevated GRPH and volatile organic compounds (VOCs) detected in soil and/or groundwater beneath the southern portion of the Property resulted from the release of petroleum hydrocarbons from the former UST system. There may also be contributions from upgradient sources as evidenced by elevated concentrations in groundwater samples from temporary borings in the ROW, particularly P01 and P02. PCS identified in the northern portion of the Property appears to have resulted from the used oil UST that was formerly located adjacent to the east of the building.

4.3 MEDIA OF CONCERN

Based on findings to date, soil, soil vapor, and groundwater are the affected media at the site.

4.3.1 Distribution of Contaminants in Soil

PCS is located around the eastern and western perimeter of the former UST excavation on the southern portion of the Property and may extend a short distance beyond the eastern and western boundaries of the Property. The downgradient extent of PCS resulting from a release at the Property is limited by the apparent absence of shallow PCS in the vicinity of monitoring wells MW03 and MW04. Although concentrations of benzene that slightly exceeded Method A cleanup level were detected in soil collected at depths of 21 and 31 feet bgs in these borings, respectively, none of the soil samples collected from above or below these depths contained detectable concentrations of any COC. Furthermore, the impacted samples were collected 10 to 20 feet below the top of the water table, which suggests that the impacts are related to groundwater and not to soil.

A small volume of PCS remains in the vicinity of the building on the northern portion of the Property. The PCS appears to be limited to a small area beneath the former used oil UST.

Two soil samples collected in December 2014 were submitted for EPH/VPH analysis and evaluated with Ecology's MTCATPH 11.1 workbook (HydroCon 2015). These samples included HC-4-12 and HC-7-12. Sample HC-4-12 returned a Method B direct contact value of 2,994 mg/kg and a groundwater protection value of 109 mg/kg. Sample HC-7-12 returned a Method B direct contact value of 5,242 mg/kg and a groundwater protection value of 249 mg/kg.

As noted in the following section, the soil to groundwater pathway and groundwater to drinking water pathways are incomplete at the site due to the lack of water supply wells in the area and

local regulations. As such, only the direct contact pathway is applicable and applies to soil up to 15 feet deep. Additionally, Sample HC-7-12 was collected near MW03. With the presence of EDC in groundwater at this well, it is very likely that petroleum hydrocarbons in this area are from an off-Property source and the derived Method B cleanup level is not applicable to the Property. As such, the Method B value of 2,994 mg/kg is adopted for the Property.

Method B values for other site soil chemicals of concern were obtained directly from Ecology's Cleanup Levels and Risk Calculation (CLARC) tables using the lowest value of non-carcinogen and carcinogenic CULs and are summarized below:

Method B Cleanup Levels for Soil

Chemical Name	Soil Method B (mg/kg) Direct Contact
Benzene	18
Ethylbenzene	8,000
Naphthalene	1,600
Toluene	6,400
Xylenes	16,000
MTBE	556
EDC	11
EDB	0.5
Total Lead	250[1]
Total Petroleum Hydrocarbons	2,994

[1] No Value for Total Lead is provided in CLARC, the Method A value is adopted.

The locations and analytical results for soil samples with COC exceedances of MTCA Method A cleanup level collected at the site are shown on Figure 5 and 6. Historical soil samples that have been removed by subsequent remedial excavations and samples collected from a depth of greater than 15 feet are identified with an asterisk. As shown in Figure 6, one on-Property sample meets these criteria - samples not removed by remedial excavation, less than 15 feet deep, and exceeding the Method B cleanup levels. This is Sample S21 located on the excavation sidewall of the north (used oil) excavation at a depth of 8 feet. This sample exceeds the Method B cleanup level for ORPH. The sample collected at HC-7 at 12 feet (Figure 5) is the one off-Property sample meeting these criteria and exceeds the Method B cleanup level for GRPH.

4.3.2 Distribution of Contaminants in Groundwater

To be consistent with the Method B approach for soil, groundwater cleanup levels are also Method B values. The Method B values for COC are taken from CLARC (May 2014) and are provided in the following table.

Cleanup Levels for Groundwater

Chemical Name	**Ground Water** Method A (µg/L)	**Ground Water** Method B Non cancer (µg/L)	**Ground Water** Method B Cancer (µg/L)
TPH, diesel range organics	500	--	--
TPH, heavy oils	500	--	--
TPH: gasoline range organics, benzene present	800	--	--
TPH: gasoline range organics, no detectable benzene	1000	--	--
Benzene	5	32	0.795
Ethylbenzene	700	800	--
Toluene	1000	640	--
Xylenes	1000	1600	--
Naphthalene	160	160	--
Methyl tert-butyl ether	20	--	24.3
Ethylene dibromide (EDB)	0.01	72	0.022
Dichloroethane;1,2- (EDC)	5	48	0.481

-- = Not provided in CLARC

CLARC does not provide Method B values for TPH, so the Method A values are adopted. In the case where a carcinogenic value is provided, the carcinogenic value is adopted. Finally, the carcinogenic values are often lower than method detection limits. In those cases, the method detection limit is adopted as the cleanup level.

Groundwater trends plots for site monitoring wells are provided in Appendix C for GRPH and Appendix D for benzene. As shown, there are have been no elevated petroleum hydrocarbons in on-Property wells since the 2012 remedial excavation.

None of the on-Property or near on-Property monitoring wells (MW01A and MW05A, MW11A, MW12, MW13, MW14, and MW15) have contained contain elevated concentrations of COCs since the 2012 remedial excavation (Table 4, Figure 7).

Off-Property wells include Wells MW02, MW03, MW04, MW06, MW07, MW08, MW09, MW10 and MW16. Wells MW02, MW06, MW07 and MW16 have never had elevated concentrations of GRPH or BTEX. EDC has been detected at elevated concentrations at MW03, MW04, and MW08 which are west of the Property in the ROW. Elevated concentrations of GRPH and benzene have been detected in Wells MW09 and MW10, respectively, both of which are located in upgradient locations (Figure 7).

4.4 EXPOSURE ASSESSMENT

The following is a discussion of exposure pathways and receptors for the COCs observed at the site.

4.4.1 Soil-to-Groundwater Pathway

Analytical testing of groundwater samples collected at the Site indicate that contamination of groundwater via soil leaching appears to have occurred in the vicinity of monitoring well MW11. However, as discussed in Section 4.4.5, the Site is not located within 0.5 miles of any water supply wells. While adverse impacts to shallow groundwater in the immediate vicinity of the source area have been confirmed, the potential for adverse impacts to the municipal water supply from contaminants on the Property is low and the pathway is incomplete.

4.4.2 Direct Contact Pathway

Direct contact with soil and groundwater exhibiting concentrations of petroleum hydrocarbons in excess of the cleanup levels is limited to human receptors who come into close contact with the media via direct exposure, including dermal contact or ingestion of excavated soil or groundwater. The standard point of compliance for soil contamination beneath a site is approximately 15 feet bgs, which represents a reasonable estimate of the depth that could be accessed during normal site redevelopment activities (WAC 173-340- 740[6][d]). Although petroleum-contaminated soil and groundwater are present within 15 feet of the ground surface, due to the existing pavement at the Property, contaminated soil and groundwater at the Property are not easily accessed, thereby minimizing the direct contact pathway. However, until such point as the contaminated soil and groundwater are removed from the Site or an institutional control limiting direct contact is implemented, the direct contact pathway appears to be complete.

4.4.3 Vapor Intrusion Pathway

Volatile COCs, inclusive of benzene, have been identified at the Site. Baseline screening levels have been established by Ecology in their draft soil vapor intrusion guidance (Ecology 2009) for the groundwater, soil vapor, and indoor air media, but not the soil medium. The Tier I screening level for benzene in groundwater from this guidance is 2.4 micrograms per liter (µg/L). Utilization of the EPA Online Screening Level Johnson and Ettinger Model indicated that a modeled groundwater concentration of benzene of 5.4 µg/L is protective of indoor air (EPA 2015).

A comparison of the screening levels in the Ecology and EPA sources reveals that the concentrations of benzene in both soil and groundwater beneath the Site exceed one or more of the screening levels. As such, the vapor intrusion exposure pathway is considered to be potentially complete at the Site.

4.4.4 Surface Water

Migration of contaminants via surface water infiltration and leaching to the subsurface is mitigated by the asphalt and concrete that covers the Property and adjacent ROWs. In addition, since there are no ongoing fueling operations at the Property or surface water bodies currently on or adjacent to the Property, there is no potential for human contact with contaminated surface water or for contaminant migration through this medium and the pathway is considered incomplete.

4.4.5 Groundwater/Drinking Water

A review of registered water wells on the Ecology website revealed that the Site is not located within 0.5 miles of any water supply wells (Ecology 2015). Shallow groundwater in the vicinity of the Site, therefore, is not developed as a significant water resource and is not likely to be developed in the future due to the current zoning regulations. Due to the lack of receptors, the groundwater to drinking water pathway is considered incomplete.

5.0 CONCLUSIONS AND RECOMMENDATIONS

This section provides summary conclusions and recommendations for future response actions based on these conclusions.

5.1 CONCLUSIONS

The purpose of this document was to provide adequate data to support a consensus among TOC Holdings Co., their consultant HydroCon Environmental LLC, and Ecology regarding the following issues:

- The MTCA Method B direct contact for soil is an appropriate cleanup approach for the site:
    - There are no water supply wells with 0.5 miles of the site
    - Local regulations prohibit the development of water supply wells
- There is one soil sample not removed by remedial excavation and less than 15 feet deep that exceeds the Method B cleanup level on the Property. One off-Property soil sample also meets these conditions.
- There have been no exceedances of Method B groundwater cleanup levels on the Property since the 2012 remedial excavation. The Laboratory method reporting limit exceeded the Method B cleanup level for benzene in 2012 and 2013. The method reporting limit was below the Method B cleanup level for 3 of the 4 2014 quarterly sampling events.
- There are exceedances of Method B groundwater cleanup levels in off-Property wells. Several factors dictate that off-Property sources are responsible for these exceedances:
    - The affected wells are upgradient or cross gradient to the site.
    - EDC is detected in off-Property wells and has not been detected in on-Property wells.
    - There are several potential sources of off-Property contamination in nearby, upgradient properties.
- Sampling and analytical requirements necessary to confirm that cleanup levels have been attained for the chemicals of concern in the media of concern for the Property.

5.2 REQUEST FOR OPINION

TOC Holdings Co. and HydroCon believe that there is sufficient data both historical and chemical to support a “No Further Action” (NFA) designation at the current time. HydroCon requests Ecology’s opinion on the following issues:

- Use of MTCA Method B cleanup levels is applicable to the site.
- Subsurface conditions at the Site (not including public ROW) comply with MTCA Method B cleanup levels with the exception of one soil sample (B21-8). This sampling location is currently occupied by a restaurant and bar. Based on this, HydroCon requests consideration of a Site-specific NFA with an Environmental Covenant (EC) that will be placed on the title of the

property that informs a prospective purchaser of the presence of soil contamination at the B21-8 sample location.

- The concentration of GRPH and benzene exceed their respective MTCA cleanup level in groundwater at monitoring wells MW03 and MW09 (both are located in Leary Avenue Northeast). The concentration of GRPH in soil sample HC7-12 exceeds the MTCA Method B cleanup level for GRPH (the sample location is in the ROW under 17th Avenue Northwest). Access to these locations is prohibitive due to the heavy traffic patterns located at this area of town. Additionally, based on the historic land use and numerous facilities that either distributed or handled petroleum products (Figure 8), HydroCon requests consideration of a NFA with a Restrictive Covenant (RC).

6.0 BIBLIOGRAPHY

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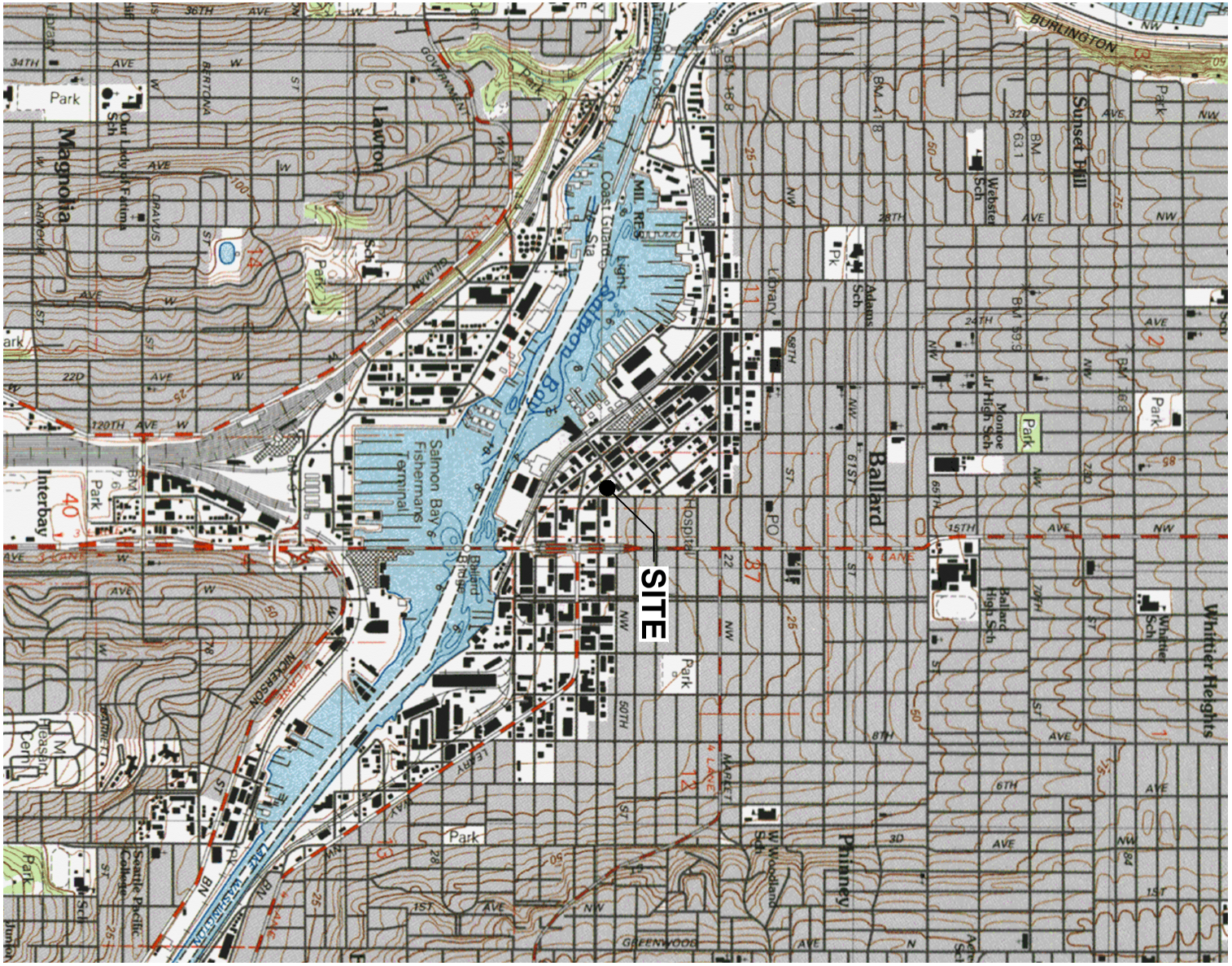
7.0 LIMITATIONS

The findings and conclusions documented in this report were prepared for the specific application to this project and were developed in a manner consistent with that level of care and skill normally exercised by members of the environmental science profession currently practicing under similar conditions in the area. A potential always remains for the presence of unknown, unidentified, or unforeseen subsurface contamination on portions of the property not sampled, such as under buildings. No warranty, expressed or implied, is made. This report is for the exclusive use of TOC Holdings Co. and its representatives.

FIGURES

D:\Client Autocad\Hydrocon-Autocad\01-443_14-806 Seattle\2014\2014QTR04\14-806(01-443)_BM-120814.dwg 2.17.2014

NOTE(S):
USGS, SEATTLE NORTH QUADRANGLE
WASHINGTON
7.5 MINUTE SERIES (TOPOGRAPHIC)



0 2000 4000
SCALE IN FEET
1" = 2000'

HydroCon
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 3-26-15
DWN: JJT
CHK: NV
APPROVED:
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 1
SITE LOCATION MAP

TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

LEGEND

- MW10/B06 — MONITORING WELL
- MW05 — DECOMMISSIONED MONITORING WELL
- E — ELECTRIC LINE
- GAS — GAS LINE
- SS — SANITARY SEWER
- SD — STORMWATER LINE
- COMBINED SEWER/STORMWATER LINE
- W — WATER LINE
- T — TELECOMMUNICATIONS LINE
- OHP — OVERHEAD POWER LINE
- PROPERTY BOUNDARY
- FORMER SITE FEATURE
- FORMER EXCAVATION AREA
- 2012 EXCAVATION AREA
- UST — UNDERGROUND STORAGE TANK
- HC-1 — BORING LOCATIONS HYDROCON 2014)

LEARY AVENUE NORTHWEST

MW06/B02
MW04
HYDRAULIC HOIST EXCAVATION
SHELTER LOUNGE
LUBRICATION BAY
1940s PUMP ISLAND
MW07/B03
MW08/B04
1920s PUMP ISLANDS
MW05
MW05A
HC-3
HC-4
HC-5
MW03
FORMER USTs
1920s PUMP ISLANDS
COVERED PATIO
SUMP
WASTE OIL UST
2009 BUILDING ADDITION
HC-2
MW13/B09
MW12/B08
MW01A
MW11A
MW11/B07
HC-1
MW14/B10
MW01
MW10/B06
MW15/B11
MW15A
HC-6
HC-7
MW16/B12
MW02
MW09/B05
17TH AVENUE NORTHWEST

NOTE:
UNDERGROUND UTILITY LOCATIONS BASED ON 2014 REVIEW OF PUBLIC FILES AND A PRIVATE LOCATOR SERVICE.

N E S W

0 15 30
SCALE IN FEET
1" = 15'

HydroCon
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 1-12-15
DWN: JJT
CHK: NV
APPROVED:
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 2
SITE FEATURES

TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

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LEGEND

- MW10/B06 — MONITORING WELL
- MW05 — DECOMMISSIONED MONITORING WELL
- PROPERTY BOUNDARY
- FORMER SITE FEATURE
- 85.12 — GROUNDWATER SURFACE ELEVATION
- 84 — GROUNDWATER ELEVATION CONTOUR
- APPROXIMATE GROUNDWATER FLOW DIRECTION

LEARY AVENUE NORTHWEST

MW06/B02

MW04
82.40

HYDRAULIC HOIST EXCAVATION

SHELTER LOUNGE

LUBRICATION BAY

1940s PUMP ISLAND

MW08/B04

MW07/B03

1920s PUMP ISLANDS

MW05

MW05A
83.59

1920s PUMP ISLANDS

SUMP

WASTE OIL UST

COVERED PATIO

2009 BUILDING ADDITION

MW03
83.10

FORMER UST

MW13/B09
88.57

MW12/B08
88.60

MW11A
88.61

MW11/B07

MW01A
84.40

MW01

MW14/B10
91.83

MW10/B06

MW15/B11

MW15A
87.05

MW02
85.12

MW16/B12
94.05

MW09/B05

84 86 88 90 92

17TH AVENUE NORTHWEST

N W S E

0 15 30

SCALE IN FEET
1" = 15'

Hydro Con
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 3-4-15
DWN: JJT
CHK: NV
APPROVED: NV
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 3
GREOUNDWATER ELEVATION CONTOURS
FOR DECEMBER 2014
TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

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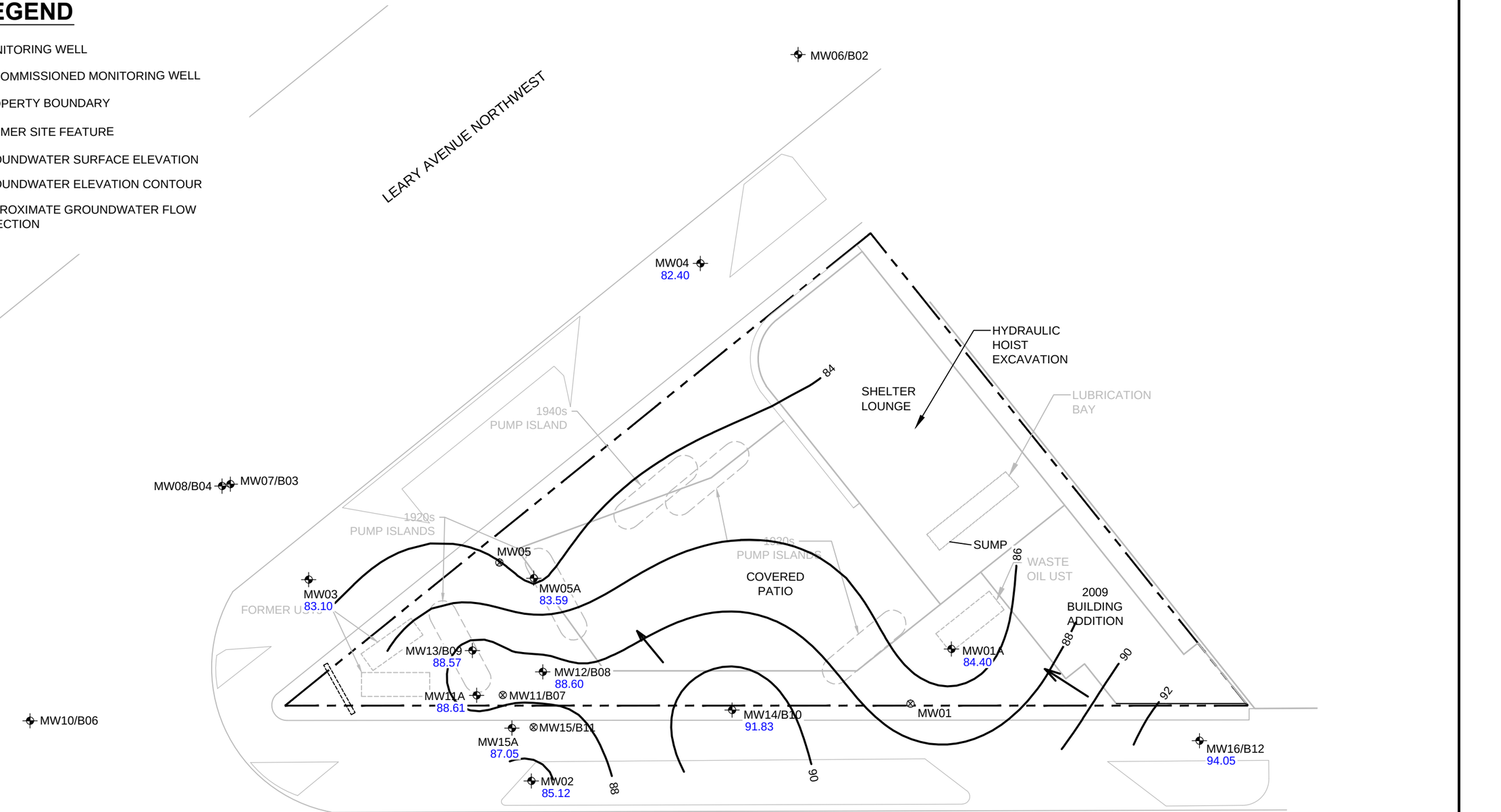
LEGEND

- MW10/B06 — MONITORING WELL
- MW05 — DECOMMISSIONED MONITORING WELL
- PROPERTY BOUNDARY
- FORMER SITE FEATURE
- 85.12 — GROUNDWATER SURFACE ELEVATION
- 84 — GROUNDWATER ELEVATION CONTOUR
- APPROXIMATE GROUNDWATER FLOW DIRECTION



N
W
E
S

0 15 30

SCALE IN FEET
1" = 15'

HydroCon
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

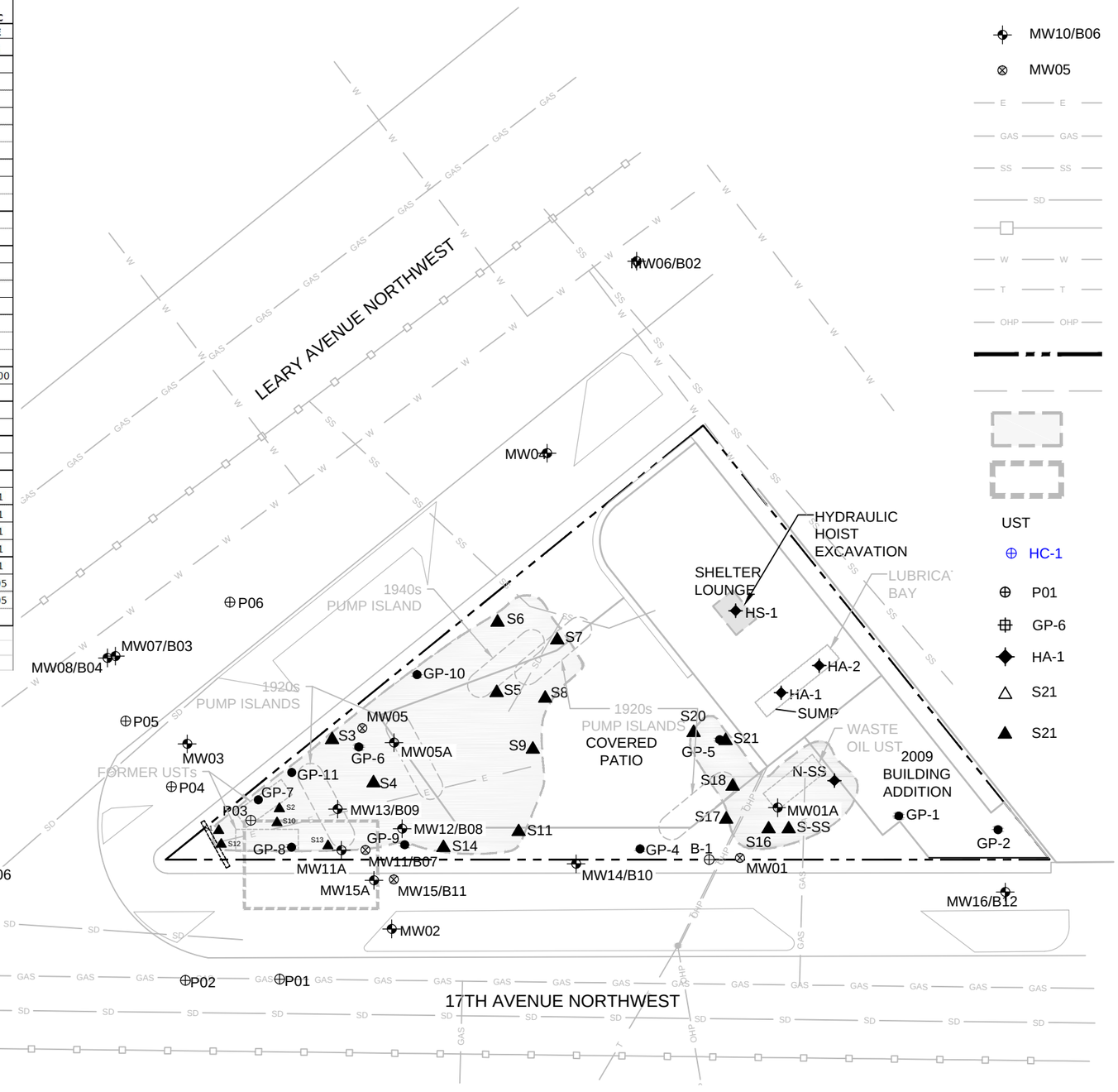
DATE: 3-26-15
DWN: JJT
CHK: NV
APPROVED: NV
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 4
GREOUNDWATER ELEVATION CONTOURS
FOR DECEMBER 2014
TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

D:\Client Autocad\Hydrocon-Autocad\01-443_14-806 Seattle\2014\2014QTR04\14-806(01-443)_BM-030215.dwg 2.17.2014

Location	Date Sampled	Depth (feet bgs)	Analytical Results (mg/kg) DRPH	ORPH	GRPH	Benzene	Toluene	Ethylbenzene	Total Xylenes	EDC
MTCA Method A Cleanup Level			2,000	2,000	100/30	0.03	7	6	9	NE
MTCA Method B Cleanup Level			2,994	2,994	2,994	18	6,400	8,000	16,000	11
S-SS-1 *	3/20/01	6.0	594	2,760	52.0	<0.0500	<0.0500	<0.0500	<0.138	--
GP-5 *	6/19/01	7.0	587	731	204	<0.200	<0.200	<0.200	0.482	--
		9.0	11.5	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--
GP-6 *	6/19/01	4.0	36.3	<25.0	1,100	<1.00	<1.00	1.75	4.93	--
		7.0	111	<33.2	3,100	<2.50	<2.50	7.40	19.9	--
		10.0	17.6	<25.0	28.2	<0.0500	<0.0500	0.200	0.188	--
		11.0	<10.0	<25.0	63.3	<0.0500	0.0996	0.398	0.35	--
GP-7 *	6/19/01	6.0	33.8	<25.0	2,020	<1.00	<1.00	3.51	14.4	--
		9.0	286	<75.0	5,570	2.96	5.36	24.6	60.8	--
GP-8 *	6/19/01	8.0	146	<75.0	2,910	0.921	2.40	10.7	13.3	--
		9.0	59.3	<25.0	3,870	<1.00	2.43	11.6	14.3	--
GP-10 *	6/19/01	9.5	12.4	<25.0	151	<0.200	<0.200	0.418	0.951	--
GP-11 *	6/19/01	7.0	106	37.1	1,770	<1.00	<1.00	2.10	9.39	--
		9.5	<10.0	<25.0	10.4	<0.0500	<0.0500	<0.0500	<0.100	--
B-1	12/10/0	11.0	<10.0	<25.0	57.9	<0.0300	<0.0500	<0.0500	0.206	--
MW03	12/11/0	21.0	<10.0	<25.0	<5.00	0.0377	<0.0500	<0.0500	<0.100	--
MW04	12/12/0	31.0	<10.0	<25.0	<5.00	0.0362	<0.0500	<0.0500	<0.100	--
MW05	12/13/0	21.0	<10.0	<25.0	<5.00	0.0309	<0.0500	<0.0500	<0.100	--
S3	8/3/04	10	33.8	<25.0	180	<0.0300	<0.0500	0.758	0.801	<0.100
S6	8/3/04	10	<10.0	<25.0	672	<0.0600	<0.100	1.53	5.89	--
S7	8/3/04	10	206	<25.0	274	<0.0300	<0.0500	0.369	2.61	--
S12	8/3/04	10	<10.0	<25.0	480	0.0805	0.102	3.32	12	--
S13 *	8/3/04	10	<10.0	<25.0	353	<0.0300	<0.0500	0.407	2.57	--
S14	8/3/04	10	<10.0	<25.0	141	<0.0300	<0.0500	0.152	0.873	--
S21	8/9/04	8	1,870	3,190	339	<0.0300	<0.100	0.116	0.624	--
P01	10/24/0 5	15	<11.7	<27.0	39.8	<0.1	<0.1	0.267	0.929	<0.1
		20	<11.0	<27.6	6.22	0.363	<0.1	<0.1	0.480	<0.1
P02	10/24/0	16	--	--	--	2.00	<0.1	<0.1	<0.3	<0.1
P03	10/25/0	16	<11.2	35.6	118	<0.1	<0.1	1.10	4.30	<0.1
P04	10/26/0	14.5	<10.8	<27.1	7.61	0.348	<0.1	0.407	2.68	<0.1
B06/MW10	5/2/08	13.5	--	--	750[lp]	<0.03	<0.05	<0.05	<0.2	<0.05
B07/MW11 *	1/16/09	10	--	--	91[lp]	<0.03	<0.05	0.15	0.19	<0.05
B11/MW15	4/21/10	8	<50	<250	1,400	<0.02	1.6	14	16	--

BOLD = Value Exceedes Method A
Red = Value exceedes Method B
* = Sample removed by excavation and/or present at a depth of greater than 15 feet.



LEGEND

MW10/B06	MONITORING WELL
MW05	DECOMMISSIONED MONITORING WELL
E E	ELECTRIC LINE
GAS GAS	GAS LINE
SS SS	SANITARY SEWER
SD	STORMWATER LINE
	COMBINED SEWER/STORMWATER LINE
W W	WATER LINE
T T	TELECOMMUNICATIONS LINE
OHP OHP	OVERHEAD POWER LINE
	PROPERTY BOUNDARY
	FORMER SITE FEATURE
	FORMER EXCAVATION AREA
	2012 EXCAVATION AREA
UST	UNDERGROUND STORAGE TANK
HC-1	BORING LOCATIONS HYDROCON 2014)
P01	SOIL BORING (SOUNDEARTH 2005)
GP-6	SOIL BORING (GEI 2002)
HA-1	SOIL BORING (GEI 2001)
S21	EXCAVATION SAMPLE LOCATION (SOUNDEARTH 2012)
S21	EXCAVATION SAMPLE LOCATION (GEI 2004)

N W E S

0 20 40
SCALE IN FEET
1" = 20'

HydroCon
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

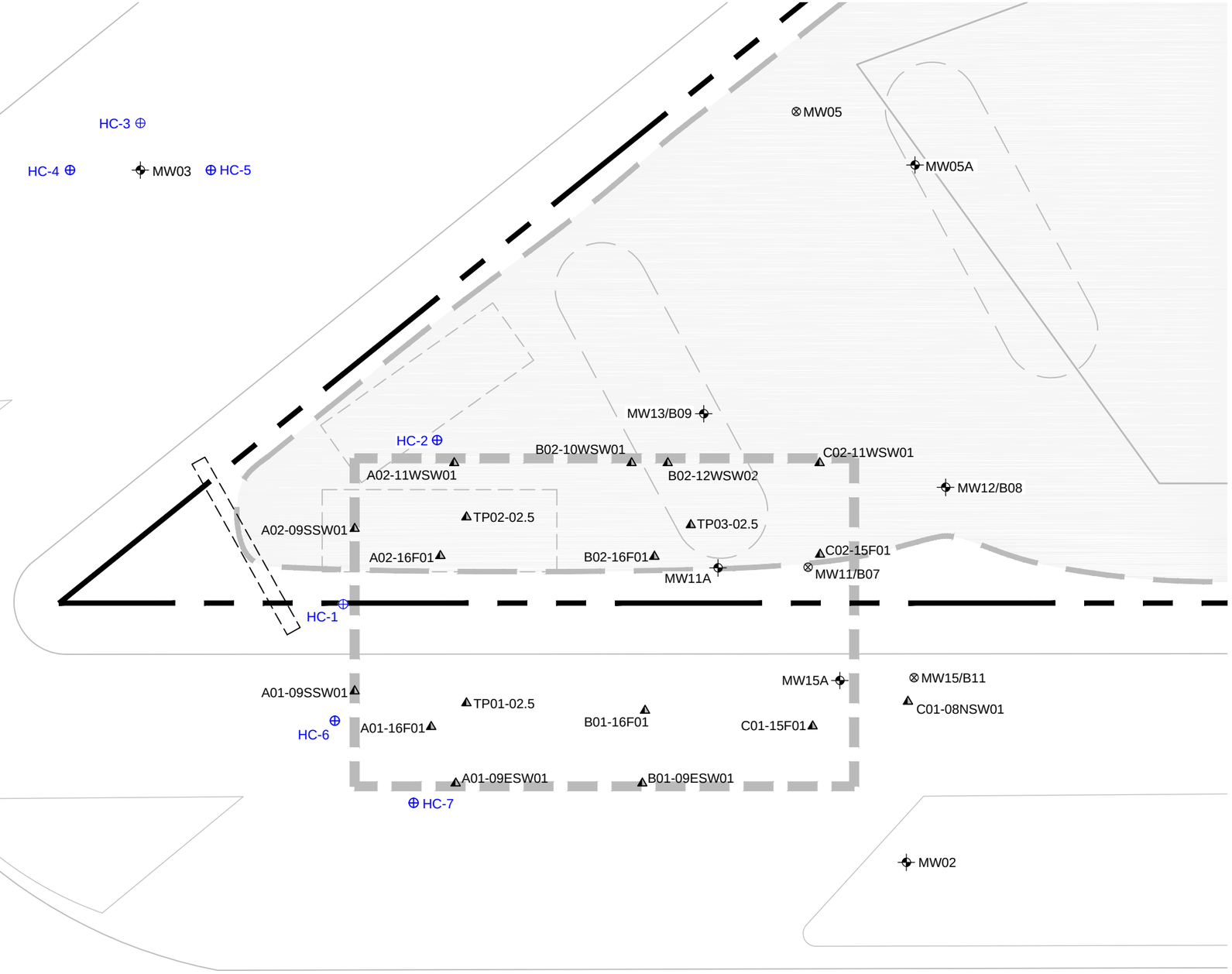
DATE: 4-1-15
DWN: JJT
CHK: NV
APPROVED: NV
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 5
SOIL ANALYTICAL RESULTS
PRE - 2012
TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

D:\Client Autocad\Hydrocon-Autocad\01-443_14-806 Seattle\2014\2014QTR04\14-806(01-443)_BM-033015.dwg 2.17.2014

LEGEND

- MW10/B06 — MONITORING WELL
- MW05 — DECOMMISSIONED MONITORING WELL
- A02-16F01 — 2012 EXCAVATION CONFIRMATOIN SAMPLE
- PROPERTY BOUNDARY
- FORMER SITE FEATURE
- FORMER EXCAVATION AREA
- 2012 EXCAVATION AREA
- HC-1 — BORING LOCATIONS



Location	Date Sampled	Depth (feet bgs)	Analytical Results (mg/kg) GRPH	Benzene	Toluene	Ethylbenzene	Total Xylenes
MTCA Method A Cleanup Level			**100/30**	**0.03**	**7**	**6**	**9**
MTCA Method B Cleanup Level			**2,994**	**18**	**6,400**	**8,000**	**16,000**
TP01-02.5	07/13/12	2.5	<2	<0.02	<0.02	<0.02	<0.06
TP02-02.5	07/13/12	2.5	<2	<0.02	<0.02	<0.02	<0.06
TP03-02.5	07/13/12	2.5	<2	<0.02	<0.02	<0.02	<0.06
A01-09SSW01	08/01/12	9	**1,500**	<0.2	<0.2	**11**	**14**
A01-09ESW01	08/01/12	9	**230**	<0.02	0.071	2	1.3
A01-16F01	08/02/12	16	<2	<0.02	<0.02	0.052	0.23
A02-09SSW01	08/01/12	9	**2,300**	<0.3	<0.5	**28**	**155**
A02-11WSW01	08/01/12	11	**33**	<0.03	<0.05	<0.05	<0.02
A02-16F01	08/02/12	16	2.5	<0.02	<0.02	0.610	0.14
B01-09ESW01	08/01/12	9	<2	<0.03	<0.05	<0.05	<0.02
B01-16F01	08/02/12	16	<2	<0.02	<0.02	0.023	<0.06
B02-10WSW01	08/01/12	10	<2	<0.02	<0.02	<0.02	<0.06
B02-16F01	08/02/12	16	9.7	<0.02	<0.02	0.075	0.12
B02-12WSW02	08/02/12	12	<2	<0.05	<0.02	<0.05	<0.2
C01-08NSW01	08/03/12	8	4.3	<0.03	<0.02	<0.02	<0.06
C01-15F01	08/04/12	15	<2	<0.02	<0.02	0.023	<0.06
C02-11WSW01	08/05/12	11	<2	<0.02	<0.02	<0.02	<0.06
C02-15F01	08/06/12	15	4.7	<0.02	<0.02	0.029	<0.06
HC-1-09	12/03/14	9	**170**	<0.02j	<0.1	**1.5**	**1.3**
HC-3-12	12/03/14	12	**260**	<0.02j	<0.1	**3.5**	**2.4**
HC-4-12	12/03/14	12	**2,300**	<0.2	**<0.2**	**<0.2**	**48**
HC-7-09	12/03/14	9	**230**	<0.02j	<0.1	<0.1	**2.5**
HC-7-12	12/03/14	12	**6,700**	<0.2	<20	**62**	**220**

BOLD = Value Exceedes Method A

Red = Value exceedes Method B

N S E Z

0 15 30

SCALE IN FEET

1" = 15'

HydroCon

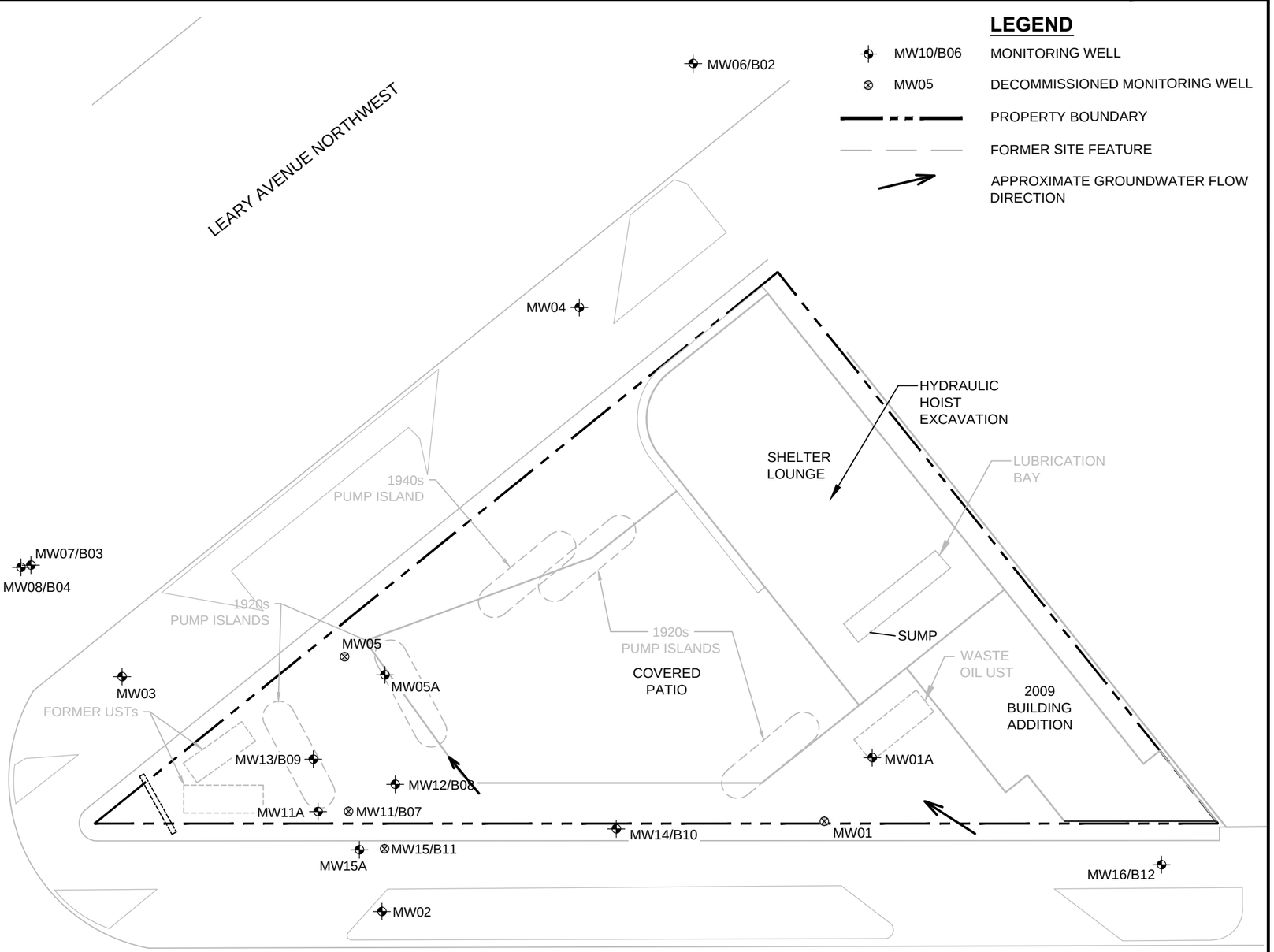
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

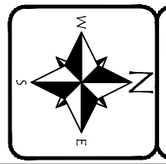
DATE: 4-1-15
DWN: JJT
CHK: RH
APPROVED:
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 6
SOIL ANALYTICAL RESULTS
2012 AND 2014
TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

D:\Client Autocad\Hydrocon-Autocad\01-443_14-806 Seattle\2014\2014QTR04\14-806(01-443)_BM-033015.dwg 2.17.2014

Well ID	Date	Analytical Results (µg/L) GRPH	Benzene	Toluene	Ethylbenzene	Total Xylenes	EDC
MTCA B		**800/1,000**	**0.795**	**640**	**800**	**1,600**	**0.481**
MW01A	02/28/14	<100	<0.35	<1	<1	<3	--
	05/20/14	<100	<1	<1	<1	<3	--
	09/03/14	<100	<0.35	<1	<1	<3	<1
	12/23/14	<100	<0.35	<1	<1	<3	<1
MW02	02/28/14	--	--	--	--	--	--
	05/21/14	--	--	--	--	--	--
	09/02/14	<100	<0.35	<1	<1	<3	<1
	12/22/14	--	--	--	--	--	--
MW03	02/28/14	--	--	--	--	--	--
	05/21/14	--	--	--	--	--	--
	09/04/14	**3,300**	**420**	2.5	55	104.5	<1
	12/22/14	--	--	--	--	--	--
MW04	02/28/14	--	--	--	--	--	--
	05/21/14	--	--	--	--	--	--
	09/04/14	290	<0.35	<1	<1	<3	<1
	12/22/14	--	--	--	--	--	--
MW05A	02/27/14	<100	<0.35	<1	<1	<3	--
	05/20/14	<100	<1	<1	<1	<3	--
	09/02/14	<100	<0.35	<1	<1	<3	<1
	12/22/14	<100	<0.35	<1	<1	<3	<1
MW06	09/04/14	<100	<0.35	<1	<1	<3	<1
MW07	09/05/14	<100	<0.35	<1	<1	<3	<1
MW08	09/05/14	<100	<0.35	<1	<1	<3	**1.4**
MW09	09/05/14	**7,700**	**3.2**	33	430	161	<1
MW10	09/05/14	<100	<0.35	<1	<1	<3	<1
MW11A	02/27/14	<100	<0.35	<1	<1	<3	--
	05/20/14	<100	<1	<1	<1	<3	--
	09/02/14	<100	<0.35	<1	<1	<3	<1
	12/22/14	<100	<0.35	<1	<1	<3	<1
MW12	02/27/14	<100	<0.35	<1	<1	<3	--
	05/20/14	<100	<1	<1	<1	<3	--
	09/02/14	<100	<0.35	<1	<1	<3	<1
	12/22/14	<100	<0.35	<1	<1	<3	<1
MW13	02/27/14	<100	<0.35	<1	<1	<3	--
	05/20/14	<100	<1	<1	<1	<3	--
	09/02/14	<100	<0.35	<1	<1	<3	<1
	12/23/14	<100	<0.35	<1	<1	<3	<1
MW14	02/27/14	<100	<0.35	<1	<1	<3	--
	05/20/14	<100	<1	<1	<1	<3	--
	09/03/14	<100	<0.35	<1	<1	<3	<1
	12/23/14	<100	<0.35	<1	<1	<3	<1
MW15A	02/27/14	<100	<0.35	<1	<1	<3	--
	05/20/14	160	<1	<1	<1	<3	--
	09/03/14	<100	<0.35	<1	<1	<3	<1
	12/23/14	170	<0.35	<1	<1	<3	<1
MW16	02/27/14	<100	<0.35	<1	<1	<3	--
	05/20/14	<100	<1	<1	<1	<3	--
	09/04/14	<100	<0.35	<1	<1	<3	<1
	12/22/14	<100	<0.35	<1	<1	<3	<1





0 15 30

SCALE IN FEET
1" = 15'

Hydro Con
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 3-30-15
DWN: JJT
CHK: NV
APPROVED: NV
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 7
GREOUNDWATER ANALYTICAL RESULTS 2014

TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

D:\Client Autocad\Hydrocon-Autocad\01-443_14-806 Seattle\2014\2014QTR0414-806(01-443)_BM-033015.dwg 2.17.2014

HISTORICAL PROPERTY USE

4917 LEARY AVENUE NORTHWEST

1969	PAINTING SERVICE
1979	GAS STATION
	EQUIPMENT MAINTENANCE
1989 - 1990	NEWSPAPER PRINTING
1996	ELECTRONICS REPAIR

4905 LEARY AVENUE NORTHWEST

1948	VINTAGE SERVICE REPAIR GARAGE
1989 - 1990	AUTOMOTIVE REPAIR
Current	MACHINE SHOP

4918 LEARY AVENUE NORTHWEST

1915 - 1985	AUTO SALES
1985 - ?	PAINT SALES
Current	EQUIPMENT DISTRIBUTING FACILITY

4904 17TH AVENUE NORTHWEST

1905 - 1917	WOOD AND COAL STORAGE YARD
1947 - 2006	AUTO PARTS AND REPAIR

4810 17TH AVENUE NORTHWEST

1975	RETAIL GAS STATION
Current	STORAGE WAREHOUSE

LEGEND

☆ PROPERTY LOCATION

—— - - —— PROPERTY BOUNDARY

SOURCE DRAWINGS PROVIDED BY:
SOUNDEARTH STRATEGIES, INC.

0 20 40
SCALE IN FEET
1" = 20'

Hydro Con
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 3-30-15
DWN: JJT
CHK: NV
APPROVED: NV
PRJ. MGR: CH
PROJECT NO: 14-806

FIGURE 8
HISTORIC LAND USES
GEOLOGIC CROSS SECTIONS
TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

D:\Client Autocad\Hydrocon-Autocad\01-443_14-806 Seattle\2015\TOC Figures\01-443_TOC Figires-030215.dwg 2.17.2014

TABLES

Table 1
Well Construction Details
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue NW
Seattle, Washington

Well ID	Date Installed	Installed By	Drilling Method	Total Boring Depth (feet bgs)	Total Well Depth (feet bgs)	Well Diameter (inch)	Well Construction Material	Screen Slot Size (inch)	Length of Screen (feet)	Screened Interval (feet bgs)	Well Casing Elevation (feet[1])
MW01	Jan-02	GeoEngineers	HSA		35	2	PVC				99.87
MW01A	Nov-04	GeoEngineers	HSA		35	2	PVC		20	15-35	99.64
MW02	Jan-02	GeoEngineers	HSA		35	2	PVC		20	15-35	98.95
MW03	Jan-02	GeoEngineers	HSA		35	2	PVC		20	15-35	98.43
MW04	Jan-02	GeoEngineers	HSA		35	2	PVC		20	15-35	98.22
MW05	Jan-02	GeoEngineers	HSA		36	2	PVC		16	20-36	99.06
MW05A	Nov-04	GeoEngineers	HSA		35	2	PVC				99.11
MW06	05/01/08	SoundEarth	HSA	20	20	2	PVC	0.010	10	10.0 - 20.0	98.42
MW07	05/01/08	SoundEarth	HSA	20	20	2	PVC	0.010	10	10.0 - 20.0	98.26
MW08	05/02/08	SoundEarth	HSA	35	35	2	PVC	0.010	20	15.0 - 35.0	98.18
MW09	05/02/08	SoundEarth	HSA	20	20	2	PVC	0.010	10	10.0 - 20.0	97.87
MW10	05/02/08	SoundEarth	HSA	20	20	2	PVC	0.010	10	10.0 - 20.0	97.94
MW11	01/16/09	SoundEarth	HSA	21	20	2	PVC	0.010	15	5.0 - 20.0	98.78
MW11A	08/30/12	SoundEarth	HSA	20.5	20	2	PVC	0.010	15	5.0 - 20.0	99.12
MW12	04/20/10	SoundEarth	HSA	20.5	20	2	PVC	0.010	15	5.0 - 20.0	99.18
MW13	04/20/10	SoundEarth	HSA	20.5	20	2	PVC	0.010	15	5.0 - 20.0	99.11
MW14	04/20/10	SoundEarth	HSA	20.5	20	2	PVC	0.010	15	5.0 - 20.0	99.58
MW15	04/21/10	SoundEarth	HSA	20.5	20	2	PVC	0.010	15	5.0 - 20.0	99.34
MW15A	08/30/12	SoundEarth	HSA	20.5	20	2	PVC	0.010	15	5.0 - 20.0	99.05
MW16	04/21/10	SoundEarth	HSA	20.5	20	2	PVC	0.010	15	5.0 - 20.0	100.39

NOTES:

feet[1] = Monitoring wells were surveyed using an arbitrary benchmark of 100.00 feet; therefore, elevation is relative to benchmark.

bgs = below ground surface

GeoEngineers = GeoEngineers, Inc.

HSA = hollow-stem auger

PVC = polyvinyl chloride

SoundEarth = SoundEarth Strategies, Inc.

Table 2
Summary of Soil Analytical Results
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington

Soil Sample Location	Soil Sample Identification	Sample Removed by Remedial Excavation (Y/N)	Soil Sample Description	Date Sampled	Sampled by	Depth (feet bgs)	Analytical Results (mg/kg)											
							DRPH[1]	ORPH[1]	GRPH[2]	Benzene[3]	Toluene[3]	Ethylbenzene[3]	Total Xylenes[3]	MTBE[3]	EDC[3]	EDB[3]	PCBs (Total Aroclors)[4]	Total Lead[5]
MTCA Method B Cleanup Level[6]							**2,994**	**2,994**	**2994**	**18**	**6400**	**8000**	**16000**	**556**	**11**	**0.5**	**1[b]**	**250[b]**
HA-1	HA-1-1.5	Y	Hand-Auger Boring	12/20/00	GeoEngineers	1.5	**85.4**	**131**	--	--	--	--	--	--	--	--	--	--
HA-2	HA-2-1.5	Y	Hand-Auger Boring	12/20/00	GeoEngineers	1.5	**34.5**	**46**	--	--	--	--	--	--	--	--	--	--
	HA-2-3.5	Y				3.5	<10.0	<25.0	--	--	--	--	--	--	--	--	--	--
N-SS-1	N-SS-1	Y	North Ex-Base	03/20/01	GeoEngineers	6.0	**28.2**	**111**	<50.0	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	ND	3.68
S-SS-1	S-SS-1	Y	South Ex-Base	03/20/01	GeoEngineers	6.0	**594**	**2,760**	**52.0**	<0.0500	<0.0500	<0.0500	<0.138	--	--	--	ND	3.7
TXSP-1	TXSP-1	Y	Stockpile Sample	03/20/01	GeoEngineers	--	**116**	**543**	<50	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	ND	171
HS-1	HS-1	Y	Hoist Ex-Base	03/20/01	GeoEngineers	8.0	<10.0	<25.0	--	--	--	--	--	--	--	--	--	--
HSP-1	HSP-1	Y	Hoist Stockpile	03/20/01	GeoEngineers	--	**368**	**2,120**	<5.0	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	ND	167
GP-1	GP-1	N	Geoprobe Boring	06/19/01	GeoEngineers	9.0	**21**	**11**	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
GP-2	GP-2	N	Geoprobe Boring	06/19/01	GeoEngineers	8.5	<10.0	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
GP-3	GP-3		Geoprobe Boring	06/19/01	GeoEngineers	8.0	<10.0	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
	GP-3					11.0	<10.0	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
GP-4	GP-4	N	Geoprobe Boring	06/19/01	GeoEngineers	8.0	**11.9**	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
GP-5	GP-5		Geoprobe Boring	06/19/01	GeoEngineers	7.0	**587**	**731**	**204**	<0.200	<0.200	<0.200	**0.482**	--	--	--	--	--
	GP-5					9.0	**11.5**	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
GP-6	GP-6	Y	Geoprobe Boring	06/19/01	GeoEngineers	4.0	**36.3**	<25.0	**1,100**	<1.00	<1.00	1.75	4.93	--	--	--	--	--
	GP-6	Y				7.0	**111**	<33.2	**3,100**	<2.50	<2.50	**7.40**	**19.9**	--	--	--	--	--
	GP-6	Y				10.0	**17.6**	<25.0	28.2	<0.0500	<0.0500	**0.200**	**0.188**	--	--	--	--	--
	GP-6	Y				11.0	<10.0	<25.0	**63.3**	<0.0500	0.0996	**0.398**	**0.35**	--	--	--	--	--
GP-7	GP-7	Y	Geoprobe Boring	06/19/01	GeoEngineers	6.0	**33.8**	<25.0	**2,020**	<1.00	<1.00	**3.51**	**14.4**	--	--	--	--	--
	GP-7	Y				9.0	**286**	<75.0	**5,570**	**2.96**	**5.36**	**24.6**	**60.8**	--	--	--	--	--
GP-8	GP-8	Y	Geoprobe Boring	06/19/01	GeoEngineers	8.0	**146**	<75.0	**2,910**	**0.921**	**2.40**	**10.7**	**13.3**	--	--	--	--	--
	GP-8	Y				9.0	**59.3**	<25.0	**3,870**	<1.00	**2.43**	**11.6**	**14.3**	--	--	--	--	--
GP-9	GP-9		Geoprobe Boring	06/19/01	GeoEngineers	10.0	<10.0	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
	GP-9					11.0	<10.0	<25.0	<5.00	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
GP-10	GP-10	Y	Geoprobe Boring	06/19/01	GeoEngineers	9.5	**12.4**	<25.0	**151**	<0.200	<0.200	0.418	0.951	--	--	--	--	--
GP-11	GP-11	Y	Geoprobe Boring	06/19/01	GeoEngineers	7.0	**106**	**37.1**	**1,770**	<1.00	<1.00	**2.10**	**9.39**	--	--	--	--	--
	GP-11	Y				9.5	<10.0	<25.0	**10.4**	<0.0500	<0.0500	<0.0500	<0.100	--	--	--	--	--
B-1	B-1-6.0	N	Hollow-Stem Auger Boring	12/10/01	GeoEngineers	6.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	B-1-11.0	N				11.0	<10.0	<25.0	**57.9**	<0.0300	<0.0500	<0.0500	**0.206**	--	--	--	--	--
	B-1-16.0	N				16.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	B-1-21.0	N				21.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	B-1-26.0	N				26.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
MW01	MW-1-31.0	N	Hollow-Stem Auger Boring	12/10/01	GeoEngineers	31.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-1-35.5	N				35.5	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--

Table 2
Summary of Soil Analytical Results
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington

Soil Sample Location	Soil Sample Identification	Sample Removed by Remedial Excavation (Y/N)	Soil Sample Description	Date Sampled	Sampled by	Depth (feet bgs)	Analytical Results (mg/kg)											
							DRPH[1]	ORPH[1]	GRPH[2]	Benzene[3]	Toluene[3]	Ethylbenzene[3]	Total Xylenes[3]	MTBE[3]	EDC[3]	EDB[3]	PCBs (Total Aroclors)[4]	Total Lead[5]
MW02	MW-2-5.0	N	Hollow-Stem Auger Boring	12/10/01	GeoEngineers	5.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-2-10.5	N				10.5	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-2-18.5	N				18.5	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-2-21.0	N				21.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-2-26.0	N				26.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-2-31.0	N				31.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-2-36.0	N				36.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
MW03	MW-3-6.0	N	Hollow-Stem Auger Boring	12/11/01	GeoEngineers	6.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-3-13.0	N				13.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-3-15.5	N				15.5	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-3-21.0	N				21.0	<10.0	<25.0	<5.00	**0.0377**	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-3-25.5	N				25.5	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-3-31.0	N				31.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-3-36.0	N				36.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
MW04	MW-4-6.0	N	Hollow-Stem Auger Boring	12/11/01	GeoEngineers	6.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-4-11.0	N				11.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-4-16.0	N				16.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-4-21.0	N				21.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-4-26.0	N				26.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-4-31.0	N				31.0	<10.0	<25.0	<5.00	**0.0362**	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-4-36.0	N				36.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
MW05	MW-5-6.0	Y	Hollow-Stem Auger Boring	12/11/01	GeoEngineers	6.0	**10.2**	**46.9**	**5.01**	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-5-15.0	Y				15.0	<10.0	<25.0	**9.35**	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-5-21.0	Y				21.0	<10.0	<25.0	<5.00	**0.0309**	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-5-26.0	Y				26.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-5-31.0	Y				31.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
	MW-5-36.0	Y				36.0	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S3	S-3-10'	N	South Ex-West Sidewall	08/03/04	GeoEngineers	10	**33.8**	<25.0	**180**	<0.0300	<0.0500	**0.758**	**0.801**	--	<0.100	<0.100	--	--
S4	S-4-14'	N	South Ex-Base	08/03/04	GeoEngineers	14	<10.0	<25.0	**5.81**	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S5	S-5-14'	N	South Ex-Base	08/03/04	GeoEngineers	14	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S6	S-6-10'	N	South Ex-NW Sidewall	08/03/04	GeoEngineers	10	<10.0	<25.0	**672**	<0.0600	<0.100	**1.53**	**5.89**	--	--	--	--	--
S7	S-7-10'	N	South Ex-North Sidewall	08/03/04	GeoEngineers	10	**206**	<25.0	**274**	<0.0300	<0.0500	**0.369**	**2.61**	--	--	--	--	--
S8	S-8-10'	N	South Ex-North Sidewall	08/03/04	GeoEngineers	10	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S9	S-9-10'	N	South Ex-North Sidewall	08/03/04	GeoEngineers	10	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--

Table 2
Summary of Soil Analytical Results
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington

Soil Sample Location	Soil Sample Identification	Sample Removed by Remedial Excavation (Y/N)	Soil Sample Description	Date Sampled	Sampled by	Depth (feet bgs)	Analytical Results (mg/kg)											
							DRPH[1]	ORPH[1]	GRPH[2]	Benzene[3]	Toluene[3]	Ethylbenzene[3]	Total Xylenes[3]	MTBE[3]	EDC[3]	EDB[3]	PCBs (Total Aroclors)[4]	Total Lead[5]
S10	S-10-14'	N	South Ex-Base	08/03/04	GeoEngineers	14	<10.0	<25.0	<5.00	<0.0300	<0.0500	**0.064**	<0.100	--	--	--	--	--
S11	S-11-10'	N	South Ex-North Sidewall	08/03/04	GeoEngineers	10	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S12	S-12-10'	N	South Ex-South Sidewall	08/03/04	GeoEngineers	10	<10.0	<25.0	**480**	**0.0805**	0.102	**3.32**	**12**	--	--	--	--	--
S13	S-13-10'	Y	South Ex-East Sidewall	08/03/04	GeoEngineers	10	<10.0	<25.0	**353**	<0.0300	<0.0500	**0.407**	**2.57**	--	--	--	--	--
S14	S-14-10'	N	South Ex-East Sidewall	08/03/04	GeoEngineers	10	<10.0	<25.0	**141**	<0.0300	<0.0500	**0.152**	**0.873**	--	--	--	--	--
S16	S-16-6'	N	North Ex-East Sidewall	08/09/04	GeoEngineers	6	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S17	S-17-6'	N	North Ex-South Sidewall	08/09/04	GeoEngineers	6	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S18	S-18-10'	N	North Ex-Base	08/09/04	GeoEngineers	10	**72.7**	**111**	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S20	S-20-8.5'	N	North Ex-West Sidewall	08/09/04	GeoEngineers	8.5	<10.0	<25.0	<5.00	<0.0300	<0.0500	<0.0500	<0.100	--	--	--	--	--
S21	S-21-8'	N	North Ex-North Sidewall	08/09/04	GeoEngineers	8	1,870	**3,190**	**339**	<0.0300	<0.100	**0.116**	**0.624**	--	--	--	--	--
P01	P-1-7	N	Direct-Push Boring	10/24/05	SoundEarth	7	<11.3	<28.3	<6.86	<0.1	<0.1	<0.1	<0.3	--	<0.1	<0.1	ND	12.4
	P-1-9.5	N				9.5	--	--	--	<0.1	<0.1	<0.1	<0.3	--	<0.1	<0.1	--	--
	P-1-11	N				11	--	--	--	--	--	--	--	<0.63	--	--	--	--
	P-1-15	N				15	<11.7	<27.0	**39.8**	<0.1	<0.1	**0.267**	**0.929**	--	<0.1	<0.1	ND	1.83
	P-1-20	N				20	<11.0	<27.6	6.22	**0.363**	<0.1	<0.1	**0.480**	--	<0.1	<0.1	ND	1.24
P02	P-2-6	N	Direct-Push Boring	10/24/05	SoundEarth	6	<11.3	<28.2	<4.91	<0.1	<0.1	<0.1	<0.3	<0.47	<0.1	<0.1	--	12.9
	P-2-9	N				9	<10.8	<27.0	<6.08	<0.1	<0.1	<0.1	<0.3	--	<0.1	<0.1	ND	1.84
	P-2-12	N				12	<10.9	<27.2	<6.24	<0.1	<0.1	<0.1	<0.3	<0.61	<0.1	<0.1	--	1.39
	P-2-16	N				16	--	--	--	**2.00**	<0.1	<0.1	<0.3	--	<0.1	<0.1	--	--
P03	P-3-7	Y	Direct-Push Boring	10/24/05	SoundEarth	7	<12.0	<30.1	<6.10	<0.1	<0.1	<0.1	<0.3	<0.60	<0.1	<0.1	--	2.08
	P-3-14	Y				14	--	--	--	<0.1	<0.1	**0.546**	**1.51**	--	<0.1	<0.1	--	
	P-3-16	Y				16	<11.2	**35.6**	**118**	<0.1	<0.1	**1.10**	**4.30**	<0.49	<0.1	<0.1	--	1.65
P04	P-4-8		Direct-Push Boring	10/25/05	SoundEarth	8	<10.9	<27.2	<5.89	<0.1	<0.1	<0.1	<0.3	<0.67	<0.1	<0.1	--	1.4
	P-4-10					10	<10.9	<27.2	**5.91**	<0.1	<0.1	<0.1	<0.3	<0.58	<0.1	<0.1	--	
	P-4-14.5					14.5	<10.8	<27.1	**7.61**	**0.348**	<0.1	**0.407**	**2.68**	<0.72	<0.1	<0.1	--	1.42
P05	P-5-11	N	Direct-Push Boring	10/25/05	SoundEarth	11	--	--	<5.94	<0.1	<0.1	<0.1	<0.3	<0.59	<0.1	<0.1	--	--
	P-5-13	N				13	--	--	<4.97	<0.1	<0.1	<0.1	<0.3	<0.52	<0.1	<0.1	--	--
	P-5-15.5	N				15.5	--	--	<5.11	<0.1	<0.1	<0.1	<0.3	<0.49	<0.1	<0.1	--	--
P06	P-6-11	N	Direct-Push Boring	10/25/05	SoundEarth	11	--	--	<5.26	<0.1	<0.1	<0.1	<0.3	<0.51	<0.1	<0.1	--	--
	P-6-16	N				16	--	--	<5.56	<0.1	<0.1	<0.1	<0.3	--	<0.1	<0.1	--	--
B02/MW06	B02-11	N	Hollow-Stem Auger Boring	05/01/08	SoundEarth	11	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	2.80
	B02-16	N				13	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	—
B03/MW07	B03-11	N	Hollow-Stem Auger Boring	05/01/08	SoundEarth	11	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	—
	B03-16	N				16	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	1.71
B04/MW08	B04-11	N	Hollow-Stem Auger Boring	05/02/08	SoundEarth	11	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	--
	B04-21	N				21	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	--
	B04-31	N				31	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	--

Table 2
Summary of Soil Analytical Results
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington

Soil Sample Location	Soil Sample Identification	Sample Removed by Remedial Excavation (Y/N)	Soil Sample Description	Date Sampled	Sampled by	Depth (feet bgs)	Analytical Results (mg/kg)											
							DRPH[1]	ORPH[1]	GRPH[2]	Benzene[3]	Toluene[3]	Ethylbenzene[3]	Total Xylenes[3]	MTBE[3]	EDC[3]	EDB[3]	PCBs (Total Aroclors)[4]	Total Lead[5]
B05/MW09	B05-08	N	Hollow-Stem Auger Boring	05/02/08	SoundEarth	8	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	—
	B05-11	N				11	<50.0	<250	**3**	<0.03	<0.05	0.091	<0.2	<0.05	<0.05	<0.05	--	1.68
	B05-20	N				20	--	--	<2	<0.03	<0.05	**0.11**	**0.25**	<0.05	<0.05	<0.05	--	—
B06/MW10	B06-11	N	Hollow-Stem Auger Boring	05/02/08	SoundEarth	11	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	—
	B06-13.5	N				13.5	--	--	**750**[ip]	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	1.32
	B06-20	N				20	--	--	<2	<0.03	<0.05	<0.05	<0.2	<0.05	<0.05	<0.05	--	—
B07/MW11	B07-05	Y	Hollow-Stem Auger Boring	01/16/09	SoundEarth	5	--	--	<2	<0.03	<0.05	<0.05	<0.2	--	<0.05	<0.05	--	--
	B07-10	Y				10	--	--	**91**[ip]	<0.03	<0.05	**0.15**	**0.19**	--	<0.05	<0.05	--	--
	B07-15	Y				15	--	--	**4**	<0.03	<0.05	<0.05	**0.11**	--	<0.05	<0.05	--	--
B08/MW12	B08-10	N	Hollow-Stem Auger Boring	04/20/10	SoundEarth	10	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B08-12.5	N				12.5	<50	<250	3	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B08-15	N				15	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
B09/MW13	B09-09	N	Hollow-Stem Auger Boring	04/20/10	SoundEarth	9	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B09-11	N				11	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B09-12.5	N				12.5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
B10/MW14	B10-07.5	N	Hollow-Stem Auger Boring	04/20/10	SoundEarth	7.5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B10-12.5	N				12.5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
B11/MW15	B11-05	Y	Hollow-Stem Auger Boring	04/21/10	SoundEarth	5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B11-08	Y				8	<50	<250	**1,400**	<0.02	**1.6**	**14**	**16**	--	--	--	--	--
	B11-12.5	Y				12.5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
B12/MW16	B12-08	N	Hollow-Stem Auger Boring	04/21/10	SoundEarth	8	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B12-10	N				10	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
TP01	TP01-02.5	Y	Test Pit	07/31/12	SoundEarth	2.5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
TP02	TP02-02.5	Y	Test Pit	07/31/12	SoundEarth	2.5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
TP03	TP03-02.5	Y	Test Pit	07/31/12	SoundEarth	2.5	<50	<250	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--

Table 2
Summary of Soil Analytical Results
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington

Soil Sample Location	Soil Sample Identification	Sample Removed by Remedial Excavation (Y/N)	Soil Sample Description	Date Sampled	Sampled by	Depth (feet bgs)	Analytical Results (mg/kg)											
							DRPH[1]	ORPH[1]	GRPH[2]	Benzene[3]	Toluene[3]	Ethylbenzene[3]	Total Xylenes[3]	MTBE[3]	EDC[3]	EDB[3]	PCBs (Total Aroclors)[4]	Total Lead[5]
A01	A01-09SSW01	N	Grid	08/01/12	SoundEarth	9	--	--	**1,500**	**<0.2**	**<0.2**	**11**	**14**	<0.5	<0.5	<0.5	--	--
	A01-09ESW01	N		08/01/12		9	--	--	**230**	<0.02	0.071	2.0	1.3	--	--	--	--	--
	A01-16F01	N		08/02/12		16	--	--	<2	<0.02	<0.02	**0.052**	**0.23**	--	--	--	--	--
A02	A02-09SSW01	N	Grid	08/01/12	SoundEarth	9	--	--	**2,300**	**<0.3**	**<0.5**	**28**	**154.5**	<0.5	<0.5	<0.5	--	--
	A02-11WSW01	N		08/01/12		11	--	--	**33**	<0.03	<0.05	<0.05	<0.15	<0.05	<0.05	<0.05	--	--
	A02-16F01	N		08/02/12		16	--	--	**2.5**	<0.02	<0.02	**0.061**	**0.14**	--	--	--	--	--
B01	B01-09ESW01	N	Grid	08/01/12	SoundEarth	9	--	--	<2	<0.03	<0.05	<0.05	<0.15	<0.05	<0.05	<0.05	--	--
	B01-16F01	N		08/02/12		16	--	--	<2	<0.02	<0.02	0.023	<0.06	--	--	--	--	--
B02	B02-10WSW01	N	Grid	08/01/12	SoundEarth	10	--	--	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	B02-16F01	N		08/02/12		16	--	--	**9.7**	<0.02	<0.02	**0.075**	**0.12**	--	--	--	--	--
	B02-12WSW02	N		08/02/12		12	--	--	<2	<0.03	<0.05	<0.05	<0.15	<0.05	<0.05	<0.05	--	--
C01	C01-08NSW01	N	Grid	08/03/12	SoundEarth	8	--	--	**4.3**	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	C01-15F01	N		08/03/12		15	--	--	<2	<0.02	<0.02	0.023	<0.06	--	--	--	--	--
C02	C02-11WSW01	N	Grid	08/03/12	SoundEarth	11	--	--	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	C02-15F01	N		08/03/12		15	--	--	**4.7**	<0.02	<0.02	0.029	<0.06	--	--	--	--	--
HC-1	HC-1-09	N	Direct Push Boring	12/03/14	HydroCon	9	--	--	**170**	<0.02j	<0.1	**1.5**	**1.3**	--	--	--	--	--
HC-2	HC-2-11	N	Direct Push Boring	12/03/14	HydroCon	11	--	--	**2.2**	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
HC-3	HC-3-10	N	Direct Push Boring	12/03/14	HydroCon	10	--	--	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	HC-3-12			12/03/14		12	--	--	**260**	<0.02j	<0.1	**3.5**	**2.4**	--	--	--	--	--
	HC-3-15			12/03/14		15	--	--	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
HC-4	HC-4-05	N	Direct Push Boring	12/03/14	HydroCon	5	--	--	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	HC-4-12			12/03/14		12	--	--	**2300**	<0.2	<0.2	<0.2	**48**	--	--	--	--	--
	HC-4-15			12/03/14		15	--	--	**2.5**	<0.02	<0.02	**0.03**	**0.082**	--	--	--	--	--
HC-5	HC-5-5	N	Direct Push Boring	12/03/14	HydroCon	5	--	--	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	HC-5-12			12/03/14		12	--	--	**<2**	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
HC-6	HC-6-09	N	Direct Push Boring	12/03/14	HydroCon	9	--	--	<2	<0.02	<0.02	<0.02	<0.06	--	--	--	--	--
	HC-6-12			12/03/14		12	--	--	**4.9**	<0.02	<0.02	0.25	0.63	--	--	--	--	--
HC-7	HC-7-09	N	Direct Push Boring	12/03/14	HydroCon	9	--	--	**230**	<0.02j	<0.1	<0.1	**2.5**	--	--	--	--	--
	HC-7-12			12/03/14		12	--	--	**6700**	<0.2	<20	**62**	**220**	--	--	--	--	--

NOTES:

Samples collected after October 24, 2005, analyzed by North Creek Analytical, Inc. of Bothell, Washington, or Friedman & Bruya, Inc. of Seattle, Washington.

Red denotes concentration in excess of MTCA Method B Cleanup Level for Soil.

Bold denotes a detection above method reporting limits.

[1]Analyzed by Method NWTPH-Dx.

[2]Analyzed by Method NWTPH-Gx.

[3]Analyzed by EPA Method 8021B or 8260B.

[4]Analyzed by EPA Method 8082.

[5]Analyzed by EPA 6000/7000 Series Methods.

[6] TPH Derived from EPH/VPH analysis is Sanple HC-4-12 using Ecology's MTCATPH 11.1 workbook. Method B values for other site soil chemicals of concern were obtained directly from Ecology's Cleanup Levels and Risk Calculation (CLARC) tables using the lowest value of non-carcinogen and carcinogenic CULs.

-- = not analyzed/not measured

< = not detected at a concentration above the laboratory reporting limit

bgs = below ground surface

CLARC = Cleanup Levels and Risk Calculations

DRPH = diesel-range petroleum hydrocarbons

EDB = ethylene dibromide

EDC = ethylene dichloride

EPA = U.S. Environmental Protection Agency

Ex = excavation

GeoEngineers = GeoEngineers, Inc.

GRPH = gasoline-range petroleum hydrocarbons

mg/kg = milligrams per kilogram

MTBE = methyl tertiary-butyl ether

MTCA = Washington State Model Toxics Control Act

ND = not detected

NWTPH = Northwest Total Petroleum Hydrocarbon

ORPH = oil-range petroleum hydrocarbons

PBC = polychlorinated biphenyl

SoundEarth = SoundEarth Strategies, Inc.

WAC = Washington Administrative Code

Laboratory Note:

[ip]Exceeds verification standard. Reported result is an estimate.

Table 3
Summary of Soil Analytical Results for PAHs/cPAHs
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington

				Analytical Results (milligrams per kilogram)											**Toxicity Equivalency**[1] (milligrams per kilogram)							
Sample Location	**Sample ID**	**Date Sampled**	**Depth** (feet bgs)	**Naphthalene**	**1-Methylnaphthalene**	**2-Methylnaphthalene**	**Acenaphthene**	**Acenaphthylene**	**Fluorene**	**Phenanthrene**	**Anthracene**	**Fluoranthene**	**Pyrene**	**Benzo(g,h,i)perylene**	**Benzo(a) anthracene TEF 0.1**	**Chrysene TEF 0.01**	**Benzo(a)pyrene TEF 1**	**Benzo(b) fluoranthene TEF 0.1**	**Benzo(k) fluoranthene TEF 0.1**	**Indeno(1,2,3-cd)pyrene TEF 0.1**	**Dibenz(a,h) anthracene TEF 0.1**	**Total TEQ Soil Concentration**[1]
P01	P-1-7	10/24/05	7	<0.0115	<0.0115	<0.0115	<0.0115	<0.0115	<0.0115	<0.0115	<0.0115	<0.0115	<0.0115	<0.0115	< 0.0115	< 0.0115	< 0.0115	< 0.0115	< 0.0115	< 0.0115	0.0241	0.01052
	P-1-15		15	0.0327	0.0125	0.0183	<0.0117	<0.0117	<0.0117	<0.0117	<0.0117	<0.0117	<0.0117	<0.0117	< 0.0117	< 0.0117	< 0.0117	< 0.0117	< 0.0117	< 0.0117	< 0.0117	0.00883
	P-1-20		20	<0.0109	<0.0109	<0.0109	<0.0109	<0.0109	<0.0109	<0.0109	<0.0109	<0.0109	<0.0109	<0.0109	< 0.0109	< 0.0109	< 0.0109	< 0.0109	< 0.0109	< 0.0109	< 0.0109	0.00823
P02	P-2-9	10/24/05	9	<0.0108	<0.0108	<0.0108	<0.0108	<0.0108	<0.0108	<0.0108	<0.0108	<0.0108	<0.0108	<0.0108	< 0.0108	< 0.0108	< 0.0108	< 0.0108	< 0.0108	< 0.0108	< 0.0108	0.00815
MTCA Method B Cleanup Level for Soil				**1600**[b]	**34**[a]	**320**[b]	**4,800**[b]	**NE**	**3,200**[b]	**NE**	**24,000**[b]	**3,200**[b]	**2,400**[b]	**NE**	**0.1**[a]							**0.1**

NOTES:

Red denotes concentration exceeds MTCA cleanup level.

Samples analyzed by GC/MS-SIM.

[1]Analytical result for each individual cPAH is multiplied by the TEF and all seven cPAH values are added. When analytical results are reported as less than the LRL, half of the LRL is used for the calculation, as shown.

[a]MTCA Cleanup Regulation, Chapter 173-340 of WAC, CLARC, Soil, Method B, Carcinogen, Standard Formula Value, CLARC Website <https://fortress.wa.gov/ecy/clarc/CLARCHome.aspx>.

[b]MTCA Cleanup Regulation, Chapter 173-340 of WAC, CLARC, Soil, Method B, Non-Carcinogen, Standard Formula Value, CLARC Website <https://fortress.wa.gov/ecy/clarc/CLARCHome.aspx>.

< = not detected at a concentration exceeding the laboratory reporting limit
bgs = below ground surface
CLARC = Cleanup Levels and Risk Calculations
cPAH = carcinogenic polycyclic aromatic hydrocarbon
FW = Foster Wheeler Environmental Corporation
LRL = laboratory reporting limit
MTCA = Washington State Model Toxics Control Act
NE = not established
PAH = polycyclic aromatic hydrocarbon
TEF = toxicity equivalency factor
TEQ = toxicity equivalent
WAC = Washington Administrative Code

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW01	99.87	12/11/01	10.39	--	89.48	--	--	--	--	--	--	--	--	--
MW01	99.87	01/08/02	9.86	--	90.01	<50.0	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW01	99.87	05/29/02	10.75	--	89.12	<50.0	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW01	99.87	09/10/02	11.50	--	88.37	<50.0	<1.00	<1.00	<1.00	<2.00	<1.00	--	--	--
MW01	99.87	12/06/02	16.63	--	83.24	<50.0	<0.200	<0.200	<0.200	<0.500	<0.200	--	--	--
MW01	99.87	03/26/03	10.90	--	88.97	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW01	99.87	06/20/03	11.18	--	88.69	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW01	99.87	09/16/03	12.13	--	87.74	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW01	99.87	12/22/03	11.11	--	88.76	<50.0	1.65	<0.500	<0.500	<1.00	<0.200	--	--	--
MW01	99.87	03/19/04	10.58	--	89.29	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW01	99.87	06/28/04	10.88	--	88.99	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW01	99.87	Monitoring Well Decommissioned in 2004												
MW01A	99.64	12/27/04	10.06	--	89.58	<50	<1	<1	<1	<3	<0.01	--	--	--
MW01A	99.64	03/22/05	10.41	--	89.23	<50.0	<1	<1	<1	<3	<0.02	--	--	--
MW01A	99.64	06/29/05	11.04	--	88.60	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW01A	99.64	03/15/07	11.03	--	88.61	<100	<1	<1	<1	<3	<1	--	<50	<250
MW01A	99.64	09/21/07	12.61	--	87.03	<100	<1	<1	<1	<3	<1	--	<51	<260
MW01A	99.64	01/15/08	11.91	--	87.73	<100	<1	<1	<1	<3	<1	--	<50	<250
MW01A	99.64	09/23/08	11.92	--	87.72	<100	<1	<1	<1	<3	<1	--	<50	<250
MW01A	99.64	02/09/09	11.21	--	88.43	<100	<1	<1	<1	<3	<1	<1	<50	<250
MW01A	99.64	05/21/09	10.37	--	89.27	<100	<1	<1	<1	<3	<1	<1	--	--
MW01A	99.64	09/17/09	12.30	--	87.34	<100	<1	<1	<1	<3	<1	<1	<50	<250
MW01A	99.64	12/23/09	10.35	--	89.29	<100	<1	<1	<1	<3	<1	<1	<50	<250
MW01A	99.64	03/18/10	10.62	--	89.02	<100	<1	<1	<1	<3	<1	--	63[x]	<250
MW01A	99.64	06/29/10	10.84	--	88.80	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	10/14/10	11.21	--	88.43	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	12/10/10	10.63	--	89.01	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	03/03/11	10.58	--	89.06	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	05/31/11	10.55	--	89.09	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	08/29/11	11.73	--	87.91	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	12/21/11	14.57	--	85.07	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	03/22/12	15.35	--	84.29	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	06/13/12	15.71	--	83.93	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	09/06/12	16.71	--	82.93	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	12/03/12	16.12	--	83.52	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	02/12/13	15.28	--	84.36	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	05/21/13	15.64	--	84.00	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	08/14/13	16.53	--	83.11	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	12/17/13	17.11	--	82.53	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	02/28/14	16.45	--	83.19	<100	<0.35	<1	<1	<3	--	--	--	--
MW01A	99.64	05/20/14	15.40	--	84.24	<100	<1	<1	<1	<3	--	--	--	--
MW01A	99.64	09/03/14	16.8	--	82.8	<100	<0.35	<1	<1	<3	<1	--	--	--
MW01A	99.64	12/23/14	15.24	--	84.4	<100	<0.35	<1	<1	<3	<1	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW02	98.95	01/08/02	9.83	--	89.12	<50.0	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW02	98.95	05/29/02	9.50	--	89.45	<50.0	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW02	98.95	09/10/02	10.30	--	88.65	<50.0	<1.00	<1.00	<1.00	<2.00	<1.00	--	--	--
MW02	98.95	12/06/02	11.25	--	87.70	<50.0	<0.200	<0.200	<0.200	<0.500	<0.200	--	--	--
MW02	98.95	03/26/03	9.92	--	89.03	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	06/20/03	10.80	--	88.15	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	09/16/03	11.70	--	87.25	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	12/22/03	10.69	--	88.26	<50.0	0.628	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	03/19/04	10.30	--	88.65	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	06/28/04	10.78	--	88.17	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	11/08/04	10.37	--	88.58	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	12/27/04	9.97	--	88.98	<50.0	<1	<1	<1	<3	<0.01	--	--	--
MW02	98.95	03/22/05	10.38	--	88.57	<50.0	<1	<1	<1	<3	<0.02	--	--	--
MW02	98.95	06/29/05	10.21	--	88.74	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW02	98.95	03/15/07	11.76	--	87.19	<100	<1	<1	<1	<3	<1	--	<50	<250
MW02	98.95	09/21/07	11.73	--	87.22	<100	<1	<1	<1	<3	<1	--	<52	<260
MW02	98.95	01/15/08	10.64	--	88.31	<100	<1	<1	<1	<3	<1	--	<50	<250
MW02	98.95	09/23/08	11.62	--	87.33	<100	<1	<1	<1	<3	<1	--	<50	<250
MW02	98.95	02/09/09	10.98	--	87.97	--	--	--	--	--	--	--	--	--
MW02	98.95	05/21/09	10.16	--	88.79	--	--	--	--	--	--	--	--	--
MW02	98.95	09/17/09	12.04	--	86.91	--	--	--	--	--	--	--	--	--
MW02	98.95	12/23/09	10.55	--	88.40	--	--	--	--	--	--	--	--	--
MW02	98.95	03/18/10	10.40	--	88.55	--	--	--	--	--	--	--	--	--
MW02	98.95	06/29/10	10.56	--	88.39	--	--	--	--	--	--	--	--	--
MW02	98.95	10/14/10	10.90	--	88.05	--	--	--	--	--	--	--	--	--
MW02	98.95	12/10/10	10.30	--	88.65	--	--	--	--	--	--	--	--	--
MW02	98.95	03/03/11	10.36	--	88.59	--	--	--	--	--	--	--	--	--
MW02	98.95	05/31/11	Inaccessible	--	--	--	--	--	--	--	--	--	--	--
MW02	98.95	08/29/11	11.56	--	87.39	--	--	--	--	--	--	--	--	--
MW02	98.95	12/21/11	13.73	--	85.22	--	--	--	--	--	--	--	--	--
MW02	98.95	03/22/12	14.28	--	84.67	--	--	--	--	--	--	--	--	--
MW02	98.95	06/13/12	14.83	--	84.12	--	--	--	--	--	--	--	--	--
MW02	98.95	09/06/12	16.01	--	82.94	--	--	--	--	--	--	--	--	--
MW02	98.95	12/03/12	13.84	--	85.11	--	--	--	--	--	--	--	--	--
MW02	98.95	02/12/13	14.12	--	84.83	--	--	--	--	--	--	--	--	--
MW02	98.95	05/20/13	14.58	--	84.37	--	--	--	--	--	--	--	--	--
MW02	98.95	08/13/13	15.64	--	83.31	--	--	--	--	--	--	--	--	--
MW02	98.95	12/17/13	16.14	--	82.81	--	--	--	--	--	--	--	--	--
MW02	98.95	02/28/14	14.81	--	84.14	--	--	--	--	--	--	--	--	--
MW02	98.95	05/21/14	14.07	--	84.88	--	--	--	--	--	--	--	--	--
MW02	98.95	09/02/14	16.04	--	82.9	<100	<0.35	<1	<1	<3	<1	--	--	--
MW02	98.95	12/22/14	13.83	--	85.1	--	--	--	--	--	--	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW03	98.43	12/11/01	9.49	--	88.94	--	--	--	--	--	--	--	--	--
MW03	98.43	01/08/02	9.33	--	89.10	<50.0	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW03	98.43	05/29/02	10.07	--	88.36	<50.0	<0.500	<0.500	<0.500	<1.00	**46.4**	--	--	--
MW03	98.43	09/10/02	11.08	--	87.35	<50.0	<2.00	<2.00	<2.00	<4.00	**50.6**	--	--	--
MW03	98.43	12/06/02	12.16	--	86.27	<50.0	<1.00	<1.00	<1.00	<2.00	**36.5**	--	--	--
MW03	98.43	03/26/03	9.58	--	88.85	<50.0	<0.500	<0.500	<0.500	<1.00	**44.8**	--	--	--
MW03	98.43	06/20/03	10.83	--	87.60	<50.0	<0.500	<0.500	<0.500	<1.00	**41.4**	--	--	--
MW03	98.43	09/16/03	11.83	--	86.60	<50.0	<0.500	<0.500	<0.500	<1.00	**39.8**	--	--	--
MW03	98.43	12/22/03	10.29	--	88.14	<50.0	<0.500	<0.500	<0.500	<1.00	**32.2**	--	--	--
MW03	98.43	03/19/04	10.57	--	87.86	<50.0	<0.500	<0.500	<0.500	<1.00	**45.8**	--	--	--
MW03	98.43	06/28/04	10.69	--	87.74	<50.0	<0.500	<0.500	<0.500	<1.00	**37.8**	--	--	--
MW03	98.43	11/08/04	10.83	--	87.60	<50.0	<0.500	<0.500	<0.500	<1.00	**41.8**	--	--	--
MW03	98.43	12/27/04	9.92	--	88.51	<50.0	<1	<1	<1	<3	**41**	--	--	--
MW03	98.43	03/22/05	10.35	--	88.08	<50.0	<1	<1	<1	<3	**44**	--	--	--
MW03	98.43	06/29/05	10.34	--	88.09	<50.0	**0.889**	<0.500	<0.500	<1.00	**33.9**	--	--	--
MW03	98.43	03/15/07	11.09	--	87.34	190	**1.5**	<1	<1	<3	**30**	--	210	<250
MW03	98.43	09/21/07	11.66	--	86.77	110	<1	<1	<1	<3	**33**	--	180	<260
MW03	98.43	01/15/08	10.71	--	87.72	<100	<1	<1	<1	<3	**23**	--	120	<250
MW03	98.43	09/23/08	12.25	--	86.18	<100	<1	<1	<1	<3	**24**	--	180	<250
MW03	98.43	02/09/09	10.92	--	87.51	--	--	--	--	--	--	--	--	--
MW03	98.43	05/21/09	10.15	--	88.28	--	--	--	--	--	--	--	--	--
MW03	98.43	09/17/09	12.07	--	86.36	--	--	--	--	--	--	--	--	--
MW03	98.43	12/23/09	10.58	--	87.85	--	--	--	--	--	--	--	--	--
MW03	98.43	03/18/10	10.40	--	88.03	--	--	--	--	--	--	--	--	--
MW03	98.43	06/29/10	10.55	--	87.88	--	--	--	--	--	--	--	--	--
MW03	98.43	10/14/10	10.99	--	87.44	--	--	--	--	--	--	--	--	--
MW03	98.43	12/10/10	10.40	--	88.03	--	--	--	--	--	--	--	--	--
MW03	98.43	03/03/11	10.37	--	88.06	--	--	--	--	--	--	--	--	--
MW03	98.43	05/31/11	10.37	--	88.06	--	--	--	--	--	--	--	--	--
MW03	98.43	08/29/11	11.66	--	86.77	--	--	--	--	--	--	--	--	--
MW03	98.43	12/21/11	14.62	--	83.81	--	--	--	--	--	--	--	--	--
MW03	98.43	03/23/12	15.52	--	82.91	--	--	--	--	--	--	--	--	--
MW03	98.43	06/13/12	15.95	--	82.48	--	--	--	--	--	--	--	--	--
MW03	98.43	09/07/12	17.14	--	81.29	**3,700**	**140**	4.6	80	64	--	--	--	--
MW03	98.43	12/03/12	15.60	--	82.83	--	--	--	--	--	--	--	--	--
MW03	98.43	02/12/13	15.50	0.02	82.95	**SPH**	--	--	--	--	--	--		
MW03	98.43	05/20/13	15.94	--	82.49	--	--	--	--	--	--	--	--	--
MW03	98.43	08/13/13	16.75	--	81.68	--	--	--	--	--	--	--	--	--
MW03	98.43	12/17/13	NM	--	--	--	--	--	--	--	--	--	--	--
MW03	98.43	02/28/14	16.35	--	82.08	--	--	--	--	--	--	--	--	--
MW03	98.43	05/21/14	15.30	--	83.13	--	--	--	--	--	--	--	--	--
MW03	98.43	09/04/14	17.11	--	81.3	**3,300**	**420**	2.5	55	104.5	<1	--	--	--
MW03	98.43	12/22/14	15.33	--	83.1	--	--	--	--	--	--	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW04	98.22	12/11/01	9.20	--	89.02	--	--	--	--	--	--	--	--	--
MW04	98.22	01/08/02	8.75	--	89.47	<50.0	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW04	98.22	05/29/02	9.57	--	88.65	<50.0	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW04	98.22	09/10/02	10.60	--	87.62	<50.0	<1.00	<1.00	<1.00	<2.00	**3.19**	--	--	--
MW04	98.22	12/06/02	10.90	--	87.32	<50.0	<0.200	<0.200	<0.200	<0.500	**4.42**	--	--	--
MW04	98.22	03/26/03	8.91	--	89.31	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW04	98.22	06/20/03	9.95	--	88.27	<50.0	<0.500	<0.500	<0.500	<1.00	**3.73**	--	--	--
MW04	98.22	09/16/03	10.90	--	87.32	<50.0	<0.500	<0.500	<0.500	<1.00	**3.78**	--	--	--
MW04	98.22	12/22/03	9.30	--	88.92	<50.0	<0.500	<0.500	<0.500	<1.00	<0.200	--	--	--
MW04	98.22	03/19/04	9.58	--	88.64	<50.0	<0.500	<0.500	<0.500	<1.00	**3.01**	--	--	--
MW04	98.22	06/28/04	9.90	--	88.32	<50.0	<0.500	<0.500	<0.500	<1.00	**3.06**	--	--	--
MW04	98.22	11/08/04	9.85	--	88.37	<50.0	<0.500	<0.500	<0.500	<1.00	**3.46**	--	--	--
MW04	98.22	12/27/04	9.43	--	88.79	<50.0	<1	<1	<1	<3	**4**	--	--	--
MW04	98.22	03/22/05	10.34	--	87.88	<50.0	<1	<1	<1	<3	**3.5**	--	--	--
MW04	98.22	06/29/05	9.64	--	88.58	<50.0	<0.500	<0.500	<0.500	<1.00	**2.65**	--	--	--
MW04	98.22	03/15/07	9.95	--	88.27	<100	<1	<1	<1	<3	**4.8**	--	130	<250
MW04	98.22	09/21/07	11.43	--	86.79	<100	<1	<1	<1	<3	**11**	--	82	<260
MW04	98.22	01/15/08	10.71	--	87.51	<100	<1	<1	<1	<3	**9.7**	--	<50	<250
MW04	98.22	09/23/08	11.49	--	86.73	<100	<1	<1	<1	<3	**14**	--	68	<250
MW04	98.22	02/09/09	10.71	--	87.51	--	--	--	--	--	--	--	--	--
MW04	98.22	05/21/09	9.85	--	88.37	--	--	--	--	--	--	--	--	--
MW04	98.22	09/17/09	11.85	--	86.37	--	--	--	--	--	--	--	--	--
MW04	98.22	12/23/09	10.34	--	87.88	--	--	--	--	--	--	--	--	--
MW04	98.22	03/18/10	10.04	--	88.18	--	--	--	--	--	--	--	--	--
MW04	98.22	06/29/10	10.27	--	87.95	--	--	--	--	--	--	--	--	--
MW04	98.22	10/14/10	10.77	--	87.45	--	--	--	--	--	--	--	--	--
MW04	98.22	12/10/10	10.18	--	88.04	--	--	--	--	--	--	--	--	--
MW04	98.22	03/03/11	10.04	--	88.18	--	--	--	--	--	--	--	--	--
MW04	98.22	05/31/11	10.02	--	88.20	--	--	--	--	--	--	--	--	--
MW04	98.22	08/29/11	11.30	--	86.92	--	--	--	--	--	--	--	--	--
MW04	98.22	12/21/11	14.65	--	83.57	--	--	--	--	--	--	--	--	--
MW04	98.22	03/22/12	15.69	--	82.53	--	--	--	--	--	--	--	--	--
MW04	98.22	06/13/12	16.17	--	82.05	--	--	--	--	--	--	--	--	--
MW04	98.22	09/06/12	17.32	--	80.90	--	--	--	--	--	--	--	--	--
MW04	98.22	12/03/12	16.17	--	82.05	--	--	--	--	--	--	--	--	--
MW04	98.22	02/12/13	15.81	--	82.41	--	--	--	--	--	--	--	--	--
MW04	98.22	05/20/13	16.14	--	82.08	--	--	--	--	--	--	--	--	--
MW04	98.22	08/13/13	16.95	--	81.27	--	--	--	--	--	--	--	--	--
MW04	98.22	12/17/13	17.66	--	80.56	--	--	--	--	--	--	--	--	--
MW04	98.22	02/28/14	16.92	--	81.30	--	--	--	--	--	--	--	--	--
MW04	98.22	05/21/14	15.71	--	82.51	--	--	--	--	--	--	--	--	--
MW04	98.22	09/04/14	17.37	--	80.9	290	<0.35	<1	<1	<3	<1	--	--	--
MW04	98.22	12/22/14	15.82	--	82.4	--	--	--	--	--	--	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000**[8, 9]	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500**[9]	**500**[9]
MW05	99.06	12/11/01	--	--	--	--	--	--	--	--	--	--	--	--
MW05	99.06	01/08/02	9.36	--	89.70	91.4	<0.500	<0.500	<0.500	<1.00	--	--	--	--
MW05	99.06	05/29/02	10.18	--	88.88	398	**3.98**	0.770	7.32	2.90	--	--	--	--
MW05	99.06	09/10/02	11.11	--	87.95	594	**7.42**	26.0	1.94	33.01	<1.00	--	--	--
MW05	99.06	12/06/02	11.39	--	87.67	503	**2.88**	<1.00	4.60	<2.00	<1.00	--	--	--
MW05	99.06	03/26/03	9.51	--	89.55	**1,010**	**8.57**	1.79	20.3	4.08	<1.00	--	--	--
MW05	99.06	06/20/03	10.50	--	88.56	741	**10.1**	2.41	23.8	5.92	0.460	--	--	--
MW05	99.06	09/16/03	11.35	--	87.71	**1,340**	**13.6**	3.31	48.2	8.89	<0.200	--	--	--
MW05	99.06	12/22/03	9.79	--	89.27	**2,090**	**23.7**	7.34	66.6	21.8	<0.200	--	--	--
MW05	99.06	03/19/04	10.04	--	89.02	**1,550**	**15.1**	4.62	33.7	12.9	0.520	--	--	--
MW05	99.06	06/28/04	10.40	--	88.66	**2,960**	**24.2**	9.32	91.7	27.7	<0.200	--	--	--
MW05	99.06	Monitoring Well Decommissioned in 2004												
MW05A	99.11	12/27/04	10.13	--	88.98	<50.0	<1	<1	<1	<3	0.30	--	--	--
MW05A	99.11	03/22/05	11.31	--	87.80	<50.0	<1	<1	<1	<3	0.38	--	--	--
MW05A	99.11	06/29/05	10.47	--	88.64	<50.0	**3.86**	<0.500	<0.500	<1.00	0.51	--	--	--
MW05A	99.11	03/15/07	10.56	--	88.55	<100	<1	<1	<1	<3	<1	--	92	<250
MW05A	99.11	09/21/07	12.03	--	87.08	<100	<1	<1	<1	<3	<1	--	53	<260
MW05A	99.11	01/15/08	11.05	--	88.06	<100	<1	<1	<1	<3	<1	--	<50	<250
MW05A	99.11	09/23/08	12.06	--	87.05	<100	<1	<1	<1	<3	<1	--	58	<250
MW05A	99.11	02/09/09	11.32	--	87.79	<100	<1	<1	<1	<3	<1	<1	<50	<250
MW05A	99.11	05/11/09	10.51	--	88.60	<100	<1	<1	<1	<3	<1	<1	--	--
MW05A	99.11	09/17/09	12.43	--	86.68	<100	<1	<1	<1	<3	<1	<1	71	<250
MW05A	99.11	12/23/09	10.92	--	88.19	<100	<1	<1	<1	<3	<1	<1	<50	<250
MW05A	99.11	03/18/10	10.74	--	88.37	<100	<1	<1	<1	<3	<1	--	110[x]	<250
MW05A	99.11	06/29/10	10.90	--	88.21	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	10/14/10	11.35	--	87.76	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	12/10/10	10.71	--	88.40	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	03/03/11	10.71	--	88.40	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	06/01/11	10.71	--	88.40	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	08/29/11	11.96	--	87.15	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	12/21/11	14.82	--	84.29	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	03/22/12	15.73	--	83.38	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	06/13/12	16.19	--	82.92	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	09/06/12	17.38	--	81.73	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	12/03/12	15.70	--	83.41	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	02/12/13	13.66	--	85.45	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	05/20/13	16.09	--	83.02	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	08/13/13	17.01	--	82.10	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	12/17/13	17.54	--	81.57	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	02/27/14	16.5	--	82.61	<100	<0.35	<1	<1	<3	--	--	--	--
MW05A	99.11	05/20/14	15.58	--	83.53	<100	<1	<1	<1	<3	--	--	--	--
MW05A	99.11	09/02/14	17.4	--	81.7	<100	<0.35	<1	<1	<3	<1	--	--	--
MW05A	99.11	12/22/14	15.52	--	83.6	<100	<0.35	<1	<1	<3	<1	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW06	98.42	09/23/08	13.20	--	85.22	<100	<1	<1	<1	<3	<1	--	420	360
MW06	98.42	02/09/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW06	98.42	05/11/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW06	98.42	09/17/09	13.51	--	84.91	--	--	--	--	--	--	--	--	--
MW06	98.42	09/04/14	15.93	--	82.5	<100	<0.35	<1	<1	<3	<1	--	--	--
MW07	98.26	09/23/08	12.30	--	85.96	<100	<1	<1	<1	<3	<1	--	<50	<250
MW07	98.26	02/09/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW07	98.26	05/11/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW07	98.26	09/17/09	12.74	--	85.52	--	--	--	--	--	--	--	--	--
MW07	98.26	09/05/14	16.4	--	81.9	<100	<0.35	<1	<1	<3	<1	--	--	--
MW08	98.18	09/23/08	12.23	--	85.95	<100	<1	<1	<1	<3	**13**	--	72	<250
MW08	98.18	02/09/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW08	98.18	05/11/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW08	98.18	09/17/09	12.69	--	85.49	--	--	--	--	--	--	--	--	--
MW08	98.18	09/05/14	16.62	--	81.6	<100	<0.35	<1	<1	<3	1.4	--	--	--
MW09	97.87	09/23/08	11.85	--	86.02	**8,700**	**12**	96	540	381	<1	--	**2,000[X]**	<250
MW09	97.87	02/09/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW09	97.87	05/11/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW09	97.87	09/17/09	12.37	--	85.50	--	--	--	--	--	--	--	--	--
MW09	97.87	09/05/14	12.61	--	85.3	**7,700**	**3.2**	33	430	161	<1	--	--	--
MW10	97.94	09/23/08	12.34	--	85.60	<100	**5.7**	<1	<1	<3	1.1	--	<50	<250
MW10	97.94	02/09/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW10	97.94	05/11/09	Inaccessible		--	--	--	--	--	--	--	--	--	--
MW10	97.94	09/17/09	12.91	--	85.03	--	--	--	--	--	--	--	--	--
MW10	97.94	09/05/14	14.26	--	83.7	<100	<0.35	<1	<1	<3	<1	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW11	98.78	02/09/09	10.90	--	87.88	**15,000**	**27**	90	600	**1,930**	<1	**420**	**3,700[x]**	<250
MW11	98.78	05/11/09	10.37	--	88.41	**14,000**	**13**	79	740	**2,350**	<10	**580**	--	--
MW11	98.78	10/14/10	10.29	--	88.49	**4,800**	1.8	11	120	470	--	--	--	--
MW11	98.78	12/10/10	9.63	--	89.15	**1,600**	1.8	1.1	9.9	91	--	--	--	--
MW11	98.78	03/03/11	9.82	--	88.96	**1,900**	<1	1.8	29	79	--	--	--	--
MW11	98.78	06/01/11	9.73	--	89.05	720	<0.35	1.4	39	50	--	18	--	--
MW11	98.78	08/29/11	11.10	--	87.68	**930**	0.64	2.0	12	43	--	26	--	--
MW11	98.78	12/22/11	11.09	--	87.69	**8,900**	<0.35	4.6	210	575	--	**340**	--	--
MW11	98.78	03/22/12	12.46	0.09	86.39	**SPH**								
MW11	98.78	06/13/12	13.32	0.46	85.83	**SPH**								
MW11	98.78	09/17/09[b]	13.24	0.54	85.97	**SPH**								
MW11	98.78	12/23/09[b]	10.31	0.20	88.63	**SPH**								
MW11	98.78	3/18/10[b]	10.13	0.17	88.79	**SPH**								
MW11	98.78	6/29/10[b]	10.02	0.11	88.85	**SPH**								
MW11	98.78	Monitoring Well Decommissioned in 2012												
MW11A	99.12	09/07/12	16.19	--	82.93	670	<0.35	<1	<1	<3	--	4.6	--	--
MW11A	99.12	12/03/12	9.57	--	89.55	<100	<0.35	<1	<1	<3	--	<1	--	--
MW11A	99.12	02/13/13	10.22	--	88.90	<100	<0.35	<1	<1	<3	--	<1	--	--
MW11A	99.12	05/21/13	11.43	--	87.69	<100	<0.35	<1	<1	<3	--	<1	--	--
MW11A	99.12	08/14/13	13.30	--	85.82	<100	<1	<1	<1	<3	--	--	--	--
MW11A	99.12	12/17/13	16.03	--	83.09	<100	<1	<1	<1	<3	--	--	--	--
MW11A	99.12	02/27/14	12.04	--	87.08	<100	<0.35	<1	<1	<3	--	--	--	--
MW11A	99.12	05/20/14	10.66	--	88.46	<100	<1	<1	<1	<3	--	--	--	--
MW11A	99.12	09/02/14	16.18	--	82.9	<100	<0.35	<1	<1	<3	<1	--	--	--
MW11A	99.12	12/22/14	10.51	--	88.6	<100	<0.35	<1	<1	<3	<1	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW12	99.18	06/29/10	8.57	--	90.61	<100	<1	<1	<1	<3	--	--	--	-
MW12	99.18	10/14/10	9.50	--	89.68	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	12/10/10	8.43	--	90.75	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	03/03/11	8.59	--	90.59	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	06/01/11	8.48	--	90.70	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	08/29/11	10.08	--	89.10	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	12/22/11	10.12	--	89.06	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	03/23/12	10.72	--	88.46	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	06/13/12	11.70	--	87.48	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	09/06/12	15.98	--	83.20	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	12/03/12	9.62	--	89.56	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	02/13/13	10.29	--	88.89	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	05/21/13	11.44	--	87.74	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	08/14/13	13.20	--	85.98	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	12/17/13	15.81	--	83.37	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	02/27/14	12.03	--	87.15	<100	<0.35	<1	<1	<3	--	--	--	--
MW12	99.18	05/20/14	10.72	--	88.46	<100	<1	<1	<1	<3	--	--	--	--
MW12	99.18	09/02/14	16.02	--	83.2	<100	<0.35	<1	<1	<3	<1	--	--	--
MW12	99.18	12/22/14	10.58	--	88.6	<100	<0.35	<1	<1	<3	<1	--	--	--
MW13	99.11	10/14/10	9.75	--	89.36	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	12/10/10	8.44	--	90.67	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	03/03/11	8.75	--	90.36	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	06/01/11	8.50	--	90.61	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	08/29/11	10.30	--	88.81	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	12/22/11	11.76	--	87.35	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	03/23/12	13.06	--	86.05	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	06/13/12	13.82	--	85.29	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	09/06/12	16.69	--	82.42	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	12/03/12	10.94	--	88.17	720	<1	<1	2.5	6.6	--	--	--	--
MW13	99.11	02/13/13	16.50	--	82.61	510	<1	<1	2.7	5.0	--	--	--	--
MW13	99.11	05/21/13	11.86	--	87.25	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	08/13/13	12.73	--	86.38	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	12/17/13	13.26	--	85.85	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	02/27/14	12.5	--	86.61	<100	<0.35	<1	<1	<3	--	--	--	--
MW13	99.11	05/20/14	10.69	--	88.42	<100	<1	<1	<1	<3	--	--	--	--
MW13	99.11	09/02/14	16.73	--	82.4	<100	<0.35	<1	<1	<3	<1	--	--	--
MW13	99.11	12/23/14	10.54	--	88.6	<100	<0.35	<1	<1	<3	<1	--	--	--

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

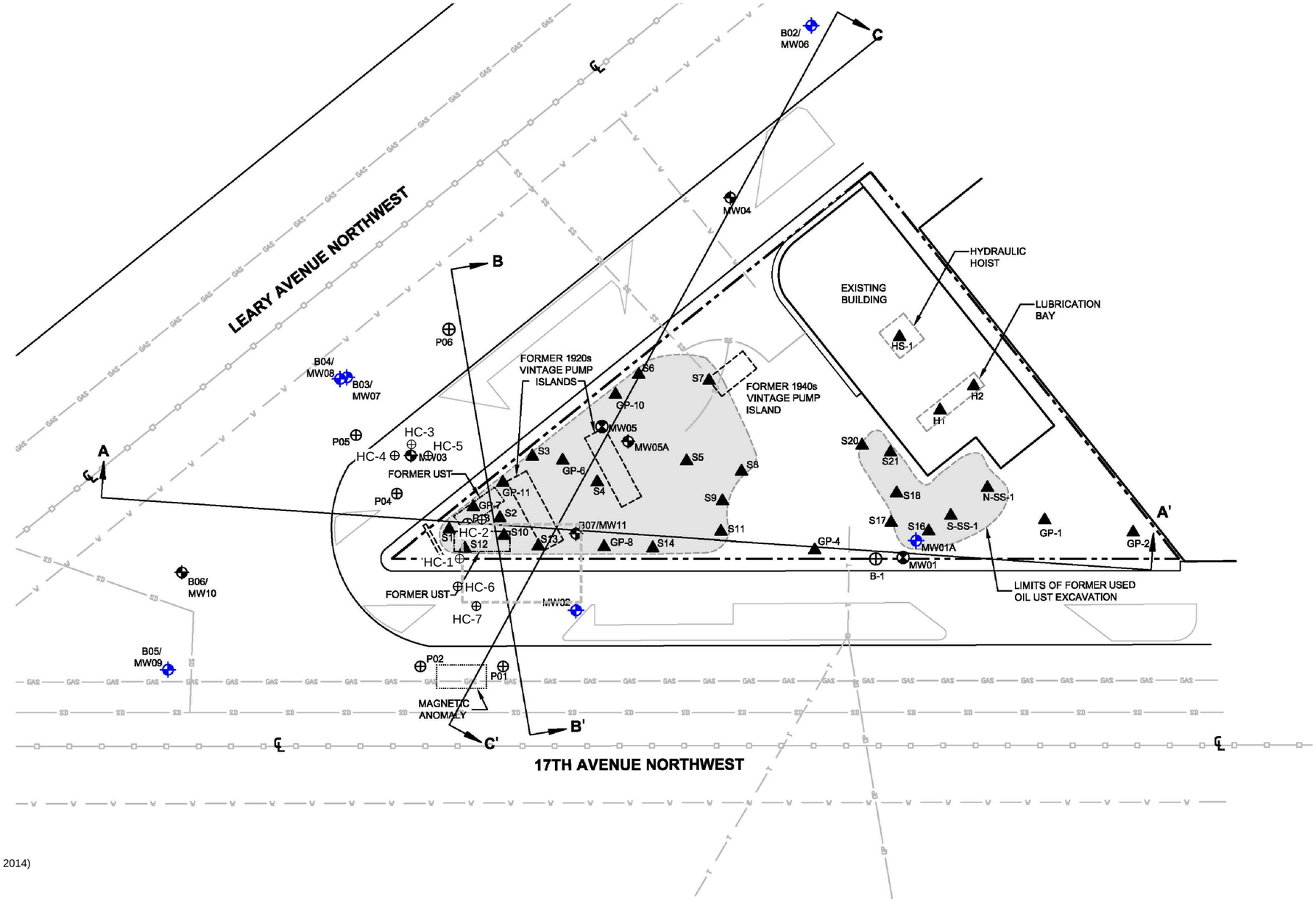
Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW14	99.58	06/29/10	9.64	--	89.94	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	10/14/10	9.64	--	89.94	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	12/10/10	8.85	--	90.73	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	03/03/11	9.29	--	90.29	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	06/01/11	9.20	--	90.38	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	08/29/11	10.68	--	88.90	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	12/21/11	11.63	--	87.95	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	03/23/12	10.02	--	89.56	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	06/13/12	12.24	--	87.34	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	09/06/12	14.53	--	85.05	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	12/03/12	7.21	--	92.37	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	02/13/13	11.03	--	88.55	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	05/21/13	12.26	--	87.32	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	08/14/13	13.75	--	85.83	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	12/17/13	14.39	--	85.19	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	02/27/14	10.6	--	88.98	<100	<0.35	<1	<1	<3	--	--	--	--
MW14	99.58	05/20/14	11.42	--	88.16	<100	<1	<1	<1	<3	--	--	--	--
MW14	99.58	09/03/14	14.36	--	85.2	<100	<0.35	<1	<1	<3	<1	--	--	--
MW14	99.58	12/23/14	7.75	--	91.8	<100	<0.35	<1	<1	<3	<1	--	--	--
MW15	99.34	06/29/10	10.56	--	88.78	740	<1	3.0	8.6	11	--	--	--	--
MW15	99.34	10/14/10	10.85	--	88.49	260	<1	<1	2.4	<3	--	--	--	--
MW15	99.34	12/10/10	10.27	--	89.07	<100	<1	<1	<1	<3	--	--	--	--
MW15	99.34	03/03/11	10.48	--	88.86	<100	<1	<1	<1	<3	--	--	--	--
MW15	99.34	06/01/11	10.36	--	88.98	<100	<1	<1	<1	<3	--	--	--	--
MW15	99.34	08/29/11	11.73	--	87.61	340	<1	<1	3.3	<3	--	--	--	--
MW15	99.34	12/22/11	12.69	--	86.65	180	<1	<1	<1	<3	--	--	--	--
MW15	99.34	03/23/12	13.32	--	86.02	<100	<1	<1	<1	<3	--	--	--	--
MW15	99.34	06/13/12	14.22	--	85.12	<100	<1	<1	<1	<3	--	--	--	--
MW15A	99.05	09/07/12	15.59	--	83.46	<100	<1	<1	<1	<3	--	--	--	--
MW15A	99.05	12/03/12	11.44	--	87.61	650	<1	<1	1.7	3.4	--	--	--	--
MW15A	99.05	02/13/13	12.14	--	86.91	220	<1	<1	<1	<3	--	--	--	--
MW15A	99.05	05/21/13	13.05	--	86.00	<100	<1	<1	<1	<3	--	--	--	--
MW15A	99.05	08/14/13	14.49	--	84.56	<100	<1	<1	<1	<3	--	--	--	--
MW15A	99.05	12/17/13	15.61	--	83.44	<100	<1	<1	<1	<3	--	--	--	--
MW15A	99.05	02/27/14	13.31	--	85.74	<100	<0.35	<1	<1	<3	--	--	--	--
MW15A	99.05	05/20/14	12.39	--	86.66	160	<1	<1	<1	<3	--	--	--	--
MW15A	99.05	09/03/14	15.56	--	83.5	<100	<0.35	<1	<1	<3	<1	--	--	--
MW15A	99.05	12/23/14	12.00	--	87.1	170	<0.35	<1	<1	<3	<1	--	--	--

APPENDIX A

GEOLOGIC CROSS SECTIONS

LEGEND

B06/ MW10	BORING/MONITORING WELL
HA1, S-SS-1	SOIL SAMPLE (GEOENGINEERS 2001)
GP-6	GEOPROBE (GEOENGINEERS 2002)
B-1	HOLLOW-STEM AUGER BORING (GEOENGINEERS 2002)
S20	UST EXCAVATION SOIL SAMPLE (GEOENGINEERS 2004)
P01	SOIL BORING (SES OCTOBER 2005)
MW01	DECOMMISSIONED MONITORING WELL
UST	UNDERGROUND STORAGE TANK
MTCA	WASHINGTON STATE MODEL TOXICS CONTROL ACT
GEOENGINEERS	GEOENGINEERS, INC.
℄	CENTER LINE
SES	SOUNDENVIRONMENTAL STRATEGIES CORPORATION
GAS GAS	GAS LINE
SS SS	SANITARY SEWER
SD	STORM DRAIN
	COMBINED SEWER/STORM LINE
W W	WATER LINE
T T	TELECOMMUNICATIONS LINE
OP	OVERHEAD POWER
	PROPERTY BOUNDARY
	FORMER PUMP ISLAND
	FORMER UST
	MAGNETIC ANOMALY
	FORMER EXCAVATION AREAS
A A'	CROSS SECTION LOCATION
HC-1	BORING LOCATIONS HYDROCON 2014)
	2012 EXCAVATION AREA



SOURCE DRAWINGS PROVIDED BY:
SOUNDEARTH STRATEGIES, INC.

0 20 40
SCALE IN FEET
1" = 20'

Hydro Con
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 3-2-15
DWN: JJT
CHK: RH
APPROVED:
PRJ. MGR: CH
PROJECT NO: 14-806

APPENDIX A1
EXPLORATION PLAN WITH
GEOLOGIC CROSS SECTIONS
TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

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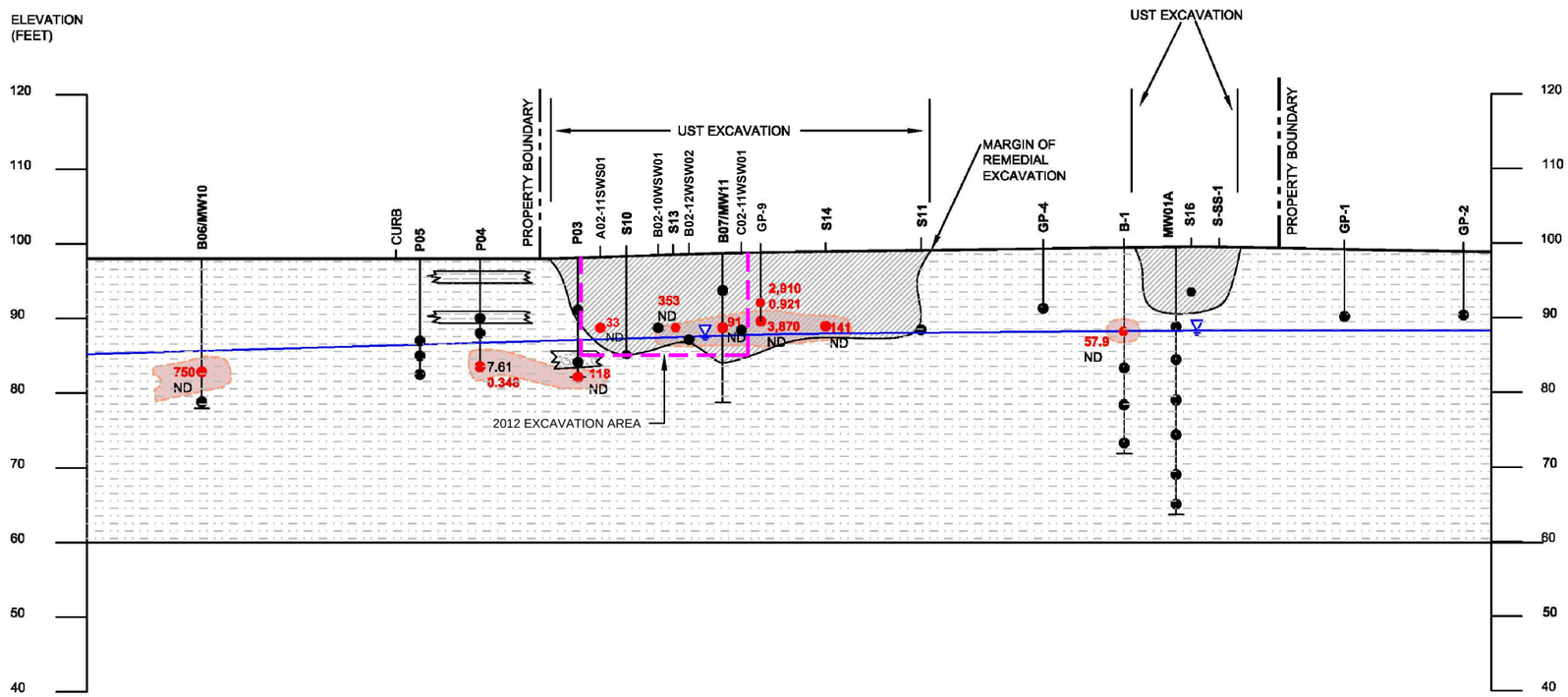

LEGEND

40 ND	GASOLINE-RANGE PETROLEUM HYDROCARBONS BENZENE
	ALL CONCENTRATIONS IN MILLIGRAMS PER KILOGRAM
ND	NOT DETECTED ABOVE LABORATORY REPORTING LIMIT
UST	UNDERGROUND STORAGE TANK
MTCA	WASHINGTON STATE MODEL TOXICS CONTROL ACT
RED	RED DENOTES SAMPLE LOCATION WITH CONCENTRATION(S) EXCEEDING MTCA METHOD A CLEANUP LEVEL(S) FOR SOIL
●	SOIL/BORING SAMPLE LOCATION
▽	GROUNDWATER TABLE (SEPTEMBER 23, 2008)
	SM - SILTY SANDS, SAND - SILT MIXTURES
	GM - SILTY GRAVELS, GRAVEL - SAND - SILT MIXTURES
	ML - INORGANIC SILTS AND VERY FINE SANDS, ROCK FLOUR, SILTY OR CLAYEY FINE SANDS
	FILL - EXCAVATION BACKFILL
	ESTIMATED LIMITS OF PETROLEUM-CONTAMINATED SOIL

RESULTS SHOWN IN MILLIGRAMS PER KILOGRAM

2012 EXCAVATION AREA

SOURCE DRAWINGS PROVIDED BY:
SOUNDEARTH STRATEGIES, INC.

0 20 40
SCALE IN FEET
1" = 20'

HydroCon
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 4-6-15
DWN: JJT
CHK: NV
APPROVED: NV
PRJ. MGR: CH
PROJECT NO: 14-806

APPENDIX A2
GEOLOGIC CROSS SECTION A-A'

TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

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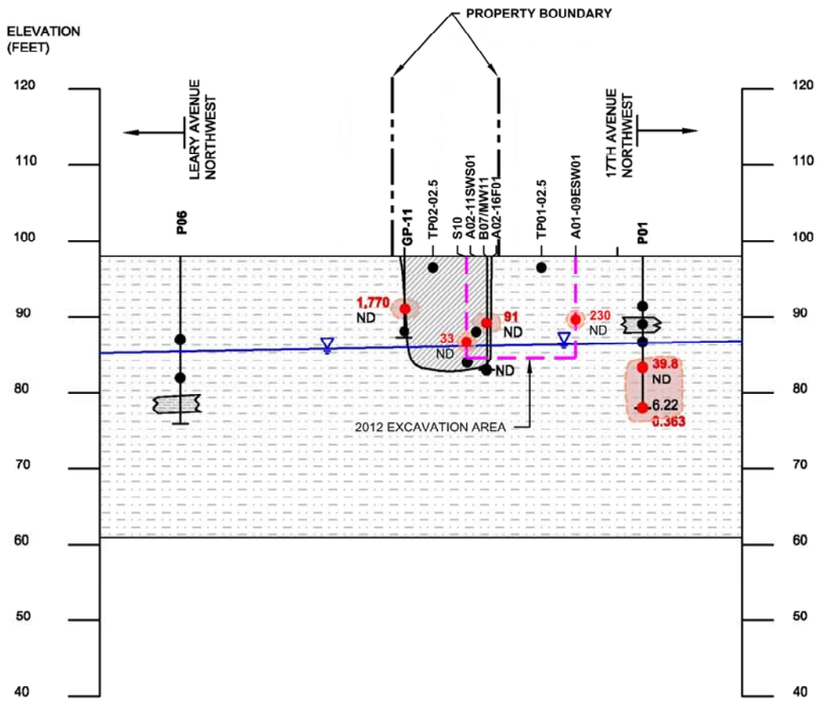

LEGEND

40 ND	GASOLINE-RANGE PETROLEUM HYDROCARBONS BENZENE
	ALL CONCENTRATIONS IN MILLIGRAMS PER KILOGRAM
ND	NOT DETECTED ABOVE LABORATORY REPORTING LIMIT
UST	UNDERGROUND STORAGE TANK
MTCA	WASHINGTON STATE MODEL TOXICS CONTROL ACT
RED	RED DENOTES SAMPLE LOCATION WITH CONCENTRATION(S) EXCEEDING MTCA METHOD A CLEANUP LEVEL(S) FOR SOIL
●	SOIL/BORING SAMPLE LOCATION
▽	GROUNDWATER LEVEL (SEPTEMBER 23, 2008)
	SM - SILTY SANDS, SAND - SILT MIXTURES
	ML - INORGANIC SILTS AND VERY FINE SANDS, SILTY OR CLAYEY FINE SANDS OR CLAYEY SILTS WITH SLIGHT PLASTICITY
	EXCAVATION BACKFILL
	ESTIMATED AREA OF SOIL CONTAMINATION

RESULTS SHOWN IN MILLIGRAMS PER KILOGRAM

2012 EXCAVATION AREA

SOURCE DRAWINGS PROVIDED BY:
SOUNDEARTH STRATEGIES, INC.

0 20 40
SCALE IN FEET
1" = 20'

Hydro Con
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 3-2-15
DWN: JJT
CHK: RH
APPROVED:
PRJ. MGR: CH
PROJECT NO:
14-806

APPENDIX A3
GEOLOGIC CROSS SECTION B-B'

TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

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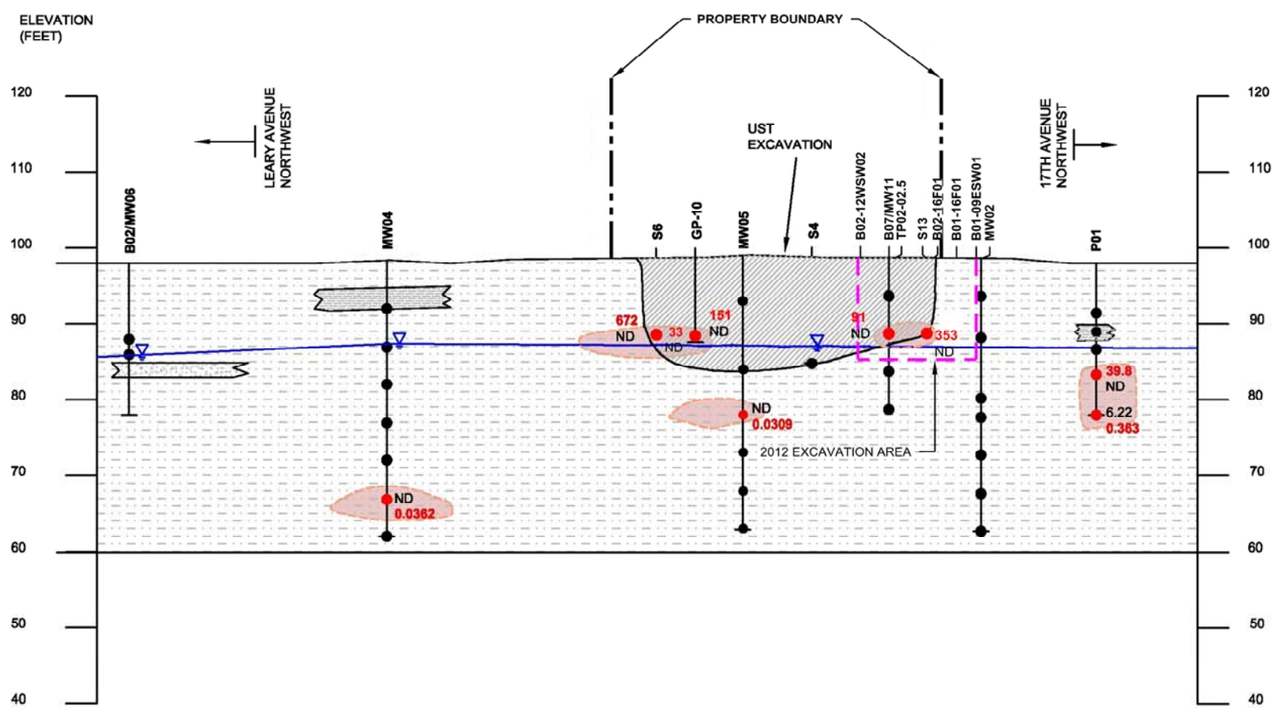

LEGEND

40 ND	GASOLINE-RANGE PETROLEUM HYDROCARBONS BENZENE
	ALL CONCENTRATIONS IN MILLIGRAMS PER KILOGRAM
ND	NOT DETECTED ABOVE LABORATORY REPORTING LIMIT
UST	UNDERGROUND STORAGE TANK
MTCA	WASHINGTON STATE MODEL TOXICS CONTROL ACT
RED	RED DENOTES SAMPLE LOCATION WITH CONCENTRATION(S) EXCEEDING MTCA METHOD A CLEANUP LEVEL(S) FOR SOIL
●	SOIL/BORING SAMPLE LOCATION
▽	GROUNDWATER LEVEL (SEPTEMBER 23, 2008)
	SM - SILTY SANDS, SAND - SILT MIXTURES
	SP - POORLY-GRADED SANDS, GRAVELLY SAND, LITTLE OR NO FINES
	ML - INORGANIC SILTS AND VERY FINE SANDS, SILTY OR CLAYEY FINE SANDS OR CLAYEY SILTS WITH SLIGHT PLASTICITY
	UST EXCAVATION BACKFILL
	ESTIMATED AREA OF SOIL CONTAMINATION

RESULTS SHOWN IN MILLIGRAMS PER KILOGRAM

2012 EXCAVATION AREA

SOURCE DRAWINGS PROVIDED BY:
SOUNDEARTH STRATEGIES, INC.

0 20 40
SCALE IN FEET
1" = 20'

Hydro Con
510 Allen St. Suite B Kelso, Wa 98626, Ph(360)-703-6086

DATE: 4-6-15
DWN: JJT
CHK: RH
APPROVED:
PRJ. MGR: CH
PROJECT NO: 14-806

APPENDIX A4
GEOLOGIC CROSS SECTION C-C'

TOC HOLDINGS CO. FACILITY NO. 01-443
4910 LEARY AVE. NW
SEATTLE, WA.

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APPENDIX B

BORING LOGS

Log of Exploratory Boring:

Notes
To the N in 17th Avenue NW

Drilling Co./Driller:	ESN / John
Drilling Method:	Direct Push
Location:	15' N of Street Sign, 23' E
Surface Condition:	Concrete
Total Depth:	20
First GW Depth:	16

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0							CONC	Concrete		
1								Damp, silty medium SAND with gravel, gray-brown, no hydrocarbon odor		
2		0.0	70						Dp	
3										
4		0.0			P-1-3		SM			
5										
6		0.0	75					-some orange mottling, very faint hydrocarbon odor at 5 feet below ground surface (bgs).	Dp	
7					P-1-7					
8								-dark brown at 7 feet bgs.		
9							SM-ML	Damp, sandy SILT, gray-brown, no hydrocarbon odor.	Dp	
10		301	100					Damp, silty SAND, gray-brown, weak hydrocarbon odor.		
11					P-1-11					
12		>2000						-with gravel, gray, moderate hydrocarbon odor at 11 feet bgs.	Dp	
13										
14			25					-weak hydrocarbon odor at 13.5 feet bgs.		
15					P-1-15		SM			
16		200			P-1-16				▽	
17								-wet, no gravel, strong hydrocarbon odor at 16 feet bgs.	Wet	
18		>2000	75		P-1-18			Damp, silty fine SAND, laminated, weak hydrocarbon odor at 17 to 20 feet bgs.	Dp	
19										
20					P-1-20					
21								Boring terminated at 20 feet bgs and backfilled with hydrated bentonite chips. Reconnaissance groundwater sample could not be collected due to insufficient recharge.		
22										
23										
24										
25										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue NW
Seattle, Washington 98107

Date Started: 10/24/2005
Date Finished: 10/24/2005
Logged By: CC
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_2005SI_P01-P06JAC.GPJ

BORING LOG
P01

Log of Exploratory Boring:

Notes
On 17th Avenue NW-S

Drilling Co./Driller:	ESN / Dave
Drilling Method:	Direct Push
Location:	23' E of Street Sign
Surface Condition:	Concrete
Total Depth:	16.5
First GW Depth:	16

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0							CONC	Concrete		
1					P-2-1			Damp, silty SAND with gravel, grayish medium-brown, no hydrocarbon odor.	Dp	
2			75							
3					P-2-3					
4										
5			30							
6					P-2-6				Mst	
7								-moist at 6 feet below ground surface (bgs).		
8			90							
9					P-2-9		SM	-damp, weak hydrocarbon odor at 8 feet bgs.	Dp	
10					P-2-10					
11			95							
12								-no hydrocarbon odor at 11.5 feet bgs.		
13										
14			75		P-2-14			-no gravel, gray at 13.5 feet bgs.	Dp	
15										
16			65		P-2-16			-wet at 16 feet bgs.	▽	
17								Boring terminated at 16.5 feet bgs and backfilled with hydrated bentonite chips. Collected reconnaissance groundwater sample P-2-W.		
18										
19										
20										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue NW
Seattle, Washington 98107

Date Started: 10/24/2005
Date Finished: 10/24/2005
Logged By: CC
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_2005SI_P01-P06JAC.GPJ

BORING LOG
P02

Log of Exploratory Boring:

Notes
At Bill's Tires Sign

Drilling Co./Driller:	ESN / John
Drilling Method:	Direct Push
Location:	23' N of Street Sign
Surface Condition:	Asphalt
Total Depth:	16
First GW Depth:	12

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Asphalt		
1								Dry, GRAVEL with silt, gray, no hydrocarbon odor (Fill).		
2			75				FILL	Damp, sandy, silty GRAVEL, medium brown, no hydrocarbon odor (Fill) at 1.5 feet below ground surface (bgs).	Dp	
3										
4		0.0			P-3-4					
5								Damp, gravelly, silty SAND, medium brown, no hydrocarbon odor.	Dp	
6			95							
7		0.0			P-3-7					
8		53					SM	-very faint hydrocarbon odor at 8 feet bgs.		
9										
10			90							
11		78			P-3-11					
12									▽	
13							GM	Wet, silty GRAVEL, brown, very faint hydrocarbon odor.	Wet	
								Moist, gravelly, silty SAND, gray, very faint hydrocarbon odor.	Moist	
14			70		P-3-14		SM			
15										
					P-3-16			-wet, weak hydrocarbon odor, sheen on gravel at 15 feet bgs.	Wet	
16								Boring terminated at 16 feet below ground surface and backfilled with hydrated bentonite chips. Collected reconnaissance groundwater sample P-3-W.		
17										
18										
19										
20										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue NW
Seattle, Washington 98107

Date Started: 10/24/2005
Date Finished: 10/24/2005
Logged By: CC
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_2005\SI_P01-P06\JAC.GPJ

BORING LOG
P03

Log of Exploratory Boring:

Notes
On sidewalk near later section road signs

Drilling Co./Driller:	ESN / John
Drilling Method:	Direct Push
Location:	3' N of Street Sign
Surface Condition:	Concrete
Total Depth:	15
First GW Depth:	13

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0							CONC	Concrete		
1							OL	Damp, organic silt, dark brown, no hydrocarbon odor.		
2			50						Dp	
3							SM	Damp, silty SAND, medium brown, no hydrocarbon odor.		
4					P-4-4					
5							SM-ML	Damp, sandy SILT with organic silt, dark, medium brown and gray with orange mottling, slightly plastic, no hydrocarbon odor.		
6		80	100						Dp	
7								Damp, silty SAND, bluish gray, very faint hydrocarbon odor.		
8					P-4-8					
9			100					-bluish gray with green mottling, weak hydrocarbon odor at 8 feet below ground surface (bgs).	Dp	
10					P-4-10		SM	-with gravel, gray, very faint hydrocarbon odor at 10 feet bgs.		
11										
12			100						Dp	
13					P-4-13				▽	
14		>2000	100		P-4-13.5			-wet, moderate hydrocarbon odor at 13 feet bgs.	Wet	
15					P-4-14.5			-very faint hydrocarbon odor at 14 feet bgs.	Dp	
16								Boring terminated at 15 feet below ground surface and backfilled with hydrated bentonite chips. Collected reconnaissance groundwater sample P-4-W.		
17										
18										
19										
20										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue NW
Seattle, Washington 98107

Date Started: 10/25/2005
Date Finished: 10/25/2005
Logged By: CC
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_200505_P04-P06JAC.GPJ

BORING LOG
P04

Log of Exploratory Boring:

Notes
On Leary Avenue to the SE

Drilling Co./Driller:	ESN / John
Drilling Method:	Direct Push
Location:	13' W of Street Sign
Surface Condition:	Concrete
Total Depth:	16
First GW Depth:	13

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0							CONC	Concrete		
1			30		P-5-2		SM-ML	Damp, sandy SILT with gravel, brown and orange, no hydrocarbon odor.	Dp	
2										
3							SM	Damp, silty SAND with gravel, brown, no hydrocarbon odor.	Dp	
4			30							
5					P-5-5		SM-ML	Moist, sandy SILT with gravel, black to dark brown and medium orange brown, no hydrocarbon odor.	Mst	
6										
7			90					Damp, gravelly, silty SAND, greenish-gray, no hydrocarbon odor, wood from 6.5 to 7.0 feet below ground surface (bgs).	Dp	
8					P-5-8			-no gravel, gray and orange mottled at 7.5 feet bgs.		
9							SM	-grayish-brown at 9 feet bgs.		
10										
11			100		P-5-11					
12										
13					P-5-13		SP-SM	Wet, silty, coarse SAND, gray, very faint hydrocarbon odor.	▽ Wet	
14			100							
15							SM	Damp, silty, fine SAND, gray, no hydrocarbon odor.	Dp	
16					P-5-15					
17								Boring terminated at 16 feet bgs due to refusal and backfilled with hydrated bentonite chips. Collected reconnaissance groundwater sample P-5-W and a duplicate groundwater sample D-5-W.		
18										
19										
20										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue NW
Seattle, Washington 98107

Date Started: 10/25/2005
Date Finished: 10/25/2005
Logged By: CC
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_260581_P01-P06JAC.GPJ

BORING LOG
P05

Log of Exploratory Boring:

Notes
Leary Way to the NW

Drilling Co./Driller:	ESN / John
Drilling Method:	Direct Push
Location:	25' N of Street Sign, 13' W
Surface Condition:	Concrete
Total Depth:	22
First GW Depth:	19

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0							CONC	Concrete		
1							OL	Damp, organic, sandy SILT, dark brown, no hydrocarbon odor.		
2			80					Damp, silty SAND with gravel, medium brown, no hydrocarbon odor.	Dp	
3										
4		0.0			P-6-4					
5										
6			80							
7								-wet at 6.5 feet below ground surface (bgs).	Wet	
8		199			P-6-8			-damp, gray at 7 feet bgs.	Dp	
9		40 150								
10			100				SM			
11					P-6-11					
12										
13			80		P-6-13					
14								-no gravel at 14 feet bgs.		
15										
16		100	100		P-6-16					
17										
18							SM-ML	Damp, sandy SILT with gravel, gray, no hydrocarbon odor		
19								Wet, silty SAND with gravel, gray, no hydrocarbon odor	▽	
20			90				SM		Wet	
21					P-6-21					
22								Boring terminated at 22 feet bgs and backfilled with hydrated bentonite chips. Collected reconnaissance groundwater sample P-6-W.		
23										
24										
25										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue NW
Seattle, Washington 98107

Date Started: 10/25/2005
Date Finished: 10/25/2005
Logged By: CC
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_20055_P01-P06JAC.GPJ

BORING LOG
P06

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Scott
Drilling Method:	Hollow Stem Auger
Location:	2.5 ft S and 30.25 ft W of NW Building Corner
Surface Condition:	Concrete
Total Depth:	20
First GW Depth:	10

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Concrete		
1								Air-knife to 7.5 feet below ground surface (bgs).		
2										
3										
4										
5										
6										
7										
8	2 2 2	0.0	100		B02-08		FILL	Moist, loose, silty SAND, some fine gravel, wood debris, gray, no hydrocarbon odor (Fill)	Mst	
9										
10									▽	
11	5 7 9	0.0	100		B02-11		FILL	Wet, medium dense, same as above (Fill).	Wet	
12										
13	16 50/6"	0.0	60		B02-13		SM SP-SM	Very dense, silty SAND, with fine gravel, brown, no hydrocarbon odor. Moist, very dense, medium- to coarse-grained SAND with silt, some coarse gravel, gray, no hydrocarbon odor	Mst	
14									Mst	
15	42 50/6"	0.0	60		B02-16		SM	Moist, very dense, silty SAND, some fine gravel, grayish brown, gray below 16.5 feet, no hydrocarbon odor.		
16									Mst	
17										
18	35 50/6"	0.0	50				SM	Same as above, with fine- to medium-grained sand below 17.5 feet.		
19	40 50/5"	0.0	60		B02-20		SM	Same as above.		
20								Boring terminated at 20 feet, completed as a 2-inch-diameter monitoring well MW06, screened from 10-20 feet bgs. Concrete from 0-2 feet bgs, bentonite seal from 2-8 feet bgs, sand filter pack from 8-20 feet bgs.		
21										
22										
23										
24										
25										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 5/1/2008
Date Finished: 5/1/2008
Logged By: BAD
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_20080502_MW06-MW10.JAC.GPJ

BORING LOG
B02/MW06

Log of Exploratory Boring:

Notes
NE = Not encountered

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Drilling Co./Driller:	Cascade / Scott
Drilling Method:	Hollow Stem Auger
Location:	103 ft S and 16.5 ft E of NW Building Corner
Surface Condition:	Concrete
Total Depth:	20
First GW Depth:	NE

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Concrete		
1								Air-knife to 7.5 feet below ground surface (bgs).		
2										
3										
4										
5										
6										
7										
8	23 33 31	0.0	100		B03-08		FILL	Damp, very dense, medium- to coarse-grained SAND with silt and fine to coarse gravel, brown, no hydrocarbon odor (Fill).	Dp	
9										
10	42 50/6"	0.0	60		B03-11		SM	Damp, very dense, silty SAND with fine gravel, brownish gray, no hydrocarbon odor.	Dp	
11										
12										
13	45 50/6"	0.0	40		B03-13		SM	Damp, very dense, silty, fine-grained SAND with fine gravel, gray, no hydrocarbon odor.	Dp	
14										
15	45 50/6"	0.0	45		B03-16		SM	Same as above.	Dp	
16										
17										
18	45 50/6"	0.0	50				SM	Same as above.	Dp	
19	45 50/6"	0.0	60		B03-20		SM	Same as above.	Dp	
20								Boring terminated at 20 feet bgs, completed as a 2-inch-diameter monitoring well MW07, screened from 10-20 feet bgs. Concrete from 0-2 feet bgs, bentonite seal from 2-8 feet bgs, sand filter pack from 8-20 feet bgs.		
21										
22										
23										
24										
25										

SOUND ENVIRONMENTAL STRATEGIES
www.soundenvironmental.com

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 5/1/2008
Date Finished: 5/1/2008
Logged By: BAD
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_2008\502_MW06-MW10JAC.GPJ

BORING LOG
B03/MW07

Log of Exploratory Boring:

Notes
NE = Not encountered

Drilling Co./Driller:	Cascade / Scott
Drilling Method:	Hollow Stem Auger
Location:	104.5 ft S and 16.25 ft E of NW Building Corner
Surface Condition:	Concrete
Total Depth:	35
First GW Depth:	NE

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Concrete		
1								Air knife to 7.5 feet below ground surface (bgs).		
2										
3										
4										
5										
6										
7										
8	15 19 30	0.0	90		B04-08		FILL	Moist, dense, fine- to medium-grained SAND with fine gravel, few fines, brown, no hydrocarbon odor (Fill).	Mst	
9										
10	42 50/6"	0.0	70		B04-11		SM	Moist, very dense, silty, fine- to medium-grained SAND, trace gravel, grayish brown, no hydrocarbon odor.	Mst	
11										
12										
13	45 50/6"	0.0	60				SM	Same as above, no gravel, gray.	Mst	
14					B04-14					
15	50/6"	0.0	55				SM	Same as above.	Mst	
16					B04-16					
17										
18	50/6"	0.0	60		B04-18		SM	Same as above, with fine gravel.	Mst	
19										
20										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 5/2/2008
Date Finished: 5/2/2008
Logged By: BAD
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_20080502_MW08-MW10JAC.GPJ

BORING LOG
B04/MW08

Log of Exploratory Boring:

Notes
NE = Not encountered

Drilling Co./Driller:	Cascade / Scott
Drilling Method:	Hollow Stem Auger
Location:	104.5 ft S and 16.25 ft E of NW Building Corner
Surface Condition:	Concrete
Total Depth:	35
First GW Depth:	NE

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
20										
21	42 50/6"	0.0	60		B04-21		SP	Damp, very dense, fine- to medium-grained SAND, trace fines, gray, no hydrocarbon odor.	Dp	
22										
23	45 50/6"	0.0	60		B04-23		SP	Same as above.		
24										
25	38 50/6"	0.0	60				SP	Same as above, moist.	Mst	
26					B04-26					
27										
28	50/5"	0.0	40		B04-28		SP	Same as above.	Mst	
29										
30	50/6"	0.0	50				SM	Moist, very dense, silty fine- to medium-grained SAND, gray, no hydrocarbon odor.	Mst	
31					B04-31					
32										
33	35 50/6"	0.0	65				SM	Same as above.	Mst	
34										
35	35 50/6"	0.0	75		B04-35		SM	Same as above.	Mst	
36								Boring terminated at 35 feet bgs, completed as a 2-inch-diameter monitoring well MW08, screened from 15-35 feet bgs. Concrete from 0-2 feet bgs, bentonite seal from 2-13 feet bgs, sand filter pack from 13-35 feet bgs.		
37										
38										
39										
40										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 5/2/2008
Date Finished: 5/2/2008
Logged By: BAD
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_20080502_MW08-MW10.JAC.GPJ

BORING LOG
B04/MW08

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Scott
Drilling Method:	Hollow Stem Auger
Location:	153 ft S and 69 ft E of NW Building Corner
Surface Condition:	Concrete
Total Depth:	20
First GW Depth:	10

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Concrete		
1								Air-knife to 7.5 feet below ground surface (bgs).		
2										
3										
4										
5										
6										
7										
8	15 16 18	0.0	80		B05-08		FILL	Moist, dense, fine- to medium-grained SAND, trace fine gravel, few fines, brownish gray, no hydrocarbon odor. (Fill)	Mst	
9										
10									▽	
11	35 50/6"	31.3	65		B05-11		SP-SM	Wet, very dense, fine- to medium-grained SAND with silt and fine gravel, gray, moderate hydrocarbon odor.	Wet	
12										
13	50/6"	19.8	60		B05-13.5		SM	Moist, very dense, silty, fine- to medium-grained SAND, brownish gray to gray, weak hydrocarbon odor.	Mst	
14										
15	50/6"	34.7	60		B05-16		SM	Moist, very dense, silty, fine- to medium-grained SAND, few fine to medium gravels, gray, moderate hydrocarbon odor.	Mst	
16										
17										
18	50/6"	36.8	50				SM	Same as above, no hydrocarbon odor.	Mst	
19	50/6"	27.9	50		B05-20		SM	Same as above.	Mst	
20								Boring terminated at 20 feet bgs, completed as a 2-inch-diameter monitoring well MW09, screened from 10-20 feet bgs. Concrete from 0-2 feet bgs, bentonite seal from 2-8 feet bgs, sand filter pack from 8-20 feet bgs.		
21										
22										
23										
24										
25										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 5/2/2008
Date Finished: 5/2/2008
Logged By: BAD
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_20080502_MW06-MW10JAC.GPJ

BORING LOG
B05/MW09

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Scott
Drilling Method:	Hollow Stem Auger
Location:	144 ft S and 44 ft E of NW Building Corner
Surface Condition:	Concrete
Total Depth:	20
First GW Depth:	11

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Concrete		
1								Air-knife to 7.5 feet below ground surface (bgs).		
2										
3										
4										
5										
6										
7										
8	15 18 26	0.0	90		B06-09		FILL	Moist, dense, fine- to coarse-grained SAND with fine gravel, brick fragments from 7.5-8.5 feet bgs, brownish gray, no hydrocarbon odor. (Fill)	Mst	
9										
10	13 15 15	0.0	90		B06-11		SM	Moist to wet, dense, silty, fine- to coarse-grained SAND, trace fine gravel, brown, no hydrocarbon odor.	▽	
11										
12										
13	23 50/6"	3003	60		B06-13.5		SM	Moist, very dense, silty, fine- to coarse-grained SAND, trace fine gravel, gray, blue-gray staining at 13.5 feet bgs, strong hydrocarbon odor.	Mst	
14										
15	33 50/6"	8.0	60		B06-16		SP-SM	Moist, very dense, fine- to medium-grained SAND with silt, gray, weak hydrocarbon odor.	Mst	
16										
17										
18	40 50/6"	31.3	65				SP-SM	Same as above.	Mst	
19										
20	35 50/6"	0.0	70		B06-20		SP-SM	Same as above.		
21								Boring terminated at 20 feet bgs, completed as a 2-inch-diameter monitoring well MW10, screened from 10-20 feet bgs. Concrete from 0-2 feet bgs, bentonite seal from 2-8 feet bgs, sand filter pack from 8-20 feet bgs.		
22										
23										
24										
25										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 5/2/2008
Date Finished: 5/2/2008
Logged By: BAD
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_20080502_MW06-MW10JAC.GPJ

BORING LOG
B06/MW10

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / David
Drilling Method:	Hollow Stem Auger
Location:	12'9" West and 4' South of MW02
Surface Condition:	Asphalt
Total Depth:	21
First GW Depth:	12.5

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Asphalt		
1								Soil cuttings - Moist, medium dense, gravelly fine to medium SAND, trace to some silt, no hydrocarbon odor (Fill).		
2										
3							FILL			
4										
5	7				B07-05					
6	9 9	2.2	80				FILL	Moist, fine to medium SAND, some gravel, trace to some silt, brown with some gray, no hydrocarbon odor (Fill)	Moist	
7										
8	23 50/6"	161	90		B07-07.5		SP-SM	Moist, very dense, gravelly fine to medium SAND, some silt grading to "silty" at 8 feet bgs, brown mixed with stained gray, moderate hydrocarbon odor.	Moist	
9										
10					B07-10					
11	27 50/6"	1,809	100				SM	Moist, very dense, silty fine SAND, some gravel, stained gray, moderate to strong hydrocarbon odor.	Moist	
12									▽	
13	21 50/6"	1,464	100		B07-12.5		SM SP	Same as above, wet, strong hydrocarbon odor. Wet, very dense, gravelly fine to coarse SAND, trace to some silt, strong hydrocarbon odor.	Wet	
14										
15	9				B07-15					
16	11 13	78.9	95				SP	Wet, medium dense, medium to coarse SAND, some gravel, trace silt, gray, weak to moderate hydrocarbon odor.	Wet	
17										
18	18 50/6"	89.0	100		B07-17.5		SP-SM	Wet, very dense, gravelly fine to coarse SAND, some silt and local silt-rich zones, gray, moderate hydrocarbon odor.	Wet	
19										
20	24				B07-20					
21	50/6"	37.4	100				SM	Wet, very dense, silty fine SAND, some gravel, gray, moderate hydrocarbon odor.	Wet	
22								Boring terminated at 21 feet bgs and completed as a 2-inch-diameter monitoring well MW11, screened from 5-20 feet below ground surface (bgs). Concrete from 0-2 feet bgs, bentonite seal from 2 to 4 feet bgs, and sand filter pack from 4 to 20 feet bgs.		
23										
24										
25										

SOUND ENVIRONMENTAL STRATEGIES

TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 1/16/2009
Date Finished: 1/16/2009
Logged By: CCC
Chk By: JAC
SES Project No.: 0440-041
File ID.: C:\DOCUME~1\JCYR\DESKTOP\01-443_2000\11_MW11JAC.GPJ

BORING LOG
B07/MW11

SoundEarth Strategies

Project: TOC Holdings Co. Facility No. 01-443
Project Number: 0440-041
Logged by: WBC
Date Started: 08/30/12
Surface Conditions: Concrete
Well Location N/S: 4' S of MW02
Well Location E/W: 12.75' W of MW02
Reviewed by: Draft
Date Completed: 08/30/12

BORING LOG MW11A

Site Address: 4910 Leary Avenue Northwest
Seattle, Washington

Water Depth At Time of Drilling: -- feet bgs
Water Depth After Completion: -- feet bgs

Depth (feet bgs)	Interval	Blow Count	% Recovery	PID (ppmv)	Sample ID	USCS Class	Graphic	Lithologic Description	Well Construction Detail
0								**2" asphalt** **@1' large chunk of concrete.**	
5								**Drilled down to 15' bgs with no sampling or soil observation.**	
10									
15		9						**Damp, loose, silty SAND, trace gravel, brown, no hydrocarbon odor (15-80-5).**	

Drilling Co./Driller: Cascade/Scott
Drilling Equipment: Hollow Stem Auger
Sampler Type: Split-Spoon
Hammer Type/Weight: lbs
Total Boring Depth: 20.5 feet bgs
Total Well Depth: 20 feet bgs
State Well ID No.: BHS 313

Well/Auger Diameter: 2'/4" inches
Well Screened Interval: 5 to 20 feet bgs
Screen Slot Size: 0.010 inches
Filter Pack Used: Silica sand
Surface Seal: Concrete
Annular Seal: Bentonite Chips
Monument Type: Flush Mount

Notes/Comments:

SoundEarth Strategies

Project: TOC Holdings Co. Facility No. 01-443
Project Number: 0440-041
Logged by: WBC
Date Started: 08/30/12
Surface Conditions: Concrete
Well Location N/S: 4' S of MW02
Well Location E/W: 12.75' W of MW02
Reviewed by: Draft
Date Completed: 08/30/12

BORING LOG MW11A

Site Address: 4910 Leary Avenue Northwest
Seattle, Washington

Water Depth At Time of Drilling: -- feet bgs
Water Depth After Completion: -- feet bgs

Depth (feet bgs)	Interval	Blow Count	% Recovery	PID (ppmv)	Sample ID	USCS Class	Graphic	Lithologic Description	Well Construction Detail
15		9 10 12	100	11.8	MW11A-16.5	SM		**Wet, loose, silty SAND, trace gravel, gray, strong hydrocarbon odor (10-85-5).**	
				251.5					
		12 15 12		6.7	MW11A-17.5	SM		**Wet, firm, silty fine to medium SAND, trace gravel, gray, possible faint odor (10-85-5).**	
			100	8.3					
20		15 16 12	100	11.7	MW11A-20.5	SM		**Wet, firm, silty fine to medium SAND, gray, moderate odor (15-80-5).**	
								Boring terminated at 20.5' bgs, well installed @20' bgs with 15' of screen, sand to 1' above screen, bentonite to 1' bgs.	
25									
30									

Drilling Co./Driller:	Cascade/Scott		**Well/Auger Diameter:**	2'/4"	inches
Drilling Equipment:	Hollow Stem Auger		**Well Screened Interval:**	5 to 20	feet bgs
Sampler Type:	Split-Spoon		**Screen Slot Size:**	0.010	inches
Hammer Type/Weight:		lbs	**Filter Pack Used:**	Silica sand	
Total Boring Depth:	20.5	feet bgs	**Surface Seal:**	Concrete	
Total Well Depth:	20	feet bgs	**Annular Seal:**	Bentonite Chips	
State Well ID No.:	BHS 313		**Monument Type:**	Flush Mount	

Notes/Comments:

SoundEarth Strategies

Project: TOC Holdings Co. Facility No. 01-443
Project Number: 0440-041
Logged by: WBC
Date Started: 08/30/12
Surface Conditions: Concrete
Well Location N/S:
Well Location E/W:
Reviewed by: Draft
Date Completed: 08/30/12

BORING LOG MW15A

Site Address: 4910 Leary Avenue Northwest
Seattle, Washington

Water Depth At Time of Drilling: -- feet bgs
Water Depth After Completion: -- feet bgs

Depth (feet bgs)	Interval	Blow Count	% Recovery	PID (ppmv)	Sample ID	USCS Class	Graphic	Lithologic Description	Well Construction Detail
0								**4" concrete** **Drilled down to 15' bgs with no sampling or soil observation.**	
5								**@7': native soil encountered based on driler observation cottings are loose, silty wet SAND, trace gravel, strong hydrocarbon odor (10-85-5).**	
10									
15									

Drilling Co./Driller: Cascade/Scott
Drilling Equipment: Hollow Stem Auger
Sampler Type: Split-Spoon
Hammer Type/Weight: lbs
Total Boring Depth: 20.5 feet bgs
Total Well Depth: 20 feet bgs
State Well ID No.:

Well/Auger Diameter: 2"/4" inches
Well Screened Interval: 5 to 20 feet bgs
Screen Slot Size: 0.010 inches
Filter Pack Used: Silica 4' -20'
Surface Seal: Concrete 0'-1'
Annular Seal: Bentonite Chips 1'-4'
Monument Type: Flush Mount

Notes/Comments:

SoundEarth Strategies

Project: TOC Holdings Co. Facility No. 01-443
Project Number: 0440-041
Logged by: WBC
Date Started: 08/30/12
Surface Conditions: Concrete
Well Location N/S:
Well Location E/W:
Reviewed by: Draft
Date Completed: 08/30/12

BORING LOG MW15A

Site Address: 4910 Leary Avenue Northwest
Seattle, Washington

Water Depth At Time of Drilling: -- feet bgs
Water Depth After Completion: -- feet bgs

Depth (feet bgs)	Interval	Blow Count	% Recovery	PID (ppmv)	Sample ID	USCS Class	Graphic	Lithologic Description	Well Construction Detail
15		30 40 50	60	5.0		SM		**Damp, firm, silty fine to medium SAND, trace gravel, gray, slight odor (10-85-5).**	
				4.1					
		36 45 50	95		MW15A-17.5	SM		**Damp, firm, silty fine to medium SAND, trace gravel, gray, no hydrocarbon odor (10-85-5).**	
		35 48 50	100	8.6	MW15A-20.5	SM		**Damp, firm, silty fine to medium SAND, trace gravel, gray, no hydrocarbon odor (10-85-5).**	
20				10.0				**Boring terminated at 20.5. bgs, well installed @20' bgs.**	
25									
30									

Drilling Co./Driller: Cascade/Scott
Drilling Equipment: Hollow Stem Auger
Sampler Type: Split-Spoon
Hammer Type/Weight: lbs
Total Boring Depth: 20.5 feet bgs
Total Well Depth: 20 feet bgs
State Well ID No.:

Well/Auger Diameter: 2"/4" inches
Well Screened Interval: 5 to 20 feet bgs
Screen Slot Size: 0.010 inches
Filter Pack Used: Silica 4' -20'
Surface Seal: Concrete 0'-1'
Annular Seal: Bentonite Chips 1'-4'
Monument Type: Flush Mount

Notes/Comments:

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / David
Drilling Method:	Hollow-Stem Auger
Location:	~12.75 feet West and 4 feet South of MW02
Surface Condition:	Asphalt
Total Depth:	21
First GW Depth:	12.5

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Asphalt		
1								Soil cuttings - Moist, medium dense, gravelly fine to medium SAND, trace to some silt, no hydrocarbon odor (Fill).		
2										
3							FILL			
4										
5	7				B07-05					
6	9	2.2	80				FILL	Moist, fine to medium SAND, some gravel, trace to some silt, brown with some gray, no hydrocarbon odor (Fill)	Moist	
7	9									
8	23	161	90		B07-07.5		SP-SM	Moist, very dense, gravelly fine to medium SAND, some silt grading to "silty" at 8 feet bgs, brown mixed with stained gray, moderate hydrocarbon odor.	Moist	
9	50/6"									
10	27				B07-10		SM	Moist, very dense, silty fine SAND, some gravel, stained gray, moderate to strong hydrocarbon odor.	Moist	
11	50/6"	1,809	100							
12									▽	
13	21				B07-12.5		SM	Same as above, wet, strong hydrocarbon odor.	Wet	
14	50/6"	1,464	100				SP	Wet, very dense, gravelly fine to coarse SAND, trace to some silt, strong hydrocarbon odor.		
15	9				B07-15					
16	11	78.9	95				SP	Wet, medium dense, medium to coarse SAND, some gravel, trace silt, gray, weak to moderate hydrocarbon odor.	Wet	
17	13									
18	18	89.0	100		B07-17.5		SP-SM	Wet, very dense, gravelly fine to coarse SAND, some silt and local silt-rich zones, gray, moderate hydrocarbon odor.	Wet	
19	50/6"									
20	24	37.4	100		B07-20		SM	Wet, very dense, silty fine SAND, some gravel, gray, moderate hydrocarbon odor.	Wet	
21	50/6"									
22								Boring terminated at 21 feet bgs and completed as a 2-inch-diameter monitoring well MW11, screened from 5-20 feet below ground surface (bgs). Concrete from 0-2 feet bgs, bentonite seal from 2 to 4 feet bgs, and sand filter pack from 4 to 20 feet bgs.		
23										
24										
25										

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TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 1/16/2009
Date Finished: 1/16/2009
Logged By: CCC
Chk By: JAC
Project No.: 0440-041

BORING LOG
B07/MW11

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Steve
Drilling Method:	LA Hollow-Stem Auger
Location:	
Surface Condition:	Asphalt
Total Depth:	20.5
First GW Depth:	10

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Asphalt (2 inches thick).		
1							SP	Hand cleared to 3 feet below ground surface (bgs). Soil cuttings - Moist, gravelly, fine- to coarse-grained SAND, fine to coarse gravel, trace to some silt, brown, no hydrocarbon odor (10-70-20) (Fill).		
2										
3										
4										
5	50/5	0.7	100				SP	Moist, medium dense, fine- to medium-grained SAND, some gravel, trace silt, brown, no sheen or hydrocarbon odor (5-85-10) (Fill).		
6										
7										
8	50/5	0.2	100		B08-07.5		SP	Same as above (Fill).		
9										
10	30				B08-10		SP	Same as above, wet (Fill).	▼	
11	26	1.0	100				GP	Wet, medium dense, fine GRAVEL, some silt, trace fine-grained sand, gray and brown, no sheen or hydrocarbon odor (10-5-85).	▽	
12	16									
13	50/6	67.8	100		B08-12.5		SM	Wet, medium dense, silty, fine-grained SAND, some fine gravel, brown and gray, faint to moderate hydrocarbon odor (20-70-10).		
14										
15	50/6	2.3	100		B08-15		SM	Moist, medium dense, silty, fine-grained SAND, some gravel, gray, no sheen, faint hydrocarbon odor (35-55-10).		
16										
17										
18	50/6	1.4	100				SM	Same as above, no hydrocarbon odor.		
19										
20	50/6	0.9	100				SM	Same as above.		
21								Boring terminated at 20.5 feet bgs and completed as a 2-inch-diameter monitoring well MW12, screened from 5-20 feet bgs. Concrete from 0 to 1.5 feet bgs, bentonite seal from 1.5 to 3 feet bgs, and sand filter pack from 3 to 20.5 feet bgs.		
22										
23										
24										
25										

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TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 4/20/2010
Date Finished: 4/20/2010
Logged By: PJK
Chk By: JAC
Project No.: 0440-041

BORING LOG
B08/MW12

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Steve
Drilling Method:	LA Hollow-Stem Auger
Location:	
Surface Condition:	Asphalt
Total Depth:	20.5
First GW Depth:	10

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0								Asphalt (2.5 inches thick).		
1							SP	Hand cleared to 3 feet below ground surface (bgs). Soil cuttings - Moist, gravelly, fine- to coarse-grained SAND, trace to some silt, brown, no hydrocarbon odor (10-70-20)(Fill).		
2										
3										
4										
5	39 50/3	1.9	100		B09-05		SP	Same as above, medium dense (5-80-15) (Fill).		
6										
7										
8	16 18 20	2.0	100		B09-09		SP	Same as above, some gravel (5-85-10).		
9									▼	
10									▽	
11	6 7 16	0.9	100		B09-11		SP	Same as above, wet, loose.		
12								Wet, loose, gravelly, fine- to medium-grained SAND, some silt, brown to gray, no sheen or hydrocarbon odor.		
13	50/6	1.3	100		B09-12.5		SP	Wet, medium dense, fine- to coarse-grained SAND, trace silt, gray, no sheen or hydrocarbon odor.		
14										
15	50/6	1.9	100		B09-15		SM	Moist, medium dense, silty, fine-grained SAND, trace fine gravel, dark gray, no sheen or hydrocarbon odor (40-55-5).		
16										
17										
18	50/5	1.4	100		B09-17.5		SM	Same as above, some fine gravel (35-55-10).		
19										
20	50/6		100		B09-20		SM	Same as above, trace fine gravel (40-55-5).		
21								Boring terminated at 20.5 feet bgs and completed as a 2-inch-diameter monitoring well MW13, screened from 5-20 feet bgs. Concrete from 0 to 1.5 feet bgs, bentonite seal from 1.5 to 3 feet bgs, and sand filter pack from 3 to 20.5 feet bgs.		
22										
23										
24										
25										

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TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 4/20/2010
Date Finished: 4/20/2010
Logged By: PJK
Chk By: JAC
Project No.: 0440-041

BORING LOG
B09/MW13

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Steve
Drilling Method:	LA Hollow-Stem Auger
Location:	
Surface Condition:	Asphalt
Total Depth:	20.5
First GW Depth:	10

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0–3							SP	Asphalt (2.5 inches thick). Hand cleared to 3 feet below ground surface (bgs). Soil cuttings - Moist, gravelly, fine- to coarse-grained SAND, trace to some silt, brown, no hydrocarbon odor (10-60-30) grading to moist, silty, fine- to medium-grained SAND, some gravel, brown, no hydrocarbon odor (30-50-10) (Fill).		
5–6	20 50/4	2.1	100		B10-05.5		ML	Moist, very stiff, SILT, some fine-grained sand, trace fine gravel, brown and gray, no hydrocarbon odor (85-10-5).		
8	50/6	1.8	100		B10-07.5		SP	Moist to wet, medium dense, gravelly, fine- to coarse-grained SAND, some silt, brown, no sheen or hydrocarbon odor (10-55-35).		
10–11			0					No recovery (cobble).	▽	
13	50/6	1.9	100		B10-12.5		SM	Moist, medium dense, silty, fine-grained SAND, some fine gravel, dark gray, no sheen or hydrocarbon odor (30-60-10).		
15–16	50/6	0.8	100		B10-15		SM	Same as above.		
18	50/6	0.9	100				SM	Same as above, damp, trace fine gravel (40-55-5).	▼	
20	50/6	0.5	100		B10-20		SM	Same as above.		
21–25								Boring terminated at 20.5 feet bgs and completed as a 2-inch-diameter monitoring well MW14, screened from 5-20 feet bgs. Concrete from 0 to 1.5 feet bgs, bentonite seal from 1.5 to 3 feet bgs, and sand filter pack from 3 to 20.5 feet bgs.		

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Steve
Drilling Method:	LA Hollow-Stem Auger
Location:	
Surface Condition:	Concrete
Total Depth:	20.5
First GW Depth:	7.5

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0							SP	Concrete (4 inches thick)		
1								Hand cleared to 3 feet below ground surface (bgs). Soil cuttings - Moist, gravelly, fine- to medium-grained SAND, trace silt, brown, no hydrocarbon odor (5-75-20).		
2										
3										
4										
5	50/6	1.0	100		B11-05		SM	Moist, medium dense, silty, gravelly, fine- to medium-grained SAND, fine gravel, brown with orange and black, no sheen or hydrocarbon odor (30-55-15)(Fill).		
6										
7									▽	
8	32 50/4	5.8	100		B11-08		SM	Wet, medium dense, silty, fine- to medium-grained SAND, some fine gravel, 1-inch layer of sand at 8 feet bgs, dark greenish gray, no sheen, moderate hydrocarbon odor (15-75-10).		
9										
10	50/2		0					No recovery (cobble).		
11										
12										
13	50/6	1.2	100		B11-12.5		SM	Damp, medium dense, silty, fine-grained SAND, trace gravel, grey, no sheen or hydrocarbon odor (40-55-5).		
14										
15	50/6	1.8	100		B11-15		SM	Same as above, no gravel (40-60-0).		
16										
17										
18	50/6	1.1	100				SM	Same as above, trace gravel (50-55-5).		
19										
20	50/6	0.8	100		B11-20		SM	Same as above. Tip of sample fine- to medium-grained SAND.		
21								Boring terminated at 20.5 feet bgs and completed as a 2-inch-diameter monitoring well MW15, screened from 5-20 feet bgs. Concrete from 0-1.5 feet bgs, bentonite seal from 1.5 to 3 feet bgs, and sand filter pack from 3 to 20.5 feet bgs.		
22										
23										
24										
25										

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TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

Date Started: 4/21/2010
Date Finished: 4/21/2010
Logged By: PJK
Chk By: JAC
Project No.: 0440-041

BORING LOG
B11/MW15

Log of Exploratory Boring:

Notes

Drilling Co./Driller:	Cascade / Steve
Drilling Method:	LA Hollow-Stem Auger
Location:	
Surface Condition:	Concrete
Total Depth:	20.5
First GW Depth:	7.5

Moisture Content:
Dry = Dry, Dp = Damp, Mst = Moist, Wet = Wet

Hydrocarbon Odor: NO = no odor, VFO = very faint odor
WO = weak odor, MO = moderate odor, SO = strong odor

Water Levels
▼ After Completion
▽ During Drilling

Depth (feet)	Blow Count	PID	Sample Recovery	Sample Interval	Sample ID	Lithography	USCS Class	Description	Moisture Content	Well Detail
0							SP	Concrete (4 inches thick)		
1								Hand cleared to 3 feet below ground surface (bgs). Soil cuttings - Moist, gravelly, fine- to medium-grained SAND, some silt, brown, no hydrocarbon odor.		
2										
3										
4										
5	30	0.5	100		B12-05.5		SP	Moist, medium dense, gravelly, fine- to medium-grained SAND, some silt, brown, no sheen or hydrocarbon odor (10-65-25).		
6	50/3									
7									▽	
8	40	1.0	100		B12-08		SP	Moist to wet, medium dense, fine- to medium-grained SAND, trace fine gravel and silt, grayish brown, no sheen or hydrocarbon odor (5-90-5).		
9	50/5									
10	50/6	0.6	100		B12-10		ML	Damp, very stiff, sandy SILT, fine-grained sand, gray, no sheen or hydrocarbon odor (70-30-0).		
11										
12										
13	50/6	0.4	100				SM	Damp, medium dense, silty, fine-grained SAND, gray, no sheen or hydrocarbon odor (45-55-0).		
14										
15	50/6	0.5	100		B12-15		SM	Same as above, less silt, dark gray (30-70-0).		
16										
17										
18	50/6	0.4	100				SM	Same as above, less silt, dark gray (25-75-0).		
19										
20	50/6	0.3	100		B12-20		SM	Same as above, silt content increased (30-70-0).		
21								Boring terminated at 20.5 feet bgs and completed as a 2-inch-diameter monitoring well MW16, screened from 5-20 feet bgs. Concrete from 0 to 1.5 feet bgs, bentonite seal from 1.5 to 3 feet bgs, and sand filter pack from 3 to 20.5 feet bgs.		
22										
23										
24										
25										

APPENDIX C

TIME SERIES PLOTS FOR GRPH IN GROUNDWATER MONITORING WELLS

GRPH vs. Time for All Monitoring Wells
TOC Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

APPENDIX D

TIME SERIES PLOTS FOR BENZENE IN GROUNDWATER MONITORING WELLS

Benzene vs. Time for All Monitoring Wells
TOC Facility No. 01-443
4910 Leary Avenue Northwest
Seattle, Washington 98107

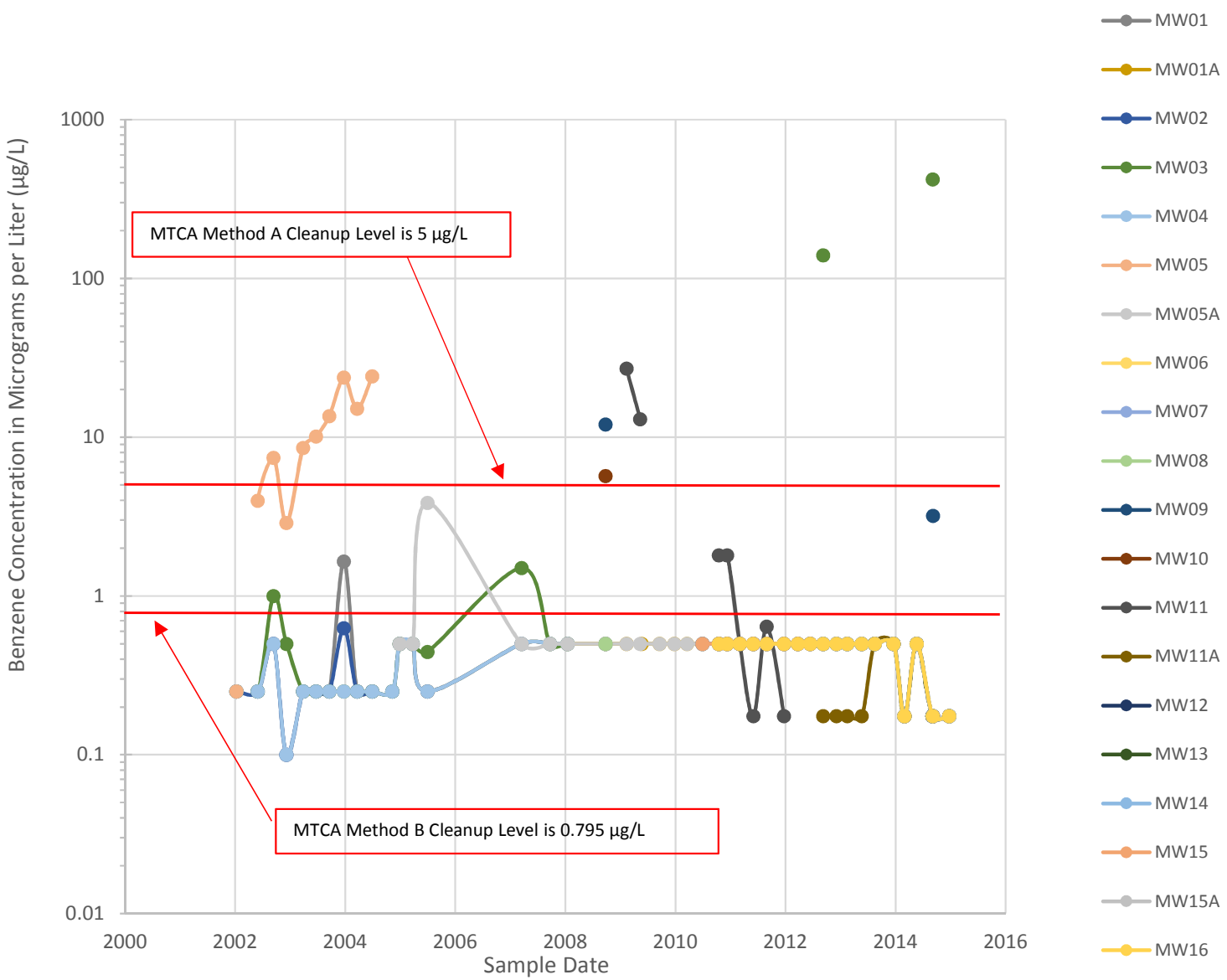

Table 4
Summary of Groundwater Data
TOC Holdings Co. Facility No. 01-443
4910 Leary Avenue Northwest, Seattle, Washington

Well ID	TOC (feet)	Date	Depth to Groundwater[1] (feet)	SPH Thickness[2]	Groundwater Elevation[3] (feet)	Analytical Results (µg/L)								
						GRPH[4]	Benzene[5]	Toluene[5]	Ethylbenzene[5]	Total Xylenes[5]	EDC[5]	Naphthalene[5]	DRPH[6]	ORPH[6]
MTCA Method B Cleanup Level for Groundwater[7]						**800/1,000[8, 9]**	**0.795**	**640**	**800**	**1600**	**0.481**	**160**	**500[9]**	**500[9]**
MW16	100.39	10/14/10	6.78	--	93.61	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	12/10/10	5.68	--	94.71	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	03/03/11	6.44	--	93.95	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	05/31/11	6.95	--	93.44	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	08/29/11	7.93	--	92.46	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	12/21/11	8.36	--	92.03	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	03/22/12	6.52	--	93.87	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	06/13/12	7.80	--	92.59	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	09/06/12	11.11	--	89.28	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	12/03/12	6.10	--	94.29	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	02/13/13	7.58	--	92.81	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	05/21/13	8.19	--	92.20	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	08/14/13	9.49	--	90.90	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	12/17/13	10.65	--	89.74	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	02/27/14	7.17	--	93.22	<100	<0.35	<1	<1	<3	--	--	--	--
MW16	100.39	05/20/14	7.71	--	92.68	<100	<1	<1	<1	<3	--	--	--	--
MW16	100.39	09/04/14	10.34	--	90.1	<100	<0.35	<1	<1	<3	<1	--	--	--
MW16	100.39	12/22/14	6.34	--	94.1	<100	<0.35	<1	<1	<3	<1	--	--	--

NOTES:
Red denotes concentration in excess of MTCA Method A Cleanup Level for Groundwater.
Samples collected after June 29, 2005, analyzed by Friedman & Bruya, Inc. of Seattle, Washington.
TOC elevations were surveyed relative to an arbitrary benchmark with an assumed elevation of 100.00 feet.
[1]Measured in feet below the top of the well casing.
[2]Calculated by subtracting the depth to SPH from the depth to groundwater.
[3]Calculated by subtracting the depth to groundwater from the TOC. If SPH is present, the SPH thickness multiplied by its specific gravity relative to water (0.8) is added to the depth to groundwater measurement.
[4]Analyzed by Method NWTPH-Gx.
[5]Analyzed by EPA Method 8021B, 8260B, or 8260C; see text for method used for current reporting period.
[6]Analyzed by Method NWTPH-Dx.
[7]MTCA Method A Cleanup Levels, Table 720-1, Section 900, Chapter 173 Title 340 of the WAC, revised November 2007.
[8]800 µg/L when benzene is present and 1,000 µg/L when benzene is not present.
[9]CLARC does not provide Method B values for TPH, so the Method A values are adopted.

Laboratory Note:
[x]The pattern of peaks present is not indicative of diesel.

-- = not analyzed/not measured; SPH not detected
< = not detected at a concentration exceeding the laboratory reporting limit
µg/L = micrograms per liter
DRPH = diesel-range petroleum hydrocarbons
EDC = 1,2-dichloroethylene (ethylene dichloride)
EPA = U.S. Environmental Protection Agency
GRPH = gasoline-range petroleum hydrocarbons
MTCA = Washington State Model Toxics Control Act
NM = not measured
NWTPH = Northwest Total Petroleum Hydrocarbon
ORPH = oil-range petroleum hydrocarbons
SPH = separate-phase hydrocarbons
SPH = SPH deteced; well not sampled
TOC = top of casing elevation
WAC = Washington Administrative Code