## East Bay Redevelopment Site

#### Prepared for:



Port of Olympia 606 Columbia St NW, Suite 300 Olympia, WA 98501



City of Olympia P.O. Box 1967 Olympia, WA 98507-1967



LOTT Clean Water Alliance 500 Adams Street NE Olympia, WA 98501

#### Prepared by:



5205 Corporate Center Ct. SE, Suite A Olympia, Washington 98503 Phone: 360.570.1700 Fax: 360.570.1777 www.uspioneer.com

September 2023



## **Certification**

This document was prepared under my direction. The information submitted is, to the best of my knowledge and belief, true, accurate, and complete.



9/1/2023

#### Chris Waldron, P.E.

Principal
PIONEER Technologies Corporation
Washington P.E. Registration No. 52744



## **Table of Contents**

<b>Section</b>	on 1: Introduction	<u>1-1</u>
1.1	Purpose	1-1
1.2	Background Information	1-1
1.3	Roles	1-2
1.4	Completion Criteria	1-2
1.5	Organization of this Report	1-3
<u>Section</u>	on 2: Interim Action Cleanup Activities	2-1
2.1	Infrastructure Interim Action (2009 and 2010)	2-1
2.2	Parcel 4/Parcel 5 Interim Action (2010 through 2012)	2-1
<u>Section</u>	on 3: 2017 Pre-Construction / Site Preparation Activities	3-1
3.1	Site Survey and Boundary Marking	3-1
3.2	1982 Fill Boundary Confirmation	3-1
3.3	Demolition and Clearing Activities	3-1
3.4	Stormwater Infrastructure	3-2
3.5	Dust Monitoring	3-2
3.6	Deviations	3-2
<u>Section</u>	on 4: 2017 Targeted Soil Removal	4-1
4.1	Overview	4-1
4.2	Excavation Activities	4-1
4.3	Stockpile Management and Sampling	4-2
4.4	Soil Disposal	4-2
4.5	Dewatering and Discharge	4-3
4.6	Dust Monitoring	4-3
4.7	Deviations	4-3
<u>Section</u>	on 5: 2017 Cover	5-1
5.1	Installation of the Soil Cover	5-1
5.2	Measuring Cover Thickness / Post-Construction Survey	5-1
5.3	Dust Monitoring	5-2
5.4	Deviations	5-2
<u>Section</u>	on 6: 2017 Controls	6-1
Section	on 7: References	7-1



## **Figures**

Figure 1	Vicinity Map
Figure 2	East Bay Redevelopment Cleanup Activity Areas (Including Interim Actions)
Figure 3	Parcel 4/Parcel 5 Interim Action Land Use
Figure 4	Fill Confirmation Hole Locations Along 1982 Fill Boundary
Figure 5	Locations of Decommissioned Wells and Removed Asphalt Pads
Figure 6	Soil Excavation Locations
Figure 7	Soil Cover Locations

## **Tables**

Table 1	Lot 1 – Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points
Table 2	Parcels 2 & 3 – Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points
Table 3	Parcels 6 & 7 – Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points
Table 4	Parcel 9 – Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

## **Appendices**

Appendix A	Environmental Covenants (with Institutional Controls)
Appendix B	Daily Field Notes
Appendix C	Photographic Log
Appendix D	Record Drawings with Survey Documentation
Appendix E	1982 Fill Boundary Confirmation Documentation
Appendix F	Well Decommissioning Field Sheets
Appendix G	Dust Monitoring Memo
Appendix H	Contaminated Soil Excavation and Confirmation Sampling Memo
Appendix I	Overburden Soil Stockpile Sampling Results
Appendix J	Soil Disposal Documentation
Appendix K	Water Sample Results / Sanitary Sewer Discharge Records
Appendix L	Geotextile Technical Specifications
Appendix M	Soil Cover (And Any Additional Gravel/Aggregate) Import Documentation
Appendix F Appendix G Appendix H Appendix I Appendix J Appendix K Appendix L	Well Decommissioning Field Sheets Dust Monitoring Memo Contaminated Soil Excavation and Confirmation Sampling Memo Overburden Soil Stockpile Sampling Results Soil Disposal Documentation Water Sample Results / Sanitary Sewer Discharge Records Geotextile Technical Specifications



## **List of Acronyms**

Acronym	Explanation				
bgs	Below the Ground Surface				
ВМР	Best Management Practice				
CAP	Cleanup Action Plan				
City	City of Olympia				
CL	Cleanup Level				
COC	Constituent of Concern				
Ecology	Washington State Department of Ecology				
EDR	Engineering Design Report				
ESM	ESM Consulting Engineers, LLC				
ESN Northwest	Environmental Services Network Northwest				
ft	Feet				
НОСМ	Hands-On Children's Museum				
IA	Interim Action				
IACL	Interim Action Cleanup Level				
IARL	Interim Action Remediation Level				
IARUPL	Interim Action Reuse Under Pavement Level				
IC	Institutional Control				
IOEI	IO Environmental & Infrastructure, Inc.				
LOTT	Lacey, Olympia, Tumwater, and Thurston County Clean Water Alliance				
MTCA	Model Toxics Control Act				
NE	Northeast				
O&M Plan	Long-Term Operations and Maintenance Plan				
PIONEER	PIONEER Technologies Corporation				
Port	Port of Olympia				
PPE	Personal Protective Equipment				
RI/FS	Remedial Investigation/Feasibility Study				
RL	Remediation Level				
Site	East Bay Redevelopment Site				
TCP	Toxics Cleanup Program				
WAC	Washington Administrative Code				



#### **SECTION 1: INTRODUCTION**

#### 1.1 Purpose

The purpose of this Cleanup Action Completion Report is to document the completion of the cleanup activities conducted at the Port of Olympia's (Port's) East Bay Redevelopment Site (site). The cleanup action included two interim actions (IAs) and activities performed in 2017 (referred to as 2017 cleanup activities). The site is located in Olympia, Washington on the southwest corner of the East Bay of Budd Inlet (see Figure 1).

#### **1.2** Background Information

Cleanup action activities have been conducted at this Model Toxics Control Act (MTCA) site since 2010. Site cleanup actions included two IAs (i.e., an Infrastructure IA and a Parcel 4/Parcel 5 IA) and the 2017 cleanup activities (see Figure 2). The Infrastructure IA was conducted in 2009/2010 on Port-maintained streets. The Parcel 4/Parcel 5 IA was conducted from 2010 through 2012 on City of Olympia (City) and Lacey, Olympia, Tumwater, and Thurston County Clean Water Alliance (LOTT) property. The 2017 cleanup action was conducted in Parcels 2, 3, 6, 7, 9, and Lot 1 from July through November 2017.

As part of the MTCA process, the Washington State Department of Ecology (Ecology) selected the 2017 cleanup remedy for the site: Targeted Soil Removal, Cover, and Controls. The selected remedy included removing soil with constituent of concern (COC) concentrations above remediation levels (RLs) and installing a clean, protective soil cover over areas of the site not already containing clean fill material (referred to as 1982 fill) at the ground surface (Ecology 2017b).

2017 cleanup activities were conducted pursuant to Agreed Order DE14072. The following documents were prepared in order to satisfy requirements of the Agreed Order DE14072 (Ecology 2017a):

- Cleanup Action Plan (CAP; Ecology 2017b)
- Engineering Design Report (EDR; PIONEER Technologies Corporation [PIONEER] 2017a)
- East Bay Parcels Cleanup Plan Set (ESM Consulting Engineers, LLC [ESM] 2017)
- Contract Provisions with Sample Contract Forms (containing technical specifications; Port 2017)
- Application for coverage under Construction Stormwater General Permit #WAR305540
- LOTT Discharge Authorization Letter

Information about the site's background and processes leading up to cleanup activities were presented in the Remedial Investigation/Feasibility Study (RI/FS) Report and the EDR (PIONEER 2016, 2017a).

<sup>&</sup>lt;sup>1</sup> Parcel names and configurations are subject to change over time. The parcel names referenced in this completion report are consistent with those used in the EDR (PIONEER 2017a).



#### 1.3 Roles

The Port (as owner) performed primary oversight of 2017 cleanup activities. PIONEER assisted with construction oversight, including dust monitoring and soil sampling associated with excavation and disposal of contaminated materials. ESM performed a site design survey prior to construction activities, prepared engineering drawings, and served as engineer of record. The general contractor IO Environmental & Infrastructure, Inc. (IOEI) completed construction activities including, but not limited to, excavation of contaminated soil, installation of the clean soil cover, and installation of the stormwater conveyance system. Environmental Services Network Northwest (ESN Northwest), under subcontract to IOEI, decommissioned the remaining monitoring wells at the site. Mtn2Coast, LLC, under subcontract to IOEI, performed a topographical survey of the soil cover area, pre- and post-installation.

#### **Health & Safety:**

Contractors and field personnel complied with the health, safety, and personal protective equipment (PPE) requirements outlined in the EDR and companies' respective health and safety plans for workers.

#### **Best Management Practices (BMPs):**

BMPs were implemented during the project to be protective of human health and the environment throughout the cleanup action. Stormwater and sediment BMPs included, but were not limited to: a boot wash station, a wheel wash, designated construction entrances/exits, silt fences, dust monitoring at site boundaries, wetting/spraying soil during excavations, and catch basin inlet protection. BMPs were documented in field notes and photographs which are presented in Appendices B and C, respectively.

#### 1.4 Completion Criteria

Site cleanup actions were performed in general accordance with the Agreed Order DE14072, Ecology-approved documents, and project permits. With the 2017 clean soil cover in place, and assuming all institutional controls [ICs] are enforced, the site is considered protective of human health and the environment (ICs are presented in Appendix A). ICs being implemented at the site include the following:

- Placement of a hard cap or soil cover underlain with a geotextile to prevent contact with contaminated soil.
- Prohibition of breaching of the cap/soil cover without prior written approval from Ecology.
- Prohibition of installing wells for water supply purposes.
- Prohibition of extraction of groundwater for any purpose other than temporary construction dewatering, investigation, monitoring, or remediation.
- Prohibition of discharge of groundwater extracted from the Property, unless done in accordance with state and federal law.
- Prohibition of activities inconsistent with the approved Operations and Maintenance Plan for the Site (PIONEER 2023).
- Prohibition of construction or occupancy of single-family residences cover, unless done with prior written approval from Ecology.

Therefore, the two IAs and the 2017 cleanup action satisfy project requirements and are deemed complete.



#### 1.5 Organization of this Report

This remainder of this report is organized as follows:

- Section 2: Interim Action Cleanup Activities
- Section 3: 2017 Pre-Construction / Site Preparation Activities
- Section 4: 2017 Targeted Soil Removal
- Section 5: 2017 Cover
- Section 6: 2017 Controls
- Section 7: References



#### **SECTION 2: INTERIM ACTION CLEANUP ACTIVITIES**

Two IAs (the Infrastructure IA and the Parcel 4/Parcel 5 IA) were performed at the site prior to the 2017 cleanup activities. Summaries of the two IAs are presented in this section.

#### 2.1 Infrastructure Interim Action (2009 and 2010)

The Infrastructure IA was a joint cleanup and civil engineering development/improvement project for key transportation corridors for the Port, City, and other public users. In order to modify existing infrastructure and facilitate future site development, the Port installed utilities, roads, bike lanes, sidewalks, and other ancillary improvements along the streets (see Figure 2). During construction activities, excavated soil was stockpiled, sampled for COCs, and categorized for potential reuse under future pavement and adjacent to new infrastructure. Only soil that was geotechnically-suitable for reuse and had COC concentrations below pre-established IA Reuse Under Pavement Levels (IARUPLs) and/or IA cleanup levels (IACLs) was reused. Soil that did not meet these requirements and excavated soil that was not needed at the site (i.e., excess soil) was disposed of off-site at the Weyerhaeuser Regional Landfill in Castle Rock, Washington.

Details regarding the Infrastructure IA were presented in the Ecology-approved Infrastructure Interim Action Report for East Bay Redevelopment Site (PIONEER 2010).

#### **2.2** Parcel 4/Parcel 5 Interim Action (2010 through 2012)

The Parcel 4/Parcel 5 IA was a joint cleanup and development project which included soil cleanup activities, the construction of the City's Hands-On Children's Museum (HOCM) and associated parking area on Parcel 5, and the construction of LOTT's public-use plaza on Parcel 4 (see Figures 2 and 3). The selected soil cleanup alternative implemented at the site was capping with partial excavation and controls. The IA was completed in two stages which included the following:

Stage 1 (began in October 2010):

- Parcel 4 and Parcel 5 hot spot excavations
- Partial excavation and capping on Parcel 5
- HOCM construction

Stage 2 (began in September 2011):

- Partial excavation and capping on Parcel 4
- Plaza construction

Five hot spot soil excavations were performed in Parcels 4 and 5, centered on locations with COC IA remediation level (IARL) exceedances (see Figure 3). These soil removal locations were initially 20 feet (ft) by 20 ft in area, with depths extending to the depth of known COC IARL exceedances for each location. Excavation sidewall and bottom samples were collected to confirm that soil left in place had COC concentrations less than IARLs. Prior to backfilling the hot spot excavations, a permeable geotextile



liner was installed to indicate the boundary between potentially-contaminated soil and clean soil for future intrusive soil activities.

After the hot spot soil was excavated, earthwork cleanup activities were conducted for planned hardscaped areas (e.g., building footprint, impervious pavement) and softscaped areas (e.g., landscaped areas containing a soil cover). For hardscaped areas, existing soil was left in place since the hardscaped cap would prevent exposure to soil with COC concentrations potentially greater than IACLs (but less than IARLs). For softscaped areas, soil was excavated to six feet below the design ground surface grade or until groundwater was encountered. A permeable geotextile was installed and the excavations were backfilled with clean soil. Hardscaped and softscaped areas are presented on Figure 3.

Excavated soil was stockpiled, sampled, and categorized for reuse at the site or for disposal. Geotechnically-suitable soil with COC concentrations less than IACLs and IARLs could be reused under much of the site. Geotechnically-suitable soil with COC concentrations greater than IACLs but less than IARLs could be reused beneath hardscaped capped areas of the site. Sample results demonstrated there was an excess volume of soil with COC concentrations between IACLs and IARLs (i.e., suitable only for reuse beneath hardscaped areas). Because the amount of soil suitable only for reuse beneath hardscaped areas exceeded the needed volume, the excess soil was disposed of off-site.

For more specific details on the work completed, please refer to the Ecology-approved Parcel 4/Parcel 5 Interim Action Work Plan (Brown and Caldwell 2010) and Parcel 4/Parcel 5 Interim Action Report (Brown and Caldwell 2015).



## SECTION 3: 2017 PRE-CONSTRUCTION / SITE PREPARATION ACTIVITIES

The pre-construction and site preparation activities conducted for the 2017 cleanup activities are documented in this section. Daily field notes and photographs of pre-construction/site preparation activities are presented in Appendices B and C, respectively.

#### 3.1 Site Survey and Boundary Marking

Prior to construction activities, ESM surveyed the site and Mtn2Coast conducted a pre-soil cover topographical survey. ESM marked/staked the following during the site survey:

- The site and 1982 fill boundaries;
- Planned excavation extents; and
- Other physical features.

Mtn2Coast surveyed the existing ground elevations (i.e., prior to the installation of the geotextile fabric and the 12-inch soil cover). Survey documentation in presented in Appendix D.

#### 3.2 1982 Fill Boundary Confirmation

Port and PIONEER personnel verified the plotted extent of existing, clean fill material from a 1982 cleanup event (referred to as "1982 fill"). Twenty, one-and-a-half-foot deep holes were dug at 50-foot intervals along the previously estimated and surveyed/staked 1982 fill boundary line which passed through Parcels 2, 6, 7, and Lot 1 (see Figure 4). The sidewalls of each hole were inspected to confirm that there was at least one vertical foot of 1982 fill (based on soil/rock characteristics) or more recent clean fill in place since multiple construction and IA fill events have occurred in the past few decades. The findings confirmed that the 1982 fill extended as far as the cautiously-estimated boundary (if not farther).<sup>2</sup> Observations and photographs from the 1982 fill boundary confirmation activities were documented in field notes and a photographic log which are presented in Appendix E.

#### 3.3 Demolition and Clearing Activities

Demolition and clearing activities included decommissioning wells, removing asphalt pads, clearing and grubbing vegetation, modifying stormwater infrastructure, and monitoring airborne dust levels. The activities are summarized in this section.

#### 3.3.1 Well Decommissioning

Eighteen monitoring wells were decommissioned at the site in general accordance with Washington Administrative Code (WAC) 173-160, (see Figure 5). ESN Northwest decommissioned the wells by grouting wells in place and removing some well monuments as part of grading activities. Well

<sup>&</sup>lt;sup>2</sup> The 1982 fill boundary was estimated during the RI/FS process for the site (PIONEER 2016).



decommissioning activities were documented in ESN Northwest's field report which is included as Appendix F of this report.

#### 3.3.2 Asphalt Pad Removal

Asphalt pads in Parcels 3, 6, 7, and 9 were removed and temporarily stockpiled in each parcel. The asphalt material was transported and disposed off-site for recycling.

#### 3.3.3 Vegetation Clearing and Grubbing

Vegetation, primarily present at Parcels 2 and 3, was cleared and grubbed prior to installing the soil cover. Vegetation absent of attached soil was transported and disposed off-site for recycling. Vegetation associated with grubbing was temporarily stockpiled and subsequently used to fill the upper portion of the existing engineered drainage trenches (i.e., placed above two- to four-inch quarry spall rock at the base of the trenches).

#### 3.4 Stormwater Infrastructure

Stormwater infrastructure was modified prior to cleanup activities. The existing catch basins in Parcels 7, 9, and Lot 1 were removed and the inlet and/or outlet pipes were capped. New stormwater conveyance system infrastructure was installed in Parcels 2 and 3 and tied into the City stormwater conveyance system at Chestnut Street Northeast (NE) and Jefferson Street NE (see record drawings in Appendix D).

Modifications to the new stormwater conveyance system infrastructure design included the following:

- An additional catch basin, designated as catch basin #5, was added in Parcel 2 between catch basin #3 and the connection to the City stormwater conveyance system at Chestnut Street NE.
- An 8-inch (instead of a 12-inch) diameter storm drain pipe was installed in Parcel 2 between the additional catch basin #5 and the City connection at Chestnut Street NE. The smaller storm drain pipe was installed due to existing underground utilities (near Chestnut Street NE) located above and below the proposed pipe that would not have allowed a 12-inch diameter pipe to fit.

#### **3.5 Dust Monitoring**

Dust monitoring was performed during pre-construction/site preparation activities that had the potential to generate dust. Dust sampling units were placed on site boundary fences near the dust-generating activities and/or on an IOEI construction crew member. The dust monitoring data demonstrated there were no exceedances of the airborne dust action level (1 milligram per cubic meter) selected to be protective of human health at/near the site. For information on the dust monitoring program and the data collected, see Appendix G.

#### 3.6 Deviations

Two pre-construction/site preparation activities deviated from (or were not documented in) the EDR.

 Quarry spall rocks were added to the base of the existing engineered drainage trenches to provide added stability. The quarry spall rocks were not specified in the EDR but were added based on professional judgement in the field.







## **SECTION 4: 2017 TARGETED SOIL REMOVAL**

#### 4.1 Overview

For the targeted soil removal component of the site remedy, soil with COC concentrations greater than RLs was excavated. Three sample locations (DP04, MW24S, and DP06/SVP-2SO) were excavated in Parcel 3 (see Figure 6 and the record drawings in Appendix D).

The contamination depth and concentrations for the three locations were presented in the EDR and are summarized in the following table.

	<b>Exceedance Depth</b>			
RL Exceedance	(feet below ground	Constituent(s)	Concentration	DI
Location	surface [bgs])	Constituent(s)	Concentration	RL
DP04	4 – 6	Arsenic	52 mg/kg	20 mg/kg
MW24S	6.5 – 8	Total Dioxins/Furans	979 ng/kg	590 ng/kg
DP06	3-5	TPH-G	290 mg/kg	100 mg/kg
DPUb	3-3	Total Naphthalenes	142 mg/kg	5.0 mg/kg
SVP-2SO	4-6	TPH-G	1,100 mg/kg	100 mg/kg
	4-0	Total Naphthalenes	150 mg/kg	5.0 mg/kg

#### 4.2 Excavation Activities

Excavations were advanced to the following widths and depths:

- Excavation DP04: 10ft x 10ft x 7ft
- Excavation MW24S:10ft x 10ft x 9ft
- Excavation DP06/SVP-2SO:<sup>3</sup> 10ft x 10ft x 4.5ft

The overburden and RL exceedance soil was excavated and stored in separate, temporary stockpiles (i.e., two stockpiles: one overburden and one RL exceedance stockpile) for each excavation.

PIONEER personnel collected sidewall and bottom confirmation samples from the excavations and submitted the samples to the laboratory for each excavation's applicable COC analysis. The analytical results from these soil samples was used to determine whether excavations were complete or needed to be expanded to fully remove soil with RL exceedances. Excavation activities were summarized in the Round 01 Excavations and Confirmation Soil Sampling Results memo which is presented in Appendix H.

#### **4.2.1** Sampling Location Modifications

Sampling locations at DP04 and MW24S were modified in the field due to unexpected subsurface concrete foundations. The sampling location modifications are summarized in this section.

<sup>&</sup>lt;sup>3</sup> DP06 and SVP-2SO are co-located and form one excavation.



#### 4.2.1.1 DP04

While excavating DP04, a step-down concrete footer was discovered between two and six feet bgs. The concrete footer obstructed the intended location of the eastern sidewall sample (i.e., from two to six feet bgs). As a result, the confirmation soil sample on the eastern wall of the DP04 excavation was collected from six to seven feet bgs, as opposed to the intended four to six feet bgs location.

#### 4.2.1.2 MW24S

While excavating MW24S, a concrete structure was encountered at three feet bgs. The concrete structure in MW24S obstructed the intended northern sidewall sample location (i.e., the center of the sidewall). Instead of sampling the center of the northern sidewall of MW24S, the sample location was offset by three feet (but at the planned depth of six and a half to eight feet bgs).

#### 4.2.2 Results

Laboratory results demonstrated that COC concentrations at all sample points were below RLs (see Appendix H). Therefore, none of the excavations needed to be expanded prior to installing the geotextile fabric and backfilling with clean, imported soil.

#### 4.3 Stockpile Management and Sampling

Overburden and COC exceedance soil was stockpiled separately for each excavation. Stockpiles were temporarily stored on top of impervious polyethylene liners and then covered and secured with impervious polyethylene liners. A color-coded sign was taped on each stockpile's top liner to reflect the soil designation: Class A (suitable for reuse under the soil cover), Class B (designated for off-site disposal), or Unclassified (awaiting sampling or sample analytical results).

Overburden stockpiles were sampled for the COCs applicable to the respective excavation. Excavation DP04 and DP06/SVP-2SO overburden stockpiles were sampled to determine whether or not the soil could be reused at the site beneath the clean soil cover. Based on the analytical results, DP04 and DP06/SVP-2SO overburden soil stockpiles were suitable for reuse beneath the clean soil cover (see Appendix I). The overburden soil from excavation MW24S was unsuitable for potential reuse due to poor geotechnical soil qualities; therefore, the soil was sampled in accordance with landfill requirements and designated for off-site disposal.

COC exceedance soil stockpiles were sampled for applicable COCs and additional parameters (i.e., metals) as required by the landfill. A summary of the disposal stockpile sampling results is presented in a memo in Appendix J.

#### 4.4 Soil Disposal

Approximately 89 tons of contaminated and excess soil were transported and disposed of as non-hazardous waste. Dietrich Trucking LLC transported and disposed of the soil at the Wasco County Landfill in The Dalles, Oregon (licensed Subtitle D landfill facility). Documentation pertaining to the characterization, transport, and disposal of soil from the site is presented in Appendix J.



#### 4.5 Dewatering and Discharge

Dewatering was performed to support excavation activities in the saturated soil zone at locations DP04 and MW24S. Groundwater was pumped from the two excavations and temporarily stored on-site in a 20,000-gallon tank. Dewatering was not required at DP06/SVP-2SO as the excavation depth was 4.5 feet bgs and groundwater was not encountered.

The temporarily-stored groundwater was sampled per the requirements of the LOTT Discharge Authorization Letter (see Appendix K). Since all water quality results were below the discharge parameter limits, water treatment was not required prior to discharge (see Appendix K). In compliance with LOTT and City requirements, 9,568 gallons of groundwater were discharged to the sanitary sewer system on November 2, 2017 (see Appendix K). Settled solids at the base of the tank were removed and included with contaminated and excess soil disposal as discussed in Section 4.4.

#### **4.6 Dust Monitoring**

Dust monitoring was performed during excavation activities that could potentially generate dust. Dust sampling units were placed on site boundary fences near the dust-generating activities and/or on an IOEI construction crew member. The logged dust monitoring data demonstrated there were no exceedances of the airborne dust action level (1 milligram per cubic meter) selected to be protective of human health at/near the site. For information on the dust monitoring program and the data collected, see Appendix G.

#### 4.7 Deviations

Three soil excavation activities deviated from (or were not documented in) the EDR.

- The location of one confirmation soil sample from the DP04 excavation was adjusted due to an unexpected concrete footer in the excavation. The sample on the eastern wall of the DP04 excavation was collected from six to seven feet bgs rather than from four to six feet bgs (see Section 4.2.1.1).
- The location of one confirmation soil sample from the MW24S excavation was adjusted due to an unexpected concrete structure at three feet bgs. The sample from the center of the northern sidewall of MW24S was offset by three feet but was collected from the planned depth of six and a half to eight feet bgs (see Section 4.2.1.2).
- The overburden stockpile for MW24S was designated for soil disposal rather than potential reuse under the clean soil cover due to poor physical soil qualities (i.e., it was not geotechnically suitable for reuse). Therefore, all excavated soil from the MW24S excavation was disposed of off-site.

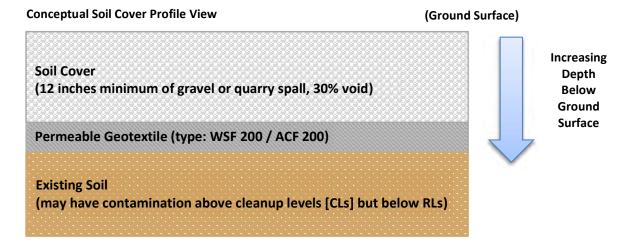


#### **SECTION 5: 2017 COVER**

#### **5.1** Installation of the Soil Cover

For the cover component of the site remedy, a minimum of 12 inches of soil cover was installed throughout Parcels 2, 3, 6, 7, 9, and Lot 1 wherever clean 1982 fill had not been placed (see Figure 7). After the existing site soil was graded and soil with RL exceedances was excavated, a permeable geotextile liner (type WSF 200/ACF 200 Woven Geotextile) was placed in the areas designated to have the soil cover installed. In larger areas requiring multiple liners for full coverage, adjacent geotextiles were overlapped a minimum of one foot at geotextile edges. Approximately 9,917 cubic yards of clean permeable ballast gravel with a 30% void ratio were imported, stockpiled, and placed over the geotextile to make up the 12-inch-minimum-thickness soil cover. Details regarding the geotextile liner are presented in Appendix L and details about the aggregate type are presented in Appendix M.

Below is a conceptual profile view of the soil cover components. See Figure 7 for a plan view of the soil cover locations at the site.



Note: Not to scale

#### **5.2** Measuring Cover Thickness / Post-Construction Survey

After the soil cover was installed, Mtn2Coast surveyors completed a post-construction topographical survey. The post-construction elevations were compared to pre-construction elevations to verify that a minimum of 12 inches of cover had been placed throughout the designated soil cover areas. The record drawings, elevation figures, and corresponding soil cover contour maps are presented in Appendix D. Pre- and post-cover elevations are presented in Tables 1 through 4.

<sup>&</sup>lt;sup>4</sup> ESM calculated the approximate volume of imported rock (in cubic yards) for the soil cover using AutoCAD Civil 3D software and the pre- and post-cover installation survey data.



#### **5.3** Dust Monitoring

Dust monitoring was performed during cover installation activities that could potentially generate dust. Dust sampling units were placed on site boundary fences near the dust-generating activities and/or on an IOEI construction crew member. The dust monitoring data demonstrated there were no exceedances of the airborne dust action level (1 milligram per cubic meter) selected to be protective of human health at/near the site. For information on the dust monitoring program and the data collected, see Appendix G.

#### 5.4 Deviations

The only deviation from the EDR during the soil cover installation was that the one-foot-thick soil cover was extended past the 1982 fill boundary in Parcels 2, 6, 7, and Lot 1. The cover was extended one foot east of the 1982 fill boundary at full thickness (12 inches) and then tapered off at a 2:1 (horizontal: vertical) ratio. The cover was extended in order to prevent a loss in soil cover height at the edge of the fill boundary. The tapered edge of the soil cover is reflected in the record drawings in Appendix D.



## **SECTION 6: 2017 CONTROLS**

In order to protect human health and the environment and maintain the effectiveness of the site remedy, ICs were implemented and a Long-term Operations and Maintenance Plan (O&M Plan) was developed (PIONEER 2023). Per the CAP and EDR, and in accordance with WAC 173-340-440 and Ecology's Toxics Cleanup Program (TCP) Procedure 440A, ICs were applied to the site as part of legally-binding environmental covenants, which are presented in Appendix A. Although the environmental covenants have only been finalized on a portion of the Lots, the ICs are being implemented throughout the site. Currently, Lots 9, 10, 11, and 12 have finalized environmental covenants. The ICs being implemented are listed in Section 1.4. The O&M Plan, developed in accordance with Agreed Order DE14072 and WAC 173-340-400(4)(c), was submitted for Ecology review on December 15, 2017, 30 days after official construction completion at the site on November 15, 2017. The O&M Plan includes site inspection guidance and recordkeeping requirements, in order to ensure the construction remedy is preserved in good form.



## **SECTION 7: REFERENCES**

Brown and Caldwell 2010. Parcel 4/Parcel 5 Interim Action Work Plan. September 23.

Brown and Caldwell 2015. Parcel 4/Parcel 5 Interim Action Report. February 23.

Ecology 2017a. Agreed Order No. DE14072. May 30.

Ecology 2017b. Cleanup Action Plan, East Bay Redevelopment Site. March.

ESM 2017. East Bay Parcels Cleanup Plan Set. May 23.

PIONEER 2010. Infrastructure Interim Action Report for East Bay Redevelopment Site. June.

PIONEER 2016. Remedial Investigation/Feasibility Study Report, East Bay Redevelopment Site. December.

PIONEER 2017a. Engineering Design Report for Cleanup Implementation, East Bay Redevelopment Site. June.

PIONEER 2023. Long-term Operations & Maintenance Plan, East Bay Redevelopment Site. September.

Port 2017. Contract Provisions with Sample Contract Forms, Project Number ENV1303, East Bay Parcels Cleanup. June 15.

# **Figures**

This page has been left bla double-side	ink intentionally to allow for ed printing.	



Vicinity Map Cleanup Action Completion Report East Bay Redevelopment Site

Figure 1

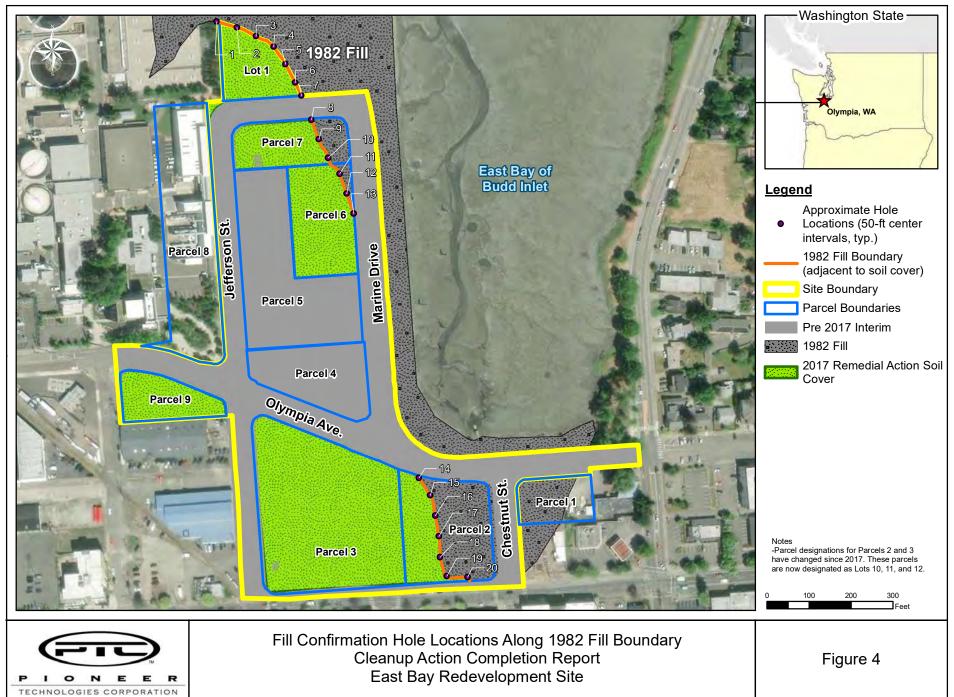


East Bay Redevelopment Cleanup Activity Areas (Including Interim Actions)
Cleanup Action Completion Report
East Bay Redevelopment Site

Figure 2



Parcel 4 /Parcel 5 Interim Action Land Use Cleanup Action Completion Report East Bay Redevelopment Site



Document Path: G:\Projects\Port of Olympia\East Bay\G\S\Waps\Waps\Z023\Completion Report Update



Locations of Decommissioned Wells and Removed Asphalt Pads Cleanup Action Completion Report East Bay Redevelopment Site

Figure 5



Soil Excavation Locations Cleanup Action Completion Report East Bay Redevelopment Site

Figure 6

TECHNOLOGIES CORPORATION

# **Tables**



Table 1: Lot 1 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre-Soil Cover Survey Point		Ро	st-Soil Cover Survey F	Point	Survey Point ID	Distance Between		
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-1)	Points (ft)	Elevation Change <sup>1</sup> (ft)
1042893.6	634979.8	14.0	1042893.7	634979.7	15.3	1	0.1	1.3
1042998.9	634911.0	14.2	1042998.8	634910.8	15.2	2	0.2	1.0
1042897.9	634930.0	14.0	1042898.0	634929.8	15.2	3	0.2	1.2
1043023.7	634913.0	14.3	1043023.8	634912.9	15.3	4	0.2	1.0
1042900.0	634904.5	14.8	1042900.4	634904.5	15.8	5	0.4	1.0
1043046.8	634936.6	14.8	1043046.7	634936.3	15.9	6	0.4	1.1
1042887.7	635054.4	14.9	1042888.0	635054.7	16.2	7	0.4	1.2
1043019.0	634985.9	15.0	1043019.6	634985.3	16.4	8	0.8	1.4
1043048.1	634915.2	14.2	1043047.5	634914.5	15.6	9	0.9	1.3
1042975.0	634885.5	14.9	1042975.7	634886.1	15.9	10	0.9	1.0
1042973.2	634908.9	14.3	1042973.8	634909.8	15.3	11	1.1	0.9
1043072.7	634917.3	14.9	1043074.0	634917.2	16.1	12	1.2	1.2
1042890.3	635029.0	14.6	1042891.6	635029.1	15.7	13	1.4	1.0
1043022.6	634936.3	14.4	1043022.4	634934.8	15.5	14	1.5	1.1
1042895.8	634953.5	14.1	1042895.4	634955.1	15.3	15	1.6	1.3
1042916.9	635006.7	14.8	1042918.6	635005.6	15.9	16	2.1	1.0
1043018.0	635012.1	15.4	1043019.1	635010.1	16.4	17	2.3	1.0
1042923.0	634906.2	14.7	1042924.9	634904.6	15.9	18	2.4	1.3
1042917.0	634981.4	14.6	1042919.3	634980.1	15.6	19	2.6	1.0
1042919.5	634955.8	14.3	1042921.1	634953.5	15.3	20	2.8	1.0
1042943.5	635007.9	14.9	1042946.2	635006.6	16.1	21	3.0	1.2
1042891.8	635001.5	14.0	1042892.4	635004.5	15.5	22	3.1	1.4
1043019.9	634961.8	14.6	1043021.1	634958.8	15.7	23	3.3	1.0
1042925.5	634881.3	15.0	1042926.5	634884.5	16.1	24	3.3	1.1
1042999.8	634887.1	14.7	1043002.5	634889.1	15.6	25	3.3	1.0
1042968.2	634982.2	14.5	1042970.3	634979.5	15.4	26	3.4	1.0
1043024.9	634888.9	14.6	1043028.1	634890.0	15.5	27	3.4	1.0
1042943.8	634982.3	14.4	1042947.3	634982.6	15.6	28	3.5	1.2
1042940.2	635033.9	15.4	1042942.8	635030.9	16.4	29	3.9	1.0
1042996.8	634935.2	14.2	1043000.9	634935.8	15.3	30	4.1	1.1
1042947.9	634932.5	14.3	1042952.1	634931.7	15.3	31	4.3	1.0
1042965.4	635035.3	15.7	1042967.0	635039.7	16.9	32	4.7	1.2
1042902.2	634878.3	15.0	1042904.8	634882.4	16.1	33	4.8	1.2
1042950.0	634907.0	14.5	1042949.9	634902.3	15.8	34	4.8	1.3
1042993.6	634985.3	14.8	1042998.4	634985.1	15.9	35	4.8	1.0
1042994.0	634960.7	14.1	1042996.4	634956.4	15.4	36	4.9	1.2
1043049.4	634890.4	14.3	1043053.1	634894.0	15.4	37	5.1	1.1
1042938.9	635054.4	15.6	1042942.9	635051.0	17.0	38	5.2	1.4
1042968.1	635009.8	15.3	1042969.0	635004.3	16.1	39	5.5	0.8
1042992.6	635011.0	15.4	1042996.5	635007.0	16.4	40	5.6	1.1
1042950.5	634883.6	15.0	1042955.2	634887.0	15.9	41	5.8	0.9
1042921.6	634931.0	14.4	1042924.9	634925.8	15.5	42	6.2	1.1



Table 1: Lot 1 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre-Soil Cover Survey Point			Post-Soil Cover Survey Point			Survey Point ID	Distance Between	
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-1)	Approximate Pair of Points (ft)	Elevation Change (ft)
1043071.6	634937.3	15.0	1043065.4	634934.9	16.3	43	6.6	1.2
1042886.2	635077.6	15.9	1042887.2	635071.1	16.4	44	6.7	0.4
1042912.4	635054.9	15.7	1042914.7	635061.5	16.8	45	7.0	1.1
1042944.5	634956.9	14.1	1042949.5	634961.9	15.3	46	7.1	1.1
1043043.3	634985.0	15.3	1043042.7	634977.4	16.5	47	7.6	1.2
1043096.2	634893.7	15.0	1043087.3	634894.2	15.3	48	8.9	0.4

#### Notes:

Not all point pairs are included in this table. Pairs with a distance of 10 feet or greater between points were excluded.

Northing and easting coordinates were surveyed with four decimal places of precision in the Washington State Plan South coordinate system. One decimal place is displayed in the table for simplicity.

<sup>1</sup> A nearest neighbor analysis was conducted because not all pre- and post-cover survey points were collected at the same locations. Point pairs were estimated to determine the difference in elevation before and after the cover was installed.



Table 2: Parcels 2 & 3 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre-Soil Cover Survey Point		Ро	st-Soil Cover Survey F	Point	Survey Point ID	Distance Between	1	
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-2)	Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1043410.7	633819.9	14.5	1043410.5	633819.9	15.6	1	0.2	1.1
1043235.4	633972.3	14.4	1043235.6	633972.4	15.7	2	0.2	1.3
1043121.9	633818.1	14.7	1043121.8	633818.3	15.8	3	0.2	1.1
1043162.5	634038.2	14.6	1043162.7	634038.3	15.7	4	0.2	1.1
1043229.6	633797.6	14.1	1043229.6	633797.4	15.2	5	0.2	1.1
1043329.5	633979.0	14.9	1043329.7	633979.1	16.0	6	0.2	1.1
1043262.5	633949.0	14.4	1043262.7	633949.0	15.6	7	0.2	1.2
1043055.7	633990.1	14.4	1043055.9	633990.3	15.6	8	0.2	1.2
1043127.8	633746.0	14.5	1043127.8	633745.8	15.7	9	0.2	1.2
1043030.8	633964.2	14.8	1043030.6	633964.1	15.9	10	0.2	1.1
1043388.0	633834.7	14.3	1043388.2	633834.6	15.4	11	0.2	1.1
1043436.1	633732.1	13.3	1043436.1	633731.8	14.5	12	0.2	1.2
1043080.2	633916.3	14.9	1043080.1	633916.0	16.1	13	0.2	1.2
1043477.7	633746.2	14.2	1043477.9	633746.1	15.3	14	0.2	1.1
1043065.7	633823.0	14.9	1043065.8	633823.2	15.9	15	0.3	1.1
1043383.9	633854.8	14.3	1043383.6	633854.8	15.4	16	0.3	1.1
1043413.1	633774.5	13.9	1043412.9	633774.3	15.0	17	0.3	1.1
1043171.8	633849.9	14.6	1043171.7	633850.1	15.7	18	0.3	1.1
1043058.7	633916.7	14.9	1043058.8	633916.4	16.1	19	0.3	1.2
1043421.1	633760.0	13.7	1043421.1	633759.7	14.8	20	0.3	1.1
1043334.4	633951.9	14.5	1043334.5	633952.1	15.6	21	0.3	1.1
1043405.9	633870.7	14.3	1043405.8	633870.4	15.6	22	0.3	1.2
1043295.5	633876.1	14.2	1043295.2	633876.2	15.4	23	0.3	1.2
1043189.1	634050.5	14.8	1043189.3	634050.3	15.8	24	0.3	1.0
1043215.7	633997.9	14.6	1043215.9	633998.0	15.9	25	0.3	1.3
1043084.2	633869.8	15.0	1043084.1	633869.6	16.2	26	0.3	1.1
1042997.4	633793.2	13.3	1042997.2	633793.4	14.3	27	0.3	1.0
1043025.2	633995.1	14.3	1043025.3	633995.4	15.4	28	0.3	1.1
1043259.5	633972.6	14.9	1043259.8	633972.6	16.0	29	0.3	1.1
1043292.4	633925.9	14.3	1043292.6	633926.1	15.5	30	0.3	1.1
1043057.9	633965.1	14.8	1043057.6	633965.0	15.9	31	0.3	1.1
1043360.5	633952.9	14.6	1043360.8	633952.9	15.7	32	0.3	1.0
1043249.1	633872.3	14.2	1043248.9	633872.1	15.5	33	0.3	1.2
1043205.0	633772.0	14.3	1043204.9	633771.7	15.4	34	0.3	1.1
1043034.1	633891.9	14.8	1043034.3	633891.9	16.0	35	0.3	1.2
1043200.1	633794.8	14.2	1043200.2	633794.6	15.4	36	0.3	1.1
1043041.6	633819.6	14.7	1043041.4	633819.5	15.8	37	0.3	1.1
1043094.9	633763.9	14.9	1043094.6	633763.8	15.9	38	0.3	1.0
1043295.9	633900.5	14.3	1043296.2	633900.7	15.4	39	0.3	1.1
1043357.6	633973.7	14.9	1043357.8	633973.9	15.9	40	0.3	1.1
1043225.9	633871.6	14.3	1043225.7	633871.3	15.4	41	0.3	1.1
1043048.7	633714.7	13.4	1043048.7	633715.0	14.5	42	0.3	1.1



Table 2: Parcels 2 & 3 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre-Soil Cover Survey Point		Pos	st-Soil Cover Survey F	oint	Survey Point ID	Distance Between		
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-2)	Points (ft)	Elevation Change <sup>1</sup> (ft)
1043068.1	633793.1	14.8	1043068.3	633793.3	15.8	43	0.3	1.1
1043081.4	633989.5	14.5	1043081.6	633989.6	15.7	44	0.3	1.2
1043063.0	633872.0	14.9	1043063.2	633871.8	16.0	45	0.3	1.1
1043020.1	633787.7	14.6	1043020.4	633787.8	15.8	46	0.3	1.2
1043228.6	633770.3	14.1	1043228.5	633770.0	15.2	47	0.3	1.1
1043222.6	633849.0	14.1	1043222.3	633848.9	15.3	48	0.3	1.2
1043308.0	633952.3	14.5	1043308.3	633952.3	15.6	49	0.3	1.1
1043066.1	633841.9	14.9	1043066.4	633842.0	16.0	50	0.3	1.1
1043210.3	633740.6	14.4	1043210.2	633740.3	15.4	51	0.3	1.0
1043396.8	633931.6	14.3	1043397.0	633931.7	15.5	52	0.3	1.2
1043098.1	633748.8	14.7	1043098.0	633748.6	15.8	53	0.3	1.1
1043254.8	633750.3	14.0	1043254.8	633750.0	15.1	54	0.3	1.1
1043192.9	633869.2	14.4	1043192.7	633869.0	15.6	55	0.3	1.2
1043190.7	634029.6	14.8	1043191.0	634029.7	15.9	56	0.3	1.1
1043185.5	633735.4	14.5	1043185.4	633735.1	15.5	57	0.3	1.0
1042991.0	633886.0	13.2	1042990.9	633886.3	14.1	58	0.3	0.9
1043273.8	633877.3	14.3	1043273.6	633877.2	15.4	59	0.3	1.2
1043089.6	633815.8	15.0	1043089.4	633815.5	16.0	60	0.3	1.0
1043087.0	633841.6	15.0	1043086.9	633841.3	16.0	61	0.3	1.0
1043233.3	634019.8	15.2	1043233.5	634020.0	16.3	62	0.3	1.1
1043260.0	634008.3	15.2	1043259.8	634008.5	16.3	63	0.3	1.1
1042999.5	633814.7	13.4	1042999.8	633814.7	14.5	64	0.3	1.1
1043259.7	633770.6	13.8	1043259.7	633770.3	15.0	65	0.3	1.2
1043232.5	633994.8	14.9	1043232.8	633994.8	16.1	66	0.3	1.2
1043019.8	633816.8	14.5	1043020.1	633816.8	15.6	67	0.3	1.1
1043036.1	633870.5	14.8	1043036.4	633870.5	15.9	68	0.3	1.1
1043052.3	633764.6	14.7	1043052.6	633764.6	15.8	69	0.3	1.2
1043267.9	633919.8	14.2	1043268.2	633919.9	15.4	70	0.3	1.2
1043008.3	633725.7	13.5	1043008.6	633725.8	14.5	71	0.3	1.0
1043093.1	633787.0	14.9	1043092.8	633786.8	16.0	72	0.3	1.1
1043043.4	633792.4	14.7	1043043.7	633792.5	15.8	73	0.3	1.1
1043250.2	633847.5	14.2	1043249.9	633847.3	15.4	74	0.3	1.2
1043194.8	633822.9	14.3	1043194.5	633822.7	15.5	75	0.3	1.1
1043280.4	633997.0	15.3	1043280.7	633997.1	16.3	76	0.3	1.1
1043026.3	634037.8	13.8	1043026.6	634037.6	15.0	77	0.3	1.2
1043025.2	634017.9	14.0	1043025.5	634017.9	15.1	78	0.3	1.0
1043178.3	634028.4	14.6	1043178.6	634028.3	15.7	79	0.3	1.1
1043011.9	633939.3	14.3	1043012.2	633939.4	15.6	80	0.3	1.3
1043007.0	633970.7	14.3	1043007.3	633970.6	15.4	81	0.3	1.1
1043053.5	634014.9	14.0	1043053.6	634015.2	15.1	82	0.3	1.1
1043060.9	633895.5	15.0	1043060.8	633895.2	16.1	83	0.3	1.1
1043023.8	633761.2	14.4	1043024.1	633761.3	15.6	84	0.3	1.2



Table 2: Parcels 2 & 3 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre-Soil Cover Survey Point		Po	st-Soil Cover Survey F	oint	Survey Point ID	Distance Between		
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-2)	Points (ft)	Elevation Change <sup>1</sup> (ft)
1043078.3	634013.6	14.2	1043078.4	634013.9	15.4	85	0.3	1.1
1043182.3	633775.3	14.4	1043182.5	633775.0	15.6	86	0.3	1.1
1043229.9	633743.0	14.1	1043230.0	633742.7	15.3	87	0.3	1.2
1043126.6	633772.7	14.6	1043126.6	633772.4	15.8	88	0.3	1.2
1043303.6	633983.9	15.0	1043303.9	633983.9	16.1	89	0.3	1.1
1043287.2	633753.6	14.3	1043287.3	633753.3	15.4	90	0.3	1.0
1043299.6	633849.6	14.2	1043299.9	633849.4	15.4	91	0.3	1.2
1043316.8	633876.0	14.2	1043316.5	633875.8	15.4	92	0.3	1.2
1043411.9	633744.7	13.1	1043411.6	633744.5	14.3	93	0.3	1.2
1043287.6	633950.5	14.3	1043287.8	633950.4	15.4	94	0.3	1.1
1043329.1	633753.0	13.9	1043329.2	633752.7	15.0	95	0.3	1.1
1043182.4	633757.8	14.6	1043182.1	633757.6	15.6	96	0.4	1.1
1043055.0	633736.3	14.6	1043055.3	633736.4	15.7	97	0.4	1.1
1043194.8	633850.8	14.3	1043194.5	633851.0	15.4	98	0.4	1.1
1043283.9	633798.3	14.1	1043283.7	633798.0	15.1	99	0.4	1.1
1043171.8	634056.5	14.5	1043171.7	634056.2	15.6	100	0.4	1.2
1043252.8	633989.4	15.1	1043252.8	633989.0	16.2	101	0.4	1.1
1043407.9	633848.0	14.3	1043407.5	633847.8	15.4	102	0.4	1.2
1043174.1	633825.5	14.5	1043174.2	633825.1	15.6	103	0.4	1.2
1043383.0	633952.0	14.2	1043383.3	633951.8	15.4	104	0.4	1.2
1043081.1	633714.1	13.7	1043081.3	633713.7	14.6	105	0.4	0.9
1043099.5	633728.7	14.6	1043099.1	633729.0	15.6	106	0.5	1.1
1042985.4	634124.2	13.4	1042984.8	634124.1	14.3	107	0.6	0.9
1043104.6	633715.1	13.7	1043104.2	633715.6	14.7	108	0.7	1.0
1043034.6	633711.1	13.4	1043034.5	633710.4	14.3	109	0.7	0.9
1043001.3	633745.9	13.3	1043000.6	633746.4	14.3	110	0.9	1.0
1042994.9	633835.1	13.2	1042994.3	633834.2	14.3	111	1.1	1.1
1043128.6	634079.8	14.4	1043129.9	634079.7	15.4	112	1.3	0.9
1042999.2	633768.6	13.3	1042998.9	633769.8	14.3	113	1.3	1.0
1043153.9	633718.6	13.8	1043154.5	633719.9	14.9	114	1.4	1.1
1043375.8	633724.5	13.6	1043376.1	633725.9	14.7	115	1.4	1.1
1043105.5	634089.0	14.3	1043104.5	634090.0	15.2	116	1.4	1.0
1043475.9	633731.1	13.5	1043477.0	633732.3	14.5	117	1.6	1.0
1043118.3	633892.5	15.0	1043116.7	633892.0	16.1	118	1.7	1.1
1043011.7	633885.7	14.7	1043012.1	633887.4	15.7	119	1.7	1.0
1043327.7	633797.5	14.1	1043327.2	633799.3	15.1	120	1.8	1.0
1043129.4	633717.0	13.7	1043130.8	633718.3	14.7	121	1.9	1.0
1043118.5	633867.4	15.1	1043118.9	633869.2	16.0	122	1.9	1.0
1043124.4	633793.2	14.7	1043123.2	633794.8	15.9	123	1.9	1.2
1042986.7	633937.5	13.2	1042986.9	633939.7	14.2	124	2.2	1.0
1043196.8	634053.2	15.0	1043199.0	634052.5	15.9	125	2.3	0.9
1043298.2	633821.6	14.3	1043296.5	633823.2	15.3	126	2.4	1.0



Table 2: Parcels 2 & 3 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre-Soil Cover Survey Point			Post-Soil Cover Survey Point			Survey Point ID	Distance Between	1
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-2)	Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1043153.5	633770.0	14.6	1043151.8	633768.3	15.7	127	2.5	1.1
1043016.0	633710.6	13.3	1043013.7	633711.8	14.4	128	2.5	1.1
1043012.8	633908.5	14.6	1043010.9	633910.2	15.6	129	2.5	1.0
1043485.6	633731.9	13.5	1043487.8	633733.4	14.6	130	2.7	1.1
1043450.2	633748.4	13.7	1043452.8	633747.1	14.7	131	2.8	1.0
1043121.2	633843.3	14.8	1043120.9	633846.1	15.9	132	2.8	1.1
1043011.8	633860.8	14.7	1043013.2	633863.3	15.9	133	2.9	1.2
1042982.6	634013.8	13.0	1042983.1	634010.9	14.3	134	3.0	1.2
1043297.8	633795.8	14.1	1043300.5	633797.2	15.2	135	3.0	1.0
1043053.1	634018.2	14.0	1043053.6	634015.2	15.1	136	3.1	1.1
1042989.8	633912.5	13.0	1042988.6	633915.4	14.1	137	3.2	1.1
1043336.5	633931.7	14.5	1043336.0	633928.6	15.6	138	3.2	1.2
1042992.6	633861.0	13.3	1042992.8	633857.7	14.2	139	3.3	0.9
1042985.6	633963.0	13.2	1042985.5	633966.4	14.4	140	3.3	1.1
1043401.5	633727.1	13.5	1043404.8	633727.2	14.6	141	3.4	1.1
1043327.3	633772.7	14.1	1043330.7	633773.7	15.0	142	3.5	1.0
1043298.1	633846.2	14.4	1043299.9	633849.4	15.4	143	3.6	1.0
1042996.1	633814.1	13.3	1042999.8	633814.7	14.5	144	3.7	1.2
1043220.0	633893.3	14.5	1043219.8	633897.0	15.4	145	3.7	0.9
1043179.0	633721.0	13.7	1043182.7	633721.3	14.8	146	3.8	1.0
1043327.7	633822.3	14.1	1043323.8	633822.6	15.2	147	3.9	1.1
1043011.0	633836.2	14.5	1043014.5	633838.1	15.7	148	4.0	1.2
1043054.6	634042.4	13.9	1043057.3	634039.3	15.0	149	4.1	1.0
1043489.7	633751.1	14.3	1043485.9	633749.2	14.8	150	4.3	0.5
1042981.0	634039.6	13.1	1042980.1	634035.3	14.1	151	4.3	1.1
1043054.1	633967.7	14.7	1043057.6	633965.0	15.9	152	4.5	1.2
1043057.0	633763.1	14.8	1043052.6	633764.6	15.8	153	4.6	1.0
1043118.8	633916.6	14.9	1043114.5	633918.9	16.3	154	4.9	1.4
1043053.9	633939.7	14.9	1043058.6	633941.4	16.1	155	4.9	1.2
1043108.2	634035.6	14.3	1043105.8	634031.3	15.3	156	5.0	1.0
1043125.8	633767.3	14.6	1043126.6	633772.4	15.8	157	5.1	1.2
1043159.6	633963.6	14.4	1043164.6	633962.2	15.7	158	5.2	1.2
1043324.8	633847.6	14.2	1043320.1	633849.7	15.2	159	5.2	1.0
1043368.7	633847.1	14.1	1043370.1	633852.1	15.3	160	5.2	1.1
1043078.7	633745.3	14.7	1043074.6	633742.1	15.6	161	5.2	1.0
1042977.0	634093.4	13.1	1042976.4	634088.2	14.1	162	5.3	1.0
1043293.7	633920.8	14.3	1043292.6	633926.1	15.5	163	5.4	1.1
1043220.5	633918.5	14.3	1043215.7	633921.0	15.4	164	5.4	1.1
1043030.8	633995.3	14.2	1043025.3	633995.4	15.4	165	5.4	1.2
1043057.9	634086.5	14.1	1043052.7	634084.6	15.2	166	5.5	1.1
1043030.4	633998.0	14.2	1043025.3	633995.4	15.4	167	5.7	1.2
1043367.9	633872.2	14.3	1043365.0	633877.2	15.5	168	5.8	1.1



Table 2: Parcels 2 & 3 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pr	e-Soil Cover Survey P	oint	Po	st-Soil Cover Survey F	oint	Survey Point ID	Distance Between	
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-2)	Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1043337.7	633994.1	15.0	1043332.4	633996.6	16.0	169	5.9	1.0
1043299.1	633771.6	14.0	1043305.1	633771.3	15.0	170	6.0	1.0
1043174.0	634061.8	14.7	1043171.7	634056.2	15.6	171	6.1	0.9
1043369.7	633821.9	14.1	1043373.1	633827.0	15.2	172	6.1	1.1
1043473.3	633750.1	14.0	1043477.9	633746.1	15.3	173	6.2	1.3
1043371.8	633797.0	13.8	1043375.8	633801.6	15.1	174	6.2	1.3
1043199.9	633997.5	14.8	1043204.6	634001.9	16.0	175	6.4	1.1
1043004.2	633721.0	13.2	1043008.6	633725.8	14.5	176	6.5	1.3
1043348.4	633722.6	13.9	1043354.8	633723.8	14.9	177	6.5	1.0
1043387.6	633956.7	14.2	1043383.3	633951.8	15.4	178	6.5	1.2
1043120.0	633941.7	15.1	1043113.6	633943.5	16.1	179	6.6	0.9
1043412.7	633870.0	14.6	1043405.8	633870.4	15.6	180	6.8	1.0
1043160.8	633938.1	14.6	1043165.5	633943.1	15.7	181	6.8	1.1
1043201.3	633972.5	14.6	1043207.7	633975.1	15.7	182	6.8	1.1
1043104.3	634038.0	14.2	1043105.8	634031.3	15.3	183	6.9	1.1
1043008.8	633977.4	14.1	1043007.3	633970.6	15.4	184	7.0	1.3
1043150.7	634070.8	14.5	1043157.6	634069.0	15.6	185	7.1	1.1
1043248.7	633828.5	14.3	1043254.4	633824.2	15.4	186	7.1	1.1
1043013.7	634125.0	13.6	1043020.5	634122.4	14.7	187	7.2	1.0
1043013.2	633785.7	14.1	1043020.4	633787.8	15.8	188	7.5	1.6
1043367.2	633896.9	14.4	1043362.5	633902.9	15.5	189	7.7	1.1
1043420.6	633796.5	14.3	1043415.6	633802.6	15.4	190	7.8	1.0
1043109.0	634015.6	14.5	1043110.9	634008.0	15.6	191	7.8	1.1
1043039.7	634114.6	13.7	1043047.3	634112.4	14.8	192	7.9	1.1
1043035.6	634070.1	14.0	1043028.3	634067.2	15.0	193	7.9	1.0
1043032.6	634021.7	14.0	1043025.5	634017.9	15.1	194	8.0	1.1
1043289.8	634015.4	15.2	1043282.4	634018.5	16.3	195	8.0	1.1
1043374.4	633772.1	14.0	1043381.2	633776.3	15.1	196	8.0	1.1
1043057.1	634067.1	13.9	1043056.9	634059.1	15.2	197	8.1	1.3
1043202.8	633899.0	14.3	1043195.3	633896.0	15.6	198	8.1	1.3
1043266.2	633977.7	15.1	1043259.8	633972.6	16.0	199	8.2	0.8
1043250.0	633725.9	13.7	1043241.9	633726.9	14.8	200	8.2	1.0
1043056.6	633712.4	13.4	1043048.7	633715.0	14.5	201	8.3	1.1
1043121.0	633990.4	14.4	1043114.6	633985.1	15.7	202	8.3	1.3
1043339.2	633886.0	14.0	1043340.7	633877.8	15.4	203	8.3	1.4
1043125.1	634059.6	14.3	1043132.5	634055.7	15.5	204	8.3	1.2
1043366.5	633922.4	14.4	1043359.6	633927.2	15.6	205	8.4	1.2
1043223.4	633994.1	15.0	1043215.9	633998.0	15.9	206	8.4	0.8
1043105.5	633941.5	15.1	1043113.6	633943.5	16.1	207	8.4	1.0
1042994.7	633942.8	13.7	1042986.9	633939.7	14.2	208	8.5	0.5
1043263.7	633903.0	14.4	1043271.3	633899.2	15.3	209	8.5	0.9
1043300.4	633724.4	14.0	1043308.9	633725.1	15.0	210	8.5	1.0



Table 2: Parcels 2 & 3 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pr	e-Soil Cover Survey P	oint	Po	Post-Soil Cover Survey Point		Survey Point ID	Distance Between	1
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-2)	Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1043418.9	633821.1	14.6	1043410.5	633819.9	15.6	211	8.5	1.0
1043105.5	634062.7	14.1	1043104.7	634054.2	15.3	212	8.5	1.2
1043071.7	633872.9	15.1	1043063.2	633871.8	16.0	213	8.6	1.0
1043322.1	633895.0	14.2	1043315.1	633900.0	15.2	214	8.6	1.0
1043367.7	633947.7	14.6	1043360.8	633952.9	15.7	215	8.6	1.1
1043084.0	634097.7	13.9	1043076.1	634101.1	15.0	216	8.6	1.1
1043103.5	633963.5	14.8	1043112.0	633964.9	16.1	217	8.6	1.2
1043074.4	633922.6	15.0	1043080.1	633916.0	16.1	218	8.7	1.1
1043154.0	634039.7	14.6	1043162.7	634038.3	15.7	219	8.7	1.1
1043244.1	633989.8	14.9	1043252.8	633989.0	16.2	220	8.8	1.2
1043104.2	634013.8	14.4	1043110.9	634008.0	15.6	221	8.8	1.2
1043105.9	633916.5	15.0	1043114.5	633918.9	16.3	222	9.0	1.3
1043250.1	633803.2	14.1	1043256.7	633797.1	15.1	223	9.0	1.0
1043323.4	633723.4	14.0	1043332.4	633724.3	14.9	224	9.1	0.9
1043028.5	633898.9	14.7	1043034.3	633891.9	16.0	225	9.1	1.3
1043027.8	633821.7	14.7	1043020.1	633816.8	15.6	226	9.1	0.9
1043159.9	633913.2	14.8	1043167.7	633918.0	15.8	227	9.2	1.0
1043172.8	633805.3	14.5	1043176.8	633797.0	15.5	228	9.2	1.0
1043201.6	633947.3	14.4	1043210.8	633946.8	15.4	229	9.3	1.0
1043082.7	634074.1	14.1	1043079.3	634082.8	15.2	230	9.3	1.1
1043201.8	633923.9	14.3	1043192.4	633924.5	15.5	231	9.4	1.3
1043319.7	633920.2	14.3	1043312.3	633926.2	15.4	232	9.5	1.1
1043372.7	633971.4	14.8	1043369.4	633980.3	15.8	233	9.5	1.0
1043027.4	633873.8	14.8	1043036.4	633870.5	15.9	234	9.6	1.1
1043337.2	633910.4	14.3	1043338.8	633900.9	15.5	235	9.6	1.2
1042979.2	634066.1	12.9	1042978.9	634056.4	14.1	236	9.7	1.2
1043202.4	633722.3	13.8	1043212.0	633723.7	14.8	237	9.7	1.0
1043396.3	633872.0	14.3	1043405.8	633870.4	15.6	238	9.7	1.3
1043416.6	633844.2	14.5	1043407.5	633847.8	15.4	239	9.8	0.9
1043074.2	633847.9	15.0	1043066.4	633842.0	16.0	240	9.8	1.0
1043012.3	633810.9	14.0	1043020.1	633816.8	15.6	241	9.8	1.6
1043152.9	633814.8	14.6	1043146.3	633822.1	15.8	242	9.8	1.1
1043077.1	633797.8	14.9	1043068.3	633793.3	15.8	243	9.8	1.0
1043153.6	633744.5	14.5	1043159.2	633752.7	15.7	244	9.9	1.2
1043343.9	633836.5	14.3	1043347.8	633827.4	15.3	245	9.9	1.0

#### Notes:

Not all point pairs are included in this table. Pairs with a distance of 10 feet or greater between points were excluded.

Northing and easting coordinates were surveyed with four decimal places of precision in the Washington State Plan South coordinate system. One decimal place is displayed in the table for simplicity.

<sup>&</sup>lt;sup>1</sup> A nearest neighbor analysis was conducted because not all pre- and post-cover survey points were collected at the same locations. Point pairs were estimated to determine the difference in elevation before and after the cover was installed.



Table 3: Parcels 6 & 7 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pr	e-Soil Cover Survey P	oint	Pos	Post-Soil Cover Survey Point		Survey Point ID	Distance Between	1
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-3)	Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1043063.1	634573.1	13.7	1043063.1	634573.1	14.8	1	0.1	1.1
1043056.2	634673.6	13.6	1043056.1	634673.5	14.7	2	0.1	1.1
1043059.7	634622.9	13.9	1043059.5	634622.9	14.9	3	0.1	1.0
1043060.9	634831.5	14.3	1043060.9	634831.7	15.2	4	0.1	0.9
1043011.4	634828.3	14.4	1043011.6	634828.3	15.5	5	0.2	1.1
1043128.4	634741.8	13.6	1043128.3	634742.0	14.5	6	0.2	1.0
1043179.4	634649.0	14.4	1043179.3	634648.8	15.3	7	0.3	0.9
1043090.8	634550.1	14.2	1043090.7	634549.8	15.2	8	0.3	1.0
1042930.0	634739.8	14.3	1042929.7	634739.9	15.3	9	0.3	1.0
1043071.4	634459.2	14.9	1043071.1	634459.0	15.8	10	0.3	0.9
1043089.3	634599.5	14.1	1043089.6	634599.4	15.1	11	0.3	1.0
1042931.2	634714.6	14.2	1042931.5	634714.5	15.4	12	0.4	1.2
1043134.9	634599.6	14.2	1043134.6	634599.9	15.2	13	0.4	1.0
1043116.5	634552.2	14.4	1043116.2	634552.0	15.4	14	0.4	1.1
1043222.1	634469.7	14.5	1043221.7	634469.6	15.4	15	0.4	0.9
1043213.4	634576.2	14.6	1043213.9	634576.2	15.8	16	0.4	1.1
1043114.5	634835.5	14.3	1043114.9	634835.5	15.2	17	0.4	0.9
1043118.7	634525.6	14.3	1043118.3	634525.9	15.5	18	0.5	1.1
1043061.6	634597.8	13.8	1043061.2	634598.1	14.8	19	0.5	1.0
1042988.7	634806.8	14.0	1042988.5	634807.3	15.1	20	0.5	1.2
1043109.8	634834.9	14.0	1043109.3	634835.0	15.2	21	0.5	1.2
1043057.7	634647.7	13.8	1043057.7	634648.3	14.8	22	0.5	1.0
1043186.9	634555.4	14.5	1043187.5	634555.5	15.5	23	0.6	1.0
1042988.3	634789.8	14.0	1042988.5	634790.4	15.1	24	0.6	1.1
1043084.2	634789.4	14.2	1043083.9	634788.8	15.3	25	0.6	1.0
1043124.1	634462.5	14.7	1043124.7	634462.5	15.7	26	0.6	0.9
1042926.8	634790.0	14.8	1042926.8	634789.4	15.7	27	0.6	0.9
1042963.1	634824.1	14.9	1042962.7	634824.7	15.9	28	0.7	1.0
1042940.3	634815.5	15.0	1042939.7	634815.8	16.0	29	0.7	1.0
1043054.5	634698.3	13.5	1043054.2	634698.9	14.7	30	0.7	1.2
1043211.7	634599.7	14.8	1043212.4	634599.5	15.9	31	0.7	1.1
1043083.9	634649.1	14.1	1043083.3	634649.5	15.2	32	0.8	1.0
1043209.9	634624.5	14.8	1043210.6	634624.7	15.9	33	0.8	1.1
1042928.1	634765.0	14.6	1042927.7	634765.7	15.5	34	0.8	0.8
1043217.3	634532.0	14.5	1043217.1	634531.3	15.5	35	0.8	1.0
1042944.3	634791.0	14.3	1042944.7	634791.8	15.4	36	0.8	1.0
1043036.8	634830.1	14.4	1043036.0	634830.4	15.4	37	0.9	1.0
1043065.0	634547.8	13.7	1043065.7	634548.5	14.8	38	0.9	1.0
1043215.6	634555.8	14.6	1043215.6	634554.9	15.7	39	1.0	1.1
1043083.5	634675.0	13.9	1043082.8	634674.4	14.9	40	1.0	1.0
1043036.8	634793.3	13.7	1043035.9	634793.7	14.8	41	1.0	1.1
1043038.1	634748.3	13.9	1043038.9	634749.0	14.9	42	1.0	1.1



Table 3: Parcels 6 & 7 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

	Distance Between	Survey Point ID	Post-Soil Cover Survey Point		oint	-Soil Cover Survey Po	Pre	
Elevation Change <sup>1</sup> (ft)	Approximate Pair of Points (ft)	(as shown on Figure E-3)	Elevation (ft)	Northing (ft)	Easting (ft)	Elevation (ft)	Northing (ft)	Easting (ft)
1.0	1.0	43	15.7	634745.6	1043155.4	14.7	634744.7	1043155.0
0.9	1.1	44	15.9	634460.4	1043094.5	15.1	634460.5	1043095.6
1.1	1.1	45	14.8	634770.2	1043036.8	13.6	634770.7	1043037.7
1.0	1.1	46	14.9	634744.6	1042993.9	13.9	634744.7	1042992.8
1.1	1.1	47	14.7	634699.3	1043082.7	13.7	634699.9	1043081.8
1.1	1.1	48	15.4	634502.3	1043165.8	14.3	634502.3	1043164.7
1.2	1.1	49	15.8	634826.9	1042987.4	14.6	634825.8	1042987.5
1.5	1.2	50	14.8	634498.4	1043068.7	13.3	634497.2	1043069.1
1.0	1.2	51	15.2	634768.4	1042966.7	14.2	634767.5	1042965.9
0.9	1.5	52	15.1	634790.8	1042965.2	14.2	634792.0	1042964.3
1.1	1.5	53	15.2	634741.2	1042946.0	14.1	634740.0	1042946.8
1.1	1.5	54	14.8	634724.0	1043044.9	13.8	634723.7	1043043.4
1.1	1.6	55	15.6	634478.1	1043167.5	14.4	634479.1	1043166.4
0.9	1.6	56	14.7	634719.8	1042972.2	13.8	634718.6	1042971.2
1.1	1.6	57	15.3	634766.9	1042946.0	14.2	634767.1	1042944.3
1.2	1.8	58	15.2	634805.8	1042965.3	14.0	634806.3	1042963.6
1.2	1.9	59	15.5	634498.7	1043121.1	14.3	634500.5	1043121.7
0.9	1.9	60	15.0	634768.8	1042991.0	14.1	634768.1	1042989.2
1.1	2.0	61	15.5	634698.1	1043178.3	14.5	634698.5	1043176.3
0.9	2.1	62	15.6	634467.4	1043189.7	14.7	634467.5	1043191.8
0.8	2.1	63	15.9	634811.7	1043123.9	15.0	634813.9	1043124.2
1.1	2.2	64	15.2	634743.5	1042969.7	14.1	634743.3	1042967.6
1.2	2.2	65	14.5	634720.8	1042995.6	13.3	634721.0	1042993.4
0.9	2.2	66	15.1	634808.0	1043012.7	14.1	634809.4	1043011.0
1.2	2.2	67	14.9	634792.2	1043013.2	13.7	634793.2	1043011.2
1.1	2.3	68	16.0	634792.8	1043129.1	14.9	634792.2	1043131.3
1.2	2.7	69	15.1	634744.9	1043060.4	13.9	634747.5	1043060.0
1.0	2.7	70	15.3	634832.8	1043081.7	14.3	634833.4	1043084.3
1.2	2.7	71	14.7	634722.3	1043020.7	13.5	634722.1	1043018.0
1.2	2.9	72	15.0	634806.0	1043036.0	13.8	634809.0	1043036.0
1.0	3.0	73	14.9	634770.8	1043015.4	13.9	634769.7	1043012.6
1.1	3.4	74	16.0	634792.8	1043129.1	14.9	634792.4	1043125.8
1.2	3.4	75	15.5	634528.5	1043165.6	14.2	634527.7	1043162.2
1.0	3.5	76	14.9	634672.5	1043108.4	13.9	634674.2	1043111.5
1.1	3.5	77	15.6	634770.7	1043128.2	14.4	634767.3	1043127.4
0.9	3.9	78	15.7	634648.3	1043201.0	14.8	634650.8	1043203.9
1.0	3.9	79	15.5	634503.5	1043185.9	14.5	634503.5	1043189.7
1.1	4.0	80	15.7	634726.3	1043156.6	14.5	634722.3	1043156.9
1.0	4.3	81	14.9	634747.4	1043017.1	13.9	634746.6	1043012.9
1.1	4.7	82	15.3	634626.8	1043111.7	14.2	634622.7	1043114.0
1.1	4.8	83	14.6	634698.3	1043105.5	13.6	634699.5	1043110.1
1.3 eanup Action Completion I	4.8	84	15.4	634559.4	1043160.6	14.2	634554.6	1043160.3



Table 3: Parcels 6 & 7 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pro	e-Soil Cover Survey Po	oint	Pos	st-Soil Cover Survey F	oint	Survey Point ID	Distance Between	
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-3)	re Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1043103.3	634813.1	14.5	1043107.7	634811.2	15.6	85	4.8	1.1
1043191.1	634479.1	14.5	1043193.2	634474.8	15.6	86	4.9	1.1
1043147.8	634464.4	14.5	1043142.8	634463.8	15.5	87	5.0	1.1
1043132.9	634647.7	13.9	1043128.9	634644.5	15.0	88	5.1	1.1
1043182.8	634597.7	14.2	1043182.6	634602.8	15.4	89	5.2	1.1
1043190.2	634698.3	14.8	1043185.0	634697.4	15.6	90	5.2	0.8
1043144.3	634503.4	14.3	1043140.6	634499.7	15.2	91	5.3	0.9
1043060.5	634770.4	13.8	1043056.4	634773.8	14.9	92	5.3	1.1
1043154.6	634648.3	13.7	1043157.3	634643.4	14.8	93	5.5	1.1
1043151.3	634674.2	13.4	1043156.9	634675.0	14.8	94	5.7	1.4
1043050.7	634723.4	13.8	1043044.9	634724.0	14.8	95	5.8	1.0
1043130.2	634698.3	13.4	1043124.6	634701.6	14.5	96	6.4	1.1
1042948.3	634714.9	14.4	1042953.2	634719.0	15.3	97	6.4	0.9
1043146.1	634478.9	14.5	1043141.4	634474.2	15.6	98	6.6	1.1
1043107.4	634722.1	13.6	1043100.9	634723.2	14.8	99	6.6	1.2
1043174.8	634723.2	14.4	1043177.0	634716.3	15.5	100	7.3	1.2
1043159.0	634579.2	14.0	1043160.5	634586.4	15.2	101	7.3	1.2
1043221.2	634482.8	14.4	1043215.6	634477.9	15.6	102	7.4	1.3
1043156.1	634623.0	13.7	1043159.0	634616.0	14.9	103	7.6	1.2
1043152.7	634695.7	13.7	1043157.0	634701.9	15.0	104	7.7	1.4
1043140.2	634554.1	14.2	1043132.2	634554.8	15.3	105	8.0	1.1
1043064.1	634725.8	13.5	1043062.7	634717.7	14.7	106	8.1	1.1
1043219.1	634507.4	14.4	1043216.5	634499.5	15.5	107	8.3	1.1
1043142.8	634529.4	14.1	1043134.7	634527.0	15.2	108	8.4	1.2
1043185.6	634576.4	14.5	1043187.6	634568.2	15.6	109	8.5	1.1
1043188.5	634530.1	14.5	1043188.1	634539.3	15.5	110	9.2	1.0
1043084.2	634812.0	14.3	1043082.1	634821.4	15.4	111	9.6	1.1
1043093.0	634524.3	14.1	1043083.4	634522.0	15.0	112	9.9	0.9
1043093.7	634497.8	14.0	1043084.0	634495.7	15.2	113	9.9	1.1

#### Notes:

Not all point pairs are included in this table. Pairs with a distance of 10 feet or greater between points were excluded.

Northing and easting coordinates were surveyed with four decimal places of precision in the Washington State Plan South coordinate system. One decimal place is displayed in the table for simplicity.

<sup>&</sup>lt;sup>1</sup> A nearest neighbor analysis was conducted because not all pre- and post-cover survey points were collected at the same locations. Point pairs were estimated to determine the difference in elevation before and after the cover was installed.



Table 4: Parcel 9 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre	e-Soil Cover Survey Pe	oint	Pos	Post-Soil Cover Survey Point		Survey Point ID	Distance Between	
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-4)	Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1042702.6	634142.9	13.3	1042702.5	634142.9	14.4	1	0.1	1.1
1042657.6	634214.8	12.8	1042657.5	634214.9	13.7	2	0.1	0.9
1042801.7	634151.7	13.5	1042801.4	634151.8	14.5	3	0.3	1.0
1042849.8	634189.8	13.5	1042850.0	634189.6	14.4	4	0.3	0.9
1042675.3	634166.4	13.4	1042675.0	634166.6	14.5	5	0.4	1.1
1042878.3	634178.4	13.4	1042878.7	634178.5	14.3	6	0.4	1.0
1042672.0	634190.9	13.3	1042671.6	634190.9	14.4	7	0.5	1.1
1042677.9	634141.1	13.3	1042677.5	634141.4	14.3	8	0.5	1.0
1042725.6	634169.6	13.9	1042725.1	634169.3	14.8	9	0.6	0.9
1042878.1	634158.3	13.4	1042877.4	634158.3	14.4	10	0.6	1.0
1042722.8	634194.6	13.7	1042722.8	634194.0	14.7	11	0.6	1.0
1042727.4	634145.5	13.2	1042726.7	634145.6	14.3	12	0.7	1.1
1042914.1	634135.3	13.3	1042914.2	634134.4	14.3	13	0.8	1.0
1042910.3	634159.3	13.4	1042910.7	634158.5	14.5	14	0.9	1.1
1042776.9	634149.6	13.4	1042777.0	634148.7	14.4	15	1.0	1.0
1042752.0	634147.5	13.2	1042752.9	634147.0	14.4	16	1.0	1.2
1042655.2	634115.8	12.6	1042656.3	634115.9	13.7	17	1.2	1.0
1042705.2	634120.7	12.2	1042704.2	634121.5	13.7	18	1.3	1.5
1042680.0	634118.5	12.7	1042678.7	634118.1	13.7	19	1.4	1.0
1042771.4	634220.0	13.2	1042772.8	634219.2	14.1	20	1.5	0.9
1042670.0	634215.9	13.0	1042669.4	634214.1	14.0	21	1.8	1.0
1042878.6	634133.2	12.7	1042876.5	634133.2	13.8	22	2.0	1.1
1042653.0	634139.3	13.0	1042654.0	634141.5	13.9	23	2.4	1.0
1042794.8	634202.0	13.7	1042795.8	634204.2	14.6	24	2.5	0.9
1042903.2	634134.5	13.0	1042900.7	634134.0	14.3	25	2.5	1.2
1042730.1	634121.8	12.2	1042727.5	634122.6	13.4	26	2.7	1.2
1042651.5	634162.9	12.8	1042651.1	634165.7	13.7	27	2.8	0.9
1042827.2	634153.4	13.3	1042824.4	634153.3	14.4	28	2.9	1.1
1042652.8	634187.9	12.8	1042650.6	634190.2	13.7	29	3.2	0.8
1042804.8	634126.4	12.7	1042801.4	634126.5	13.8	30	3.4	1.2
1042826.2	634178.7	13.5	1042827.5	634182.1	14.5	31	3.6	1.0
1042854.3	634131.2	12.7	1042850.7	634130.4	14.0	32	3.7	1.2
1042754.9	634123.1	12.3	1042751.4	634124.1	13.6	33	3.7	1.3
1042850.6	634180.9	13.4	1042853.9	634182.6	14.4	34	3.7	1.1
1042829.7	634128.3	12.6	1042825.9	634128.6	13.8	35	3.8	1.2
1042695.9	634191.5	13.7	1042699.7	634191.7	14.7	36	3.8	1.0
1042666.1	634235.1	12.8	1042669.5	634236.8	13.7	37	3.8	0.9
1042852.5	634155.8	13.3	1042856.4	634157.3	14.3	38	4.1	1.0
1042692.3	634237.5	12.9	1042696.6	634236.7	13.8	39	4.4	1.0
1042913.2	634148.1	13.6	1042909.3	634145.9	14.5	40	4.4	0.9
1042779.9	634125.0	12.3	1042775.1	634125.0	13.9	41	4.8	1.6
1042793.5	634211.9	13.3	1042798.1	634210.2	14.3	42	4.9	1.0



Table 4: Parcel 9 - Elevation Change Between Pairs of Pre- and Post-Soil Cover Survey Points

Pre	Pre-Soil Cover Survey Point			Post-Soil Cover Survey Point		Survey Point ID	Distance Between	: a. 1
Easting (ft)	Northing (ft)	Elevation (ft)	Easting (ft)	Northing (ft)	Elevation (ft)	(as shown on Figure E-4)	Approximate Pair of Points (ft)	Elevation Change <sup>1</sup> (ft)
1042715.3	634234.3	12.9	1042720.6	634233.8	13.9	43	5.3	1.0
1042675.0	634237.8	12.9	1042669.5	634236.8	13.7	44	5.6	0.8
1042824.3	634200.0	13.4	1042818.9	634202.2	14.4	45	5.8	1.0
1042657.9	634202.4	12.8	1042663.4	634200.4	14.0	46	5.9	1.3
1042772.0	634199.4	13.6	1042766.2	634200.4	14.8	47	5.9	1.2
1042800.9	634177.2	13.6	1042802.2	634183.3	14.7	48	6.2	1.1
1042744.9	634221.2	13.2	1042751.7	634219.5	14.3	49	7.0	1.1
1042753.1	634226.7	13.2	1042746.1	634228.5	14.0	50	7.2	0.8
1042906.8	634164.9	13.4	1042910.7	634158.5	14.5	51	7.5	1.1
1042748.1	634195.9	13.9	1042742.6	634201.4	14.8	52	7.8	1.0
1042902.8	634159.4	13.4	1042910.7	634158.5	14.5	53	8.0	1.1
1042774.8	634174.4	13.7	1042774.1	634183.3	14.8	54	8.9	1.1
1042718.7	634220.2	13.3	1042728.0	634221.6	14.3	55	9.4	1.0
1042700.5	634167.4	13.7	1042709.7	634170.5	14.8	56	9.8	1.0

#### Notes:

Not all point pairs are included in this table. Pairs with a distance of 10 feet or greater between points were excluded.

Northing and easting coordinates were surveyed with four decimal places of precision in the Washington State Plan South coordinate system. One decimal place is displayed in the table for simplicity.

<sup>&</sup>lt;sup>1</sup> A nearest neighbor analysis was conducted because not all pre- and post-cover survey points were collected at the same locations. Point pairs were estimated to determine the difference in elevation before and after the cover was installed.

### **Appendix A**

## **Environmental Covenants (with Institutional Controls)**

#### **Contents:**

- Draft Environmental Covenants
- Associated Site Plan / Parcel Figures

After Recording Return to.	
Steve Teel	
Toxics Cleanup Program	
Department of Ecology	
300 Desmond Drive	<u> </u>
Lacey, WA 98503-1274	
Document Title(s)	
Environmental Covenant	
Reference Numbers(s) of related	documents
Grantor(s) (Last, First and Mide Port of Olympia	dle Initial)
Grantee(s) (Last, First and Mide	
Washington State Department of	Ecology
	form: i.e. lot, block, plat or section, township, range,
quarter/quarter)	
Lat 10 Lat 11 % Lat 12 Olympa	is Anna Daving Dinding Cita Dlag Amondonant #4
Lot 10, Lot 11, & Lot 12, Olymp	oia Area Rowing Binding Site Plan Amendment #4
A	Additional legal is on page 6
Assessor's Property Tax Parcel/	Account Numbers
ITa ha ingested fall swing survey!	ing of
[To be inserted following record:	mg or
BSP Amendment]	

**After Recording Return to:** 

The Auditor/Recorder will rely on the information provided on this form. The staff will not read the document to verify the accuracy or completeness of the indexing information provided herein.

#### **ENVIRONMENTAL COVENANT**

This ENVIR	CONMENTAL COVENANT	(the "Covenant") is made and entered into the	is
day of	, 201 ("Effective I	Date"), by and between the Port of Olympia	
("Grantor") and the	Washington State Departmen	nt of Ecology ("Grantee"), pursuant to the	
Model Toxics Cont	rol Act ("MTCA"), chapter 70	0.105D RCW, and the Uniform Environmenta	al
Covenants Act ("Ul	ECA"), chapter 64.70 RCW.		

#### RECITALS

- **A.** The Property which is the subject of this Covenant consists of what has been described as Lot 10, Lot 11, and Lot 12 of a larger Site commonly known as the East Bay Redevelopment Site ("Site"), generally located at 315 Jefferson Street NE, Olympia, Washington 98501. The Property is legally described in <u>Exhibit A</u> and illustrated in <u>Exhibit B</u>, both of which are attached hereto and incorporated herein.
- **B.** The Property is the subject of certain remedial action under the terms of the Cleanup Action Plan ("CAP") as amended, copies of which are attached hereto and incorporated herein as Exhibit C (collectively, the "Remedial Actions"). This Covenant is required because after completion of Remedial Actions, residual contamination remains on the Property. Specifically, the following principal contaminants remain on the Property:

Medium	Principal Contaminants Present					
Soil	Arsenic, lead, total petroleum hydrocarbons (TPH) in the					
	gasoline range (TPH-G), total naphthalenes, TPH in the diesel					
	range (TPH-D) and TPH in the heavy oil range (TPH-HO)					
	combined, total carcinogenic polycyclic aromatic hydrocarbons					
	(cPAHs), and total chlorinated dibenzo-p-dioxins and					
	chlorinated dibenzofurans (dioxins/furans) were identified as					
	soil constituents of concern (COCs).					

- C. It is the purpose of this Covenant to restrict certain activities and uses of the Property to protect human health and the environment and the integrity of Remedial Actions conducted at the Site. Records describing the extent of residual contamination and the Remedial Actions conducted are available through the Washington State Department of Ecology ("Ecology").
- **D.** This Covenant grants Ecology certain rights under UECA and as specified in this Covenant. As a Holder of this Covenant under UECA, Ecology has an interest in real property; however, this is not an ownership interest which equates to liability under MTCA or the Comprehensive Environmental Response, Compensation and Liability Act (42 U.S.C. 9601 et seq.). The rights of Ecology as an "agency" under UECA, other than its right as a "holder," are not an interest in real property.

#### **COVENANT**

The Port of Olympia, as Grantor and fee simple owner of the Property hereby grants to Ecology, as Grantee, and its successors and assignees, the following covenants. It is the intent of the Grantor that such covenants shall supersede any prior interests the Grantor has in the property and run with the land and be binding on all current and future owners of any portion of, or interest in, the Property.

#### Section 1. General Restrictions and Requirements.

The following general restrictions and requirements shall apply to the Property:

- **a. Interference with Remedial Action**. The Grantor shall not engage in any activity on the Property that may impact or interfere with any operation, maintenance, inspection, or monitoring of the remedial actions without prior written approval from Ecology.
- **b.** Protection of Human Health and the Environment. The Grantor shall not engage in any activity on the Property that may threaten continued protection of human health or the environment without prior written approval from Ecology. This includes, but is not limited to, any activity that results in the release of residual contamination that was contained as part of the Remedial Actions or that exacerbates or creates a new exposure to residual contamination remaining on the Property.
- **c. Continued Compliance Required**. Grantor shall not convey any interest in any portion of the Property without providing for continued compliance with this Covenant.
- **d.** Leases. Grantor shall restrict any lease for any portion of the Property to uses and activities consistent with this Covenant and notify all lessees of the restrictions on the use of the Property.
- e. Preservation of Reference Monuments. Grantor shall make a good faith effort to preserve any reference monuments and boundary markers used to define the area of coverage of this Covenant. Should a monument or marker be damaged or destroyed, Grantor shall have it replaced by a licensed professional surveyor within thirty (30) days of discovery of the damage or destruction.

#### Section 2. Specific Prohibitions and Requirements.

**a. Description of Remedial Actions**. The Remedial Actions for the portion of the Site located on the Property contemplate redevelopment of the Property with urban density mixed-use development and requires excavating contaminated soil, installing clean soil, installing a soil cover cap, and establishing institutional controls, as described in **Exhibit C** and illustrated in Exhibit D.

#### b. Site-Specific Restrictions.

- (1) The following activities are prohibited on or within the Property:
  - (a) Breach of the cap or soil cover, unless done with prior written approval from Ecology.
  - (b) Installation of a well for water supply purposes.
  - (c) Extraction of groundwater for any purpose other than temporary construction dewatering, investigation, monitoring, or remediation.
  - (d) Discharge of groundwater extracted from the Property, unless done in accordance with state and federal law.
  - (e) Construction or occupancy of single-family residences cover, unless done with prior written approval from Ecology.
  - (f) Activities inconsistent with the approved Operations and Maintenance Plan for the Site, unless done with prior written approval from Ecology.
- (2) The following development restrictions shall apply to the specified contaminant delineation areas on the Property depicted as within the yellow boundary on Exhibit  $\underline{D}$ .
  - (a) Construction of stormwater infiltration facilities or ponds.
  - (b) All stormwater catch basins, conveyance systems, and other appurtenances shall be of water-tight construction.

#### Section 3. Access.

- **a.** The Grantor freely and voluntarily grants Ecology and its authorized representatives, upon reasonable notice, the right to enter the Property at reasonable times to evaluate the effectiveness of this Covenant and associated Remedial Actions, and enforce compliance with this Covenant and those Remedial Actions, including the right to take samples, inspect any Remedial Actions conducted on the Property, and to inspect related records.
- **b.** No right of access or use by a third party to any portion of the Property is conveyed by this instrument.

#### Section 4. Notice Requirements.

- **a.** Conveyance of any Interest. The Grantor, when conveying any interest in any part of the Property, including but not limited to title, easement, leases, and security or other interest, must:
- **i.** Provide written notice to Ecology of the intended conveyance at least thirty (30) days in advance of the conveyance.
- **ii.** Include in the conveying document a notice in substantially the following form, as well as a complete copy of this Covenant:

NOTICE: THIS PROPERTY IS SUBJECT TO AN ENVIRONMENTAL COVENANT GRANTED TO THE WASHINGTON STATE DEPARTMENT OF ECOLOGY ON [INSERT DATE] AND RECORDED WITH THE THURSTON COUNTY AUDITOR UNDER RECORDING NUMBER [INSERT NUMBER]. USES AND ACTIVITIES ON THIS PROPERTY MUST COMPLY WITH THAT COVENANT, A COMPLETE COPY OF WHICH IS ATTACHED TO THIS DOCUMENT.

- **iii.** Unless otherwise agreed to in writing by Ecology, provide Ecology with a complete copy of the executed document within thirty (30) days of the date of execution of such document.
- **b.** Reporting Violations. Should the Grantor become aware of any violation of this Covenant, Grantor shall promptly report such violation in writing to Ecology.
- **c. Emergencies**. For any emergency or significant change in site conditions due to Acts of Nature (e.g., flood or fire) resulting in a violation of this Covenant, the Grantor is authorized to respond to such an event in accordance with state and federal law. The Grantor must notify Ecology in writing of the event and response actions planned or taken as soon as practical but no later than within twenty-four (24) hours of the discovery of the event.
- **d. Notification Procedure**. Any required written notice, approval, reporting or other communication shall be personally delivered or sent by first class mail to the following persons. Any change in this contact information shall be submitted in writing to all parties to this Covenant. Upon mutual agreement of the parties to this Covenant, an alternative to personal delivery or first class mail, such as e-mail or other electronic means, may be used for these communications.

To Grantor:	Port of Olympia
	Attn: Environmental Programs Director
	606 Columbia St. NW, Suite 300

Olympia, WA 98501

To Ecology:

Environmental Covenants Coordinator Washington State Department of Ecology Toxics Cleanup Program 300 Desmond Drive Lacey, WA 98503-1274

#### **Section 5. Modification or Termination.**

- **a.** Grantor must provide written notice and obtain approval from Ecology at least sixty (60) days in advance of any proposed activity or use of the Property in a manner that is inconsistent with this Covenant. For any proposal that is inconsistent with this Covenant and permanently modifies an activity or use restriction at the site:
  - i. Ecology must issue a public notice and provide an opportunity for the public to comment on the proposal; and
  - **ii.** If Ecology approves of the proposal, the Covenant must be amended to reflect the change before the activity or use can proceed.
- **b.** If the conditions at the site requiring a Covenant have changed or no longer exist, then the Grantor may submit a request to Ecology that this Covenant be amended or terminated. Any amendment or termination of this Covenant must follow the procedures in MTCA and UECA and any rules promulgated under these chapters.
- **c.** By signing this agreement, per RCW 64.70.100, the original signatories to this agreement, other than Ecology, agree to waive all rights to sign amendments to and termination of this Covenant.

#### Section 6. Enforcement and Construction.

- **a.** This Covenant is being freely and voluntarily granted by the Grantor.
- **b.** Within ten (10) days of execution of this Covenant, Grantor shall provide Ecology with an original signed Covenant and proof of recording and a copy of the Covenant and proof of recording to others required by RCW 64.70.070.
- c. Ecology shall be entitled to enforce the terms of this Covenant by resort to specific performance or legal process. All remedies available in this Covenant shall be in addition to all remedies at law or in equity, including MTCA and UECA. Enforcement of the terms of this Covenant shall be at the discretion of Ecology, and any forbearance, delay, or omission to exercise its rights under this Covenant in the event of a breach of any term of this

Covenant is not a waiver by Ecology of that term or of any subsequent breach of that term, or any other term in this Covenant, or of any rights of Ecology under this Covenant.

- **d.** The Grantor shall be responsible for all costs associated with implementation of this Covenant. Further, the Grantor, upon request by Ecology, shall be obligated to pay for Ecology's costs to process a request for any modification or termination of this Covenant and any approval required by this Covenant.
- **e.** This Covenant shall be liberally construed to meet the intent of MTCA and UECA.
- **f.** The provisions of this Covenant shall be severable. If any provision in this Covenant or its application to any person or circumstances is held invalid the remainder of this Covenant or its application to any person or circumstance is not affected and shall continue in full force and effect as though such void provisions had not been contained herein.
- **g.** A heading used at the beginning of any section or exhibit of this Covenant may be used to aid in the interpretation of that section or exhibit but does not override the specific requirements in that section or exhibit.

The undersigned warrants that he has authority to execute this Covenant on behalf of the Grantor.

EXECUTED this day of	, 201
GRANTOR:	
(Signature)	
E.B. Galligan	
Executive Director, Port of Olympia	

The Department of Ecology, hereby accepts the status as GRANTEE and HOLDER of the above Environmental Covenant.

GRANTEE:	
STATE OF WASHINGTON DEPARTMENT OF ECOLOGY	
(Signature)	
(Printed Name)	
Title:	
Dated:	

#### GRANTOR ACKNOWLEDGMENT

COUNTY OF <u>THURSTON</u> )
On this day of, personally appeared before me <b>E.B. Galligan</b> , to me known to be the Executive Director at the Port of Olympia, the municipal corporation named in the within and foregoing instrument and acknowledged to me that he signed the same on its behalf, as he is so authorized to do, as his free and voluntary act and deed for the uses and purposes therein mentioned.
IN WITNESS WHEREOF, I have hereunto set my hand and seal the day and year first above written.
Print Name:
Notary Public, State of
My appointment expires
STATE ACKNOWLEDGMENT
STATE OF) SS. COUNTY OF)
On this day of, 20, I certify that personally appeared before me, acknowledged
that he/she is the of the state agency that executed the
within and foregoing instrument, and signed said instrument by free and voluntary act and deed,
for the uses and purposes therein mentioned, and on oath stated that he/she was authorized to
execute said instrument for said state agency.
Print Name:
Notary Public, State of Washington
My appointment expires

Stave Teel	
Steve Teel Toxics Cleanup Program	<del></del>
Department of Ecology	<del>_</del>
300 Desmond Drive	<del></del>
Lacey, WA 98503-1274	<del></del>
Lacey, W11 70303 1274	<del></del>
	<del></del>
<b>Document Title(s)</b>	
Environmental Covenant	
Reference Numbers(s) of related	I documents
Grantor(s) (Last, First and Mid-	dle Initial)
Port of Olympia	
Grantee(s) (Last, First and Mide	
Washington State Department of	f Ecology
· ,	form: i.e. lot, block, plat or section, township, range,
quarter/quarter)	
	rediately north of Lot 7), Lot 4, Lot 5, Lot 6, Lot 7, & Lot
9, Olympia Area Rowing Bindin	
	Additional legal is on page 6
Assessor's Property Tax Parcel/	Account Numbers
[To be inserted following record	ing of
BSP Amendment]	

**After Recording Return to:** 

The Auditor/Recorder will rely on the information provided on this form. The staff will not read the document to verify the accuracy or completeness of the indexing information provided herein.



#### **ENVIRONMENTAL COVENANT**

This ENVII	RONMENTAL CO	VENANT (the "C	Covenant") is m	ade and entered i	nto this
day of	, 201(	"Effective Date"),	, by and betwee	n the Port of Oly	mpia
("Grantor") and the	: Washington State	Department of Ed	cology ("Grante	ee"), pursuant to t	he
Model Toxics Cont	rol Act ("MTCA")	, chapter 70.105D	RCW, and the	Uniform Environ	nmental
Covenants Act ("U	ECA"), chapter 64.	.70 RCW.			

#### **RECITALS**

- **A.** The Property which is the subject of this Covenant consists of what has been described as Lot 1 (Shark Fin only), Lot 4, Lot 5, Lot 6, Lot 7, and Lot 9 of a larger Site commonly known as the East Bay Redevelopment Site ("Site"), generally located at 315 Jefferson Street NE, Olympia, Washington 98501. The Property is legally described in Exhibit A and illustrated in Exhibit B, both of which are attached hereto and incorporated herein.
- **B.** The Property is the subject of certain remedial action under the terms of the Cleanup Action Plan ("CAP"), a copy of which is attached hereto and incorporated herein as Exhibit C. This Covenant is required because after completion of Remedial Action, residual contamination remains on the Property. Specifically, the following principal contaminants remain on the Property:

Medium	Principal Contaminants Present
Soil	Arsenic, lead, total petroleum hydrocarbons (TPH) in the
	gasoline range (TPH-G), total naphthalenes, TPH in the diesel
	range (TPH-D) and TPH in the heavy oil range (TPH-HO)
	combined, total carcinogenic polycyclic aromatic hydrocarbons
	(cPAHs), and total chlorinated dibenzo-p-dioxins and
	chlorinated dibenzofurans (dioxins/furans) were identified as
	soil constituents of concern (COCs).

- C. It is the purpose of this Covenant to restrict certain activities and uses of the Property to protect human health and the environment and the integrity of Remedial Action conducted at the Site. Records describing the extent of residual contamination and the Remedial Action conducted are available through the Washington State Department of Ecology ("Ecology").
- **D.** This Covenant grants Ecology certain rights under UECA and as specified in this Covenant. As a Holder of this Covenant under UECA, Ecology has an interest in real property; however, this is not an ownership interest which equates to liability under MTCA or the Comprehensive Environmental Response, Compensation and Liability Act (42 U.S.C. 9601 et seq.). The rights of Ecology as an "agency" under UECA, other than its right as a "holder," are not an interest in real property.

#### **COVENANT**

The Port of Olympia, as Grantor and fee simple owner of the Property hereby grants to Ecology, as Grantee, and its successors and assignees, the following covenants. It is the intent of the Grantor that such covenants shall supersede any prior interests the Grantor has in the property and run with the land and be binding on all current and future owners of any portion of, or interest in, the Property.

#### Section 1. General Restrictions and Requirements.

The following general restrictions and requirements shall apply to the Property:

- **a. Interference with Remedial Action**. The Grantor shall not engage in any activity on the Property that may impact or interfere with any operation, maintenance, inspection, or monitoring of the remedial action without prior written approval from Ecology.
- b. Protection of Human Health and the Environment. The Grantor shall not engage in any activity on the Property that may threaten continued protection of human health or the environment without prior written approval from Ecology. This includes, but is not limited to, any activity that results in the release of residual contamination that was contained as part of the Remedial Action or that exacerbates or creates a new exposure to residual contamination remaining on the Property.
- **c. Continued Compliance Required**. Grantor shall not convey any interest in any portion of the Property without providing for continued compliance with this Covenant.
- **d. Leases**. Grantor shall restrict any lease for any portion of the Property to uses and activities consistent with this Covenant and notify all lessees of the restrictions on the use of the Property.
- **e. Preservation of Reference Monuments**. Grantor shall make a good faith effort to preserve any reference monuments and boundary markers used to define the area of coverage of this Covenant. Should a monument or marker be damaged or destroyed, Grantor shall have it replaced by a licensed professional surveyor within thirty (30) days of discovery of the damage or destruction.

#### Section 2. Specific Prohibitions and Requirements.

**a. Description of Remedial Action**. The Remedial Action for the portion of the Site located on the Property contemplates redevelopment of the Property with urban density mixed-use development and requires excavating contaminated soil, installing clean soil,

installing a soil cover cap, and establishing institutional controls, as described in <u>Exhibit C</u> and illustrated in Exhibit D.

#### b. Site-Specific Restrictions.

- (1) The following activities are prohibited on or within the Property:
  - (a) Breach of the cap or soil cover, unless done with prior written approval from Ecology.
  - (b) Installation of a well for water supply purposes.
  - (c) Extraction of groundwater for any purpose other than temporary construction dewatering, investigation, monitoring, or remediation.
  - (d) Discharge of groundwater extracted from the Property, unless done in accordance with state and federal law.
  - (e) Construction or occupancy of single-family residences cover, unless done with prior written approval from Ecology.
  - (f) Activities inconsistent with the approved Operations and Maintenance Plan for the Site, unless done with prior written approval from Ecology.
- (2) The following development restrictions shall apply to the specified contaminant delineation areas on the Property depicted as within the yellow boundary on Exhibit  $\underline{D}$ .
  - (a) Construction of stormwater infiltration facilities or ponds.
  - (b) All stormwater catch basins, conveyance systems, and other appurtenances shall be of water-tight construction.

#### Section 3. Access.

**a.** The Grantor freely and voluntarily grants Ecology and its authorized representatives, upon reasonable notice, the right to enter the Property at reasonable times to evaluate the effectiveness of this Covenant and associated Remedial Action, and enforce compliance with this Covenant and those Remedial Action, including the right to take samples, inspect any Remedial Action conducted on the Property, and to inspect related records.

**b.** No right of access or use by a third party to any portion of the Property is conveyed by this instrument.

#### Section 4. Notice Requirements.

- **a.** Conveyance of any Interest. The Grantor, when conveying any interest in any part of the Property, including but not limited to title, easement, leases, and security or other interest, must:
- **i.** Provide written notice to Ecology of the intended conveyance at least thirty (30) days in advance of the conveyance.
- **ii.** Include in the conveying document a notice in substantially the following form, as well as a complete copy of this Covenant:

NOTICE: THIS PROPERTY IS SUBJECT TO AN ENVIRONMENTAL COVENANT GRANTED TO THE WASHINGTON STATE DEPARTMENT OF ECOLOGY ON [INSERT DATE] AND RECORDED WITH THE THURSTON COUNTY AUDITOR UNDER RECORDING NUMBER [INSERT NUMBER]. USES AND ACTIVITIES ON THIS PROPERTY MUST COMPLY WITH THAT COVENANT, A COMPLETE COPY OF WHICH IS ATTACHED TO THIS DOCUMENT.

- **iii.** Unless otherwise agreed to in writing by Ecology, provide Ecology with a complete copy of the executed document within thirty (30) days of the date of execution of such document.
- **b.** Reporting Violations. Should the Grantor become aware of any violation of this Covenant, Grantor shall promptly report such violation in writing to Ecology.
- **c. Emergencies**. For any emergency or significant change in site conditions due to Acts of Nature (e.g., flood or fire) resulting in a violation of this Covenant, the Grantor is authorized to respond to such an event in accordance with state and federal law. The Grantor must notify Ecology in writing of the event and response actions planned or taken as soon as practical but no later than within twenty-four (24) hours of the discovery of the event.
- **d. Notification Procedure**. Any required written notice, approval, reporting or other communication shall be personally delivered or sent by first class mail to the following persons. Any change in this contact information shall be submitted in writing to all parties to this Covenant. Upon mutual agreement of the parties to this Covenant, an alternative to personal delivery or first class mail, such as e-mail or other electronic means, may be used for these communications.

To Grantor: Port of Olympia

Attn: Environmental Programs Director

606 Columbia St. NW, Suite 300

Olympia, WA 98501

To Ecology: Environmental Covenants Coordinator

Washington State Department of Ecology

Toxics Cleanup Program 300 Desmond Drive Lacey, WA 98503-1274

#### **Section 5. Modification or Termination.**

**a.** Grantor must provide written notice and obtain approval from Ecology at least sixty (60) days in advance of any proposed activity or use of the Property in a manner that is inconsistent with this Covenant. For any proposal that is inconsistent with this Covenant and permanently modifies an activity or use restriction at the site:

- i. Ecology must issue a public notice and provide an opportunity for the public to comment on the proposal; and
- ii. If Ecology approves of the proposal, the Covenant must be amended to reflect the change before the activity or use can proceed.
- **b.** If the conditions at the site requiring a Covenant have changed or no longer exist, then the Grantor may submit a request to Ecology that this Covenant be amended or terminated. Any amendment or termination of this Covenant must follow the procedures in MTCA and UECA and any rules promulgated under these chapters.
- **c.** By signing this agreement, per RCW 64.70.100, the original signatories to this agreement, other than Ecology, agree to waive all rights to sign amendments to and termination of this Covenant.

#### Section 6. Enforcement and Construction.

- **a.** This Covenant is being freely and voluntarily granted by the Grantor.
- **b.** Within ten (10) days of execution of this Covenant, Grantor shall provide Ecology with an original signed Covenant and proof of recording and a copy of the Covenant and proof of recording to others required by RCW 64.70.070.
- c. Ecology shall be entitled to enforce the terms of this Covenant by resort to specific performance or legal process. All remedies available in this Covenant shall be in

addition to all remedies at law or in equity, including MTCA and UECA. Enforcement of the terms of this Covenant shall be at the discretion of Ecology, and any forbearance, delay, or omission to exercise its rights under this Covenant in the event of a breach of any term of this Covenant is not a waiver by Ecology of that term or of any subsequent breach of that term, or any other term in this Covenant, or of any rights of Ecology under this Covenant.

- **d.** The Grantor shall be responsible for all costs associated with implementation of this Covenant. Further, the Grantor, upon request by Ecology, shall be obligated to pay for Ecology's costs to process a request for any modification or termination of this Covenant and any approval required by this Covenant.
- **e.** This Covenant shall be liberally construed to meet the intent of MTCA and UECA.
- **f.** The provisions of this Covenant shall be severable. If any provision in this Covenant or its application to any person or circumstances is held invalid the remainder of this Covenant or its application to any person or circumstance is not affected and shall continue in full force and effect as though such void provisions had not been contained herein.
- **g.** A heading used at the beginning of any section or exhibit of this Covenant may be used to aid in the interpretation of that section or exhibit but does not override the specific requirements in that section or exhibit.

The undersigned warrants that he has authority to execute this Covenant on behalf of the Grantor.

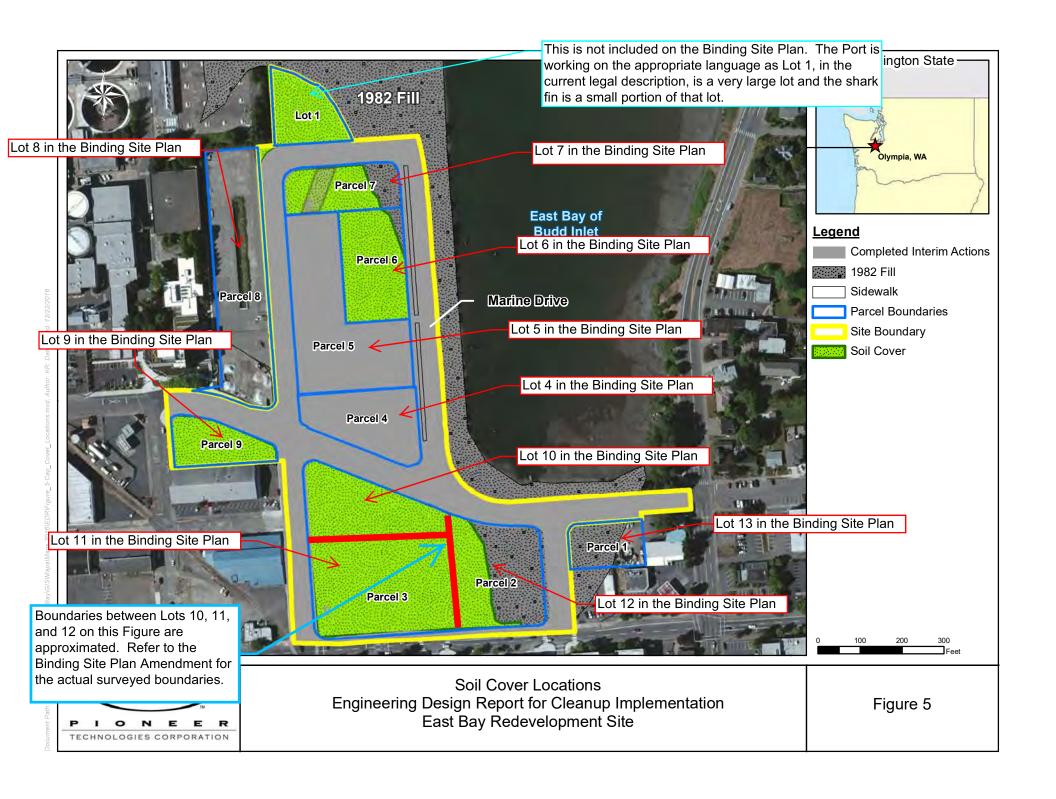
EXECUTED this	day of	, 201
GRANTOR:		
(3)		
(Sign	ature)	
E.B. Galligan		
Executive Director,	Port of Olympia	

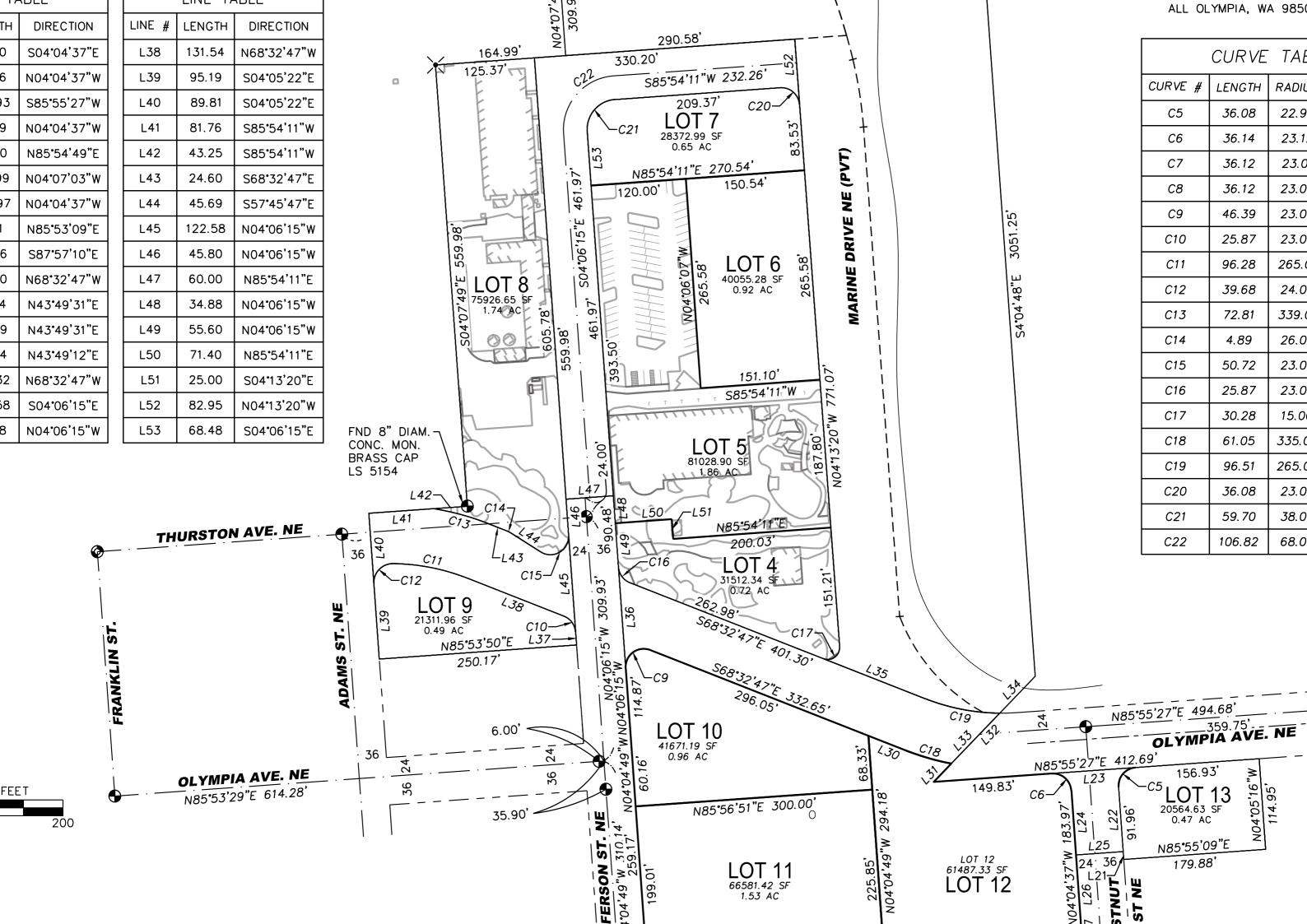
The Department of Ecology, hereby accepts the status as GRANTEE and HOLDER of the above Environmental Covenant.

(21	gnature)
(Pt	rinted Name)
Title:	
Dated:	

#### GRANTOR ACKNOWLEDGMENT

COUNTY OF <u>THURSTON</u> )
On this day of, personally appeared before me <b>E.B. Galligan</b> , to me known to be the Executive Director at the Port of Olympia, the municipal corporation named in the within and foregoing instrument and acknowledged to me that he signed the same on its behalf, as he is so authorized to do, as his free and voluntary act and deed for the uses and purposes therein mentioned.
IN WITNESS WHEREOF, I have hereunto set my hand and seal the day and year first above written.
Print Name:
Notary Public, State of
My appointment expires
STATE ACKNOWLEDGMENT
STATE OF) SS. COUNTY OF)
On this day of, 20, I certify that personally appeared before me, acknowledged
that he/she is the of the state agency that executed the
within and foregoing instrument, and signed said instrument by free and voluntary act and deed,
for the uses and purposes therein mentioned, and on oath stated that he/she was authorized to
execute said instrument for said state agency.
Print Name:
Notary Public, State of Washington
My appointment expires





# Appendix B Daily Field Notes

#### **Contents:**

- Port Inspector's Daily Journal Entries
- Contractor's Daily Log Entries
- PIONEER's Daily Field Notes

#### East Bay Cleanup ENV1303



#### **Port Inspector's Daily Journal: 1**

**Subject:** 09/06/2017

Author: Tyson Carpenter

Date Created: 09.08.2017 09:45am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.06.2017

Avg. Temp. Fereinheight: 80.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor began mobilization to the project including delivery of equipment and

and getting started with utility locates on parcels 2/3. The first weekly project meeting was held at 9:00 am. Meeting agendas and minutes will be kept in the

09.08 Meeting folder and distributed by email.

Notice to Proceed was issued on 8/30/2017. Working Days began on 8/31 and

include 9/1 & 9/5. Today is Working Day 4.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report:

YES as noted below. (ACTION Required to RESOLVE) FILL OUT PROJECT

**ISSUE FORM!!** 

**Safety Observation** 

Notes:

During a site walk to look at the utility locates, I realized there is a potential that used needles have been thrown over the fences. I discussed with Tony Bahnick

and we agreed that it should be addressed in the Health and Safety Plan.

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Volvo EC160EL Excavator

Make and Model and John Deere 544K Front End Loader

**Hours Used:** Single Axle water truck

Subcontractors on Site

OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

11/6/2017, 1:46 PM

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created

09.08.2017 09:45am

CC:

Comment

09.18.2017 10:28am

By: Tyson Carpenter

CC:

Form closed.

2 of 2

#### East Bay Cleanup ENV1303



#### Port Inspector's Daily Journal: 2

**Subject:** 09/07/2017

Author: Tyson Carpenter

Date Created: 09.08.2017 09:59am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.07.2017

Avg. Temp. Fereinheight: 75.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor continued moving in and getting set up including placement of plates

and a cold mix ramp for the entrance to the staging area on parcel 2 off of Chestnut St, job trailers, portable toilet and hand washing facilities, and a

storage container.

Working Day 5.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Safety Observation I dropped off a sharps container at the job trailer that can be used for any

**Notes:** needles found.

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Geotextile fabric

Labor on Site

Classification or Name,

**Materials delivered** 

and Hours Worked: Text

Record Materials Delivered to Site and Used

and/or used: Silt Fence

Construction Fence

Record Equipment on Site

List Equipment Type, Volvo EC160EL Excavator

Make and Model and John Deere 544K Front End Loader

Hours Used: Single Axle water truck

Truck - End Dump Pickup - Foreman

Subcontractors on Site

OTHER WORK

1 of 2

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

**Form Created** 

09.08.2017 09:59am

CC:

**Comment** 09.18.2017 10:29am

By: Tyson Carpenter

CC

Form closed.

2 of 2



#### **East Bay Cleanup**

#### **Port Inspector's Daily Journal: 3**

**Subject:** 09/08/2017

Author: Tyson Carpenter

**Date Created:** 09.11.2017 02:44pm

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.08.2017

Avg. Temp.

Fereinheight: 65.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

General Notes: Items performed include: installed construction entrance to staging area, field

staking, additional mobilization and setup.

Based on field elevations and the alignment staked, it looks like the storm pipe near the corner of Chestnut St NE and State Ave NE will pass under the existing

communication utility conduit and junction box by a few inches.

Working Day 6.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Materials delivered Quarry Spalls and/or used: Quarry Spalls

Record Equipment on Site

List Equipment Type, Volvo EC160EL Excavator

Make and Model and John Deere 544K Front End Loader

Hours Used: Single Axle water truck

Truck - End Dump Pickup - Foreman 2 Baker Tanks, 1 Frac Tank

Subcontractors on Site

#### OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported **Attached Files:** 2017-09-08 145632453.jpg

Form Created 09.11.2017 02:44pm

CC:

Comment

09.18.2017 10:29am

Form closed.

By: Tyson Carpenter



### East Bay Cleanup ENV1303



# **Port Inspector's Daily Journal: 4**

09/11/2017 Subject:

Author: Tyson Carpenter **Date Created:** 09.12.2017 02:10pm

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.11.2017

Avg. Temp. Fereinheight: 75.00

Weather: Sunny

**Wind Conditions:** Normal (0-20 mph)

**General Notes:** Contractor continued mobilization, setup, and installation of a construction fence

between the site and staging area and TESC measures such as silt fence and

the construction entrance to parcel 3.

Working Day 7.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Volvo EC160EL Excavator Make and Model and

John Deere 544K Front End Loader

**Hours Used:** Single Axle water truck

Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer

Subcontractors on Site

OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

11/6/2017, 1:43 PM 1 of 2

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created

09.12.2017 02:10pm

CC:

Comment

09.18.2017 10:29am

By: Tyson Carpenter

CC:

Form closed.

2 of 2



# **Port Inspector's Daily Journal: 5**

**Subject:** 09/12/2017

Author: Tyson Carpenter

**Date Created:** 09.13.2017 10:05am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.12.2017

Avg. Temp.

Fereinheight: 70.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor continued installation of parcel 3 construction entrance wheel wash

and preparations for the cut at the perimeter sidewalks. Levi and Heather (Pioneer) visited first thing morning to attend the safety orientation and did a

short walk through.

Tony and I discussed the possibility of needing additional stabilization or possibly using larger rock in the areas that are saturated. Tony contacted NW Linings, a Tensar Representative, and they provided some recommendations. I indicated that I would prefer to see how the ground reacts when equipment is operated on it to make the cuts and install the storm utilities prior to making any changes. A representative from NW Linings and a Tensar engineer are planning

to visit the site on Friday at 1:00.

Working Day 8.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created

09.13.2017 10:05am

CC:

**Comment** By: Tyson Carpenter

09.14.2017 08:18am CC

2 documents were attached.

Attached Files: 2017-09-13 10.33.51.jpg, 2017-09-13 10.33.55.jpg

**Comment** By: Tyson Carpenter

09.14.2017 08:19am CC







# **Port Inspector's Daily Journal: 6**

**Subject:** 09/13/2017

Author: Tyson Carpenter

**Date Created:** 09.15.2017 10:18am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.13.2017

Avg. Temp.

Fereinheight: 70.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

General Notes: The weekly project meeting was held at 9:00 am. Contractor continued working

on the cuts around the perimeter. ESN was on site for the safety orientation meeting this morning and plans to work on the decommissioning the monitoring

wells that are within the site.

Late yesterday I spoke with Chris Waldron about the cut along the 1982 fill boundary. The Engineering Design Report indicates that the 12" gravel cover is to extend 1-2 feet beyond the 1982 fill boundary and then taper down to existing ground. Therefore, the 1 foot taper cut at the boundary as shown on cross section A-A on sheet 8 is not required. Since some of this was already cut, the contractor will fill the area either with excess materials, if available, or new material. I spoke with Brad Coury about providing a installed price either by the ton or cubic yard for the gravel cover so that we can pay for the additional material needed both to backfill the cut that was done per plans and to extend the 12" gravel cover 1-2 feet beyond the boundary and taper down to existing grade.

Contractor has been doing a good job of dust control by implementing using water. Heather (Pioneer) is on site performing dust monitoring, Monitors were placed on the perimeter fence near the work area and on one worker near the ground disturbing activities.

ground disturbing activities.

Working Day 9.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

SWPP Observations: NO SWPP Protection Issues Observed

Labor on Site

**Hours Used:** 

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and

Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer

Subcontractors on Site

Subcontractors on Site: ESN - Decommissioning Monitoring Wells

OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

**Attached Files:** 2017-09-14 09.09.50.jpg (Removed)

Form Created

09.15.2017 10:18am

CC:

**Comment** By: Tyson Carpenter

09.15.2017 10:33am CC

2 documents were attached.

Attached Files: 2017-09-13 10.33.51.jpg, 2017-09-13 10.33.55.jpg

**Comment** By: Tyson Carpenter

09.18.2017 10:29am Co







# Port Inspector's Daily Journal: 7

**Subject:** 09/14/2017

Author: Tyson Carpenter

**Date Created:** 09.15.2017 10:35am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.14.2017

Avg. Temp.

Fereinheight: 70.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor began the day with a safety meeting. Heather (Pioneer) was on site

again today performing dust monitoring of the ground disturbing activities.

I spoke with Tony and Alvin first thing about the change to eliminate the cut at the 1982 fill boundary and extending the gravel cover 1-2 feet beyond the boundary, then tapering to the existing grade. I also spoke to Brad Coury about potential changes for using quarry spalls in soft bottomed trenches and adding a catch basin and realigning the storm pipe near the corner of State and Chestnut to avoid the existing utility structures. I provided them with a new drawing and

asked that they provide a change order proposal.

Crews continued to work on the perimeter cut, beginning on the southwest edge along State Ave and moving west. By the end of the day they were around the corner and working on the cut next to the sidewalk on Jefferson St.

ESN attended the safety orientation, will be decommissioning the monitoring

wells.

Working Day 10.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and

Volvo EC160EL Excavator

Hours Used:

John Deere 544K Front End Loader Single Axle water truck

Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer

2017-09-14 09.09.50.jpg

Subcontractors on Site

Subcontractors on Site: ESN - Decommissioning Monitoring Wells

OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created 09.15.2017 10:35am

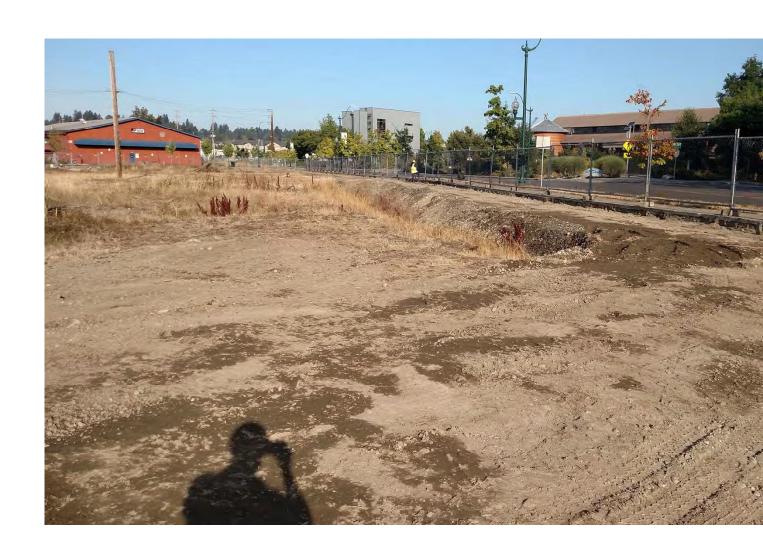
Attached Files:

CC:

Comment

By: Tyson Carpenter cc:

09.18.2017 10:29am



### East Bay Cleanup ENV1303



# Port Inspector's Daily Journal: 8

**Subject:** 09/15/2017

Author: Tyson Carpenter

**Date Created:** 09.18.2017 10:24am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.15.2017

Avg. Temp. Fereinheight: 75.00

Weather: Sunny

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor started the day with a safety meeting. Heather is on site to set up the

dust monitoring for the day and will return at the end of the day to collect the

monitors.

At 9:00 am, Rachael, Chris, Tony and I met on site with Justin Boyes from LOTT to do a site walk through of the water treatment system that will be used prior to discharge to LOTT. No issues were raised. Justin asked that we send him a photo of the flow meter once it has been installed and provide the required notification 48 prior to discharge.

Crews plan to place geotextile fabric and some of the gravel cover near the eastern border adjacent to the staging area. This will allow an area for equipment and vehicles to park should forecasted rain events cause muddy site conditions.

At 1:00 pm I met on site with Tony and representatives from Tensar, NW Linings and Black Lake Resources to discuss possible solutions for the soft soils in the saturated areas. Jordan Rabin (Tensar) took some field measurements with a dynamic cone penetrometer and will run some analysis based on the results. Based on the results, Tensar and NW Linings will make some recommendations regarding geogrid choices to provide better stability in those areas. Field tests seemed to indicate that the top 6-8 inches were soft, but that the underlying

material was fairly firm.

Geotextile fabric is being installed with proper overlap and even spread.

Working Day 11.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

11/6/2017, 1:39 PM

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

Subcontractors on Site

OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

**Form Created** 

09.18.2017 10:24am

CC:

**Comment** By: Tyson Carpenter

09.19.2017 11:14am

Form closed.

2 of 2

#### East Bay Cleanup ENV1303



# **Port Inspector's Daily Journal: 9**

**Subject:** 09/18/2017

Author: Tyson Carpenter

Date Created: 09.19.2017 10:42am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.18.2017

Avg. Temp. Fereinheight: 60.00

Weather: Scattered Showers
Wind Conditions: Normal (0-20 mph)

General Notes: Contractor started the day with safety meeting. Crews plant to continue working

on the cut along the west boundary of parcel 3 and trimming vegetation.

Weather started off rainy, then scattered showers with some short, heavier rains

in the afternoon. Work was stopped for about 20 minutes due to threat of

lightning.

Tony indicated that they plan to push back the target soil removal one day to Thursday, September 21 because the weather forecast looks better that day.

Working Day 12.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

**SWPP Observations:** BMPs appear to be effective at keeping stormwater on site and controlling

erosion and sedimentation. Tony has been performing inspections weekly and

after rain events.

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck
Truck - End Dump

Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe

11/6/2017, 1:37 PM

Heavy Flatbed Trailer John Deere 650K Dozer

Subcontractors on Site

OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** Minor weather related delays, see General Notes.

Form Created

09.19.2017 10:42am

CC:

Comment

By: Tyson Carpenter

10.05.2017 10:05am **CC**:

Form closed.

2 of 2



# **Port Inspector's Daily Journal: 10**

**Subject:** 09/19/2017

Author: Tyson Carpenter

**Date Created:** 09.19.2017 11:14am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.19.2017

Avg. Temp.

Fereinheight: 55.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor started the day with safety meeting. Crews plans to continue working

on trimming vegetation and grading. Weather was rainy overnight, cleared up in

the morning, then back to clouds with some scattered light showers.

Tony emailed in the afternoon to inform me that the targeted soil removal (hotspot excavations) are being pushed back to Friday, 9/22. They plan to work

on catch basins and preparations for the excavations Wednesday and

Thursday.

Pioneer is on site performing dust monitoring again today.

Working Day 13.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

**List Equipment Type**, Volvo EC160EL Excavator

Make and Model and John Deere 544K Front End Loader

Hours Used: Single Axle water truck

Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

CC:

Form Created

09.19.2017 11:14am

**Comment** By: Tyson Carpenter

09.20.2017 02:15pm CC

5 documents were attached.

<u>Attached Files:</u> 2017-09-19 11.39.25.jpg, 2017-09-19 11.39.28.jpg, 2017-09-19 11.40.21.jpg, 2017-09-19 11.40.23.jpg,

2017-09-19 11.45.50.jpg

**Comment** By: Tyson Carpenter

10.05.2017 10:06am CC













# **Port Inspector's Daily Journal: 11**

**Subject:** 09/20/2017

Author: Tyson Carpenter

**Date Created:** 09.20.2017 02:26pm

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.20.2017

Avg. Temp.

Fereinheight: 55.00

Weather: Scattered Showers
Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started with a safety meeting at 7:00 am. I walked the site prior to the

meeting. There were some scattered showers in the morning. Crews worked on placing catch basins (CB) starting with CB #4, then on to CB #1, #2 & #3. An old concrete footing was found near CB #1, so the location was shifted 2-3 feet west to eliminate the conflict. The also found what appeared to be an old 1 1/2" poly water line near the footing. I instructed them to plug the end of the line to

prevent any future leaks or contamination in case it is still connected

somewhere and track as force account.

The weekly project meeting was held at 9:00 am.

Working Day 14.

Comments regarding safety related observations, for both good and bad practices.

SAFETY Observation to

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

**List Equipment Type,** Volvo EC160EL Excavator

Make and Model and John Deere 544K Front End Loader

Hours Used: Single Axle water truck

Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

CC:

Form Created

09.20.2017 02:26pm

**Comment** By: Tyson Carpenter

09.21.2017 11:10am CC

A document was attached

Attached Files: 2017-09-20 12.43.21.jpg

**Comment** By: Tyson Carpenter

10.05.2017 10:06am CC





# **Port Inspector's Daily Journal: 12**

**Subject:** 09/21/2017

Author: Tyson Carpenter

**Date Created:** 09.21.2017 11:11am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.21.2017

Avg. Temp.

Fereinheight: 58.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started with a safety meeting at 7:00 am. Plans for today include

imported quarry spalls for filling the trenches, installation of CB 4 and CB 5, and

preparations for the targeted soil removal tomorrow, 9/22.

Working Day 15.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

SWPP Observations: NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and

Volvo EC160EL Excavator

John Deere 544K Front End Loader

Hours Used:

Single Axle water truck
Truck - End Dump
Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer Subcontractors on Site

OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created 09.21.2017 11:11am

CC:

**Comment** By: Tyson Carpenter

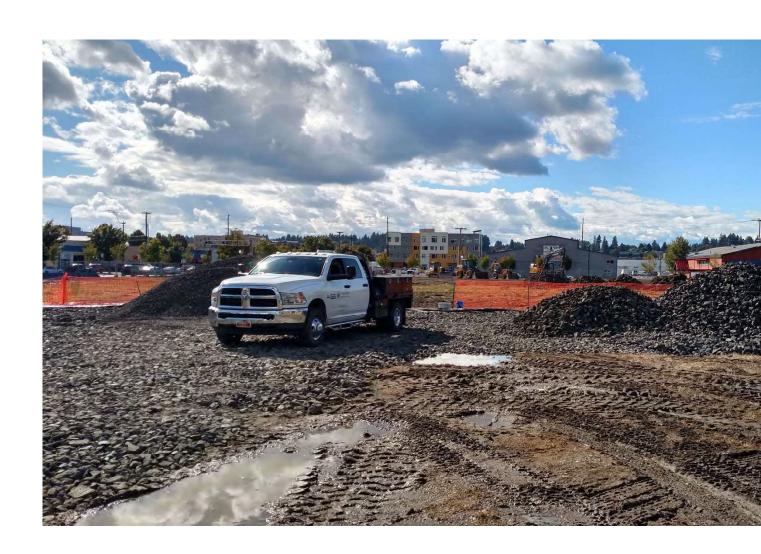
09.25.2017 09:29am C

A document was attached

Attached Files: 2017-09-21 15.10.48.jpg

**Comment** By: Tyson Carpenter

10.05.2017 10:07am C





# **Port Inspector's Daily Journal: 13**

**Subject:** 09/22/2017

Author: Tyson Carpenter

**Date Created:** 09.25.2017 09:44am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.22.2017

Avg. Temp.

Fereinheight: 70.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am. A safety meeting was held. Crews focused on

preparations for contamination of the three targeted soil removal areas (hotspot

excavation) on parcel 3.

Excavation of the first area (DP06) began around 9:30 am. Overburden was first stockpiled, then the contamination zone soils were stockpiled separately. An abandoned 4" pipe (likely sewer since it appeared to be orangeburg pipe) was located at a depth of about 2 feet. An abnadoned 8 inch ductile iron pipe, likely water, was found at a depth of about 4 feet. Both abandoned pipes were removed from the excavation area. Groundwater was present at a depth of about 4 feet, samples were taken by Pioneer prior to need to dewater.

Excavation of the next area (DP04) began around 11:00 am. An abandoned concrete footing running north-south was discovered about a foot east of the center of the excavation and extended to a depth of about 5.6-6 feet. Groundwater depth was about 4 feet. The required excavation depth required dewatering prior to sampling. Dewatering was accomplished using a 3 inch trash pump and lay flat hose to the large Baker frac tank. The contractor experience some difficulty in keeping the hole dewatered long enough to take the samples, having to repeat dewatering multiple times. A backhoe bucket was used to do the sampling and samples were able to be taken from the sides and bottom. The bucket was decontaminated between each sampling. On the east side, the sample was taken from below the concrete footing. Due to sloughing and the proximity to the utility corridor that runs behind the sidewalk, new clean 4-8" quarry spalls were placed in the hole after the samples were taken.

They started on the third excavation (MW24S) at about 1:30 pm. Excavation began with removing the existing pavement at the surface and about 6 feet of overburden. A concrete footing was also found in this hole running approximately north-south near the middle of the hole, with east-west footings near the north end of the hole and another east-west at about 8 feet south of the other. The area encompassed by these three footings/walls also appears to

have a concrete bottom at about 8 1/2 feet below existing grade (E.G.). They discovered groundwater at a depth of about 4 feet and had some difficulty with dewatering. At one point, the pump became clogged with a rock and they had to switch to a different 2 inch trash pump. They were able to get the water level down to about 7 feet below E.G. Samples were taken in the 6 1/2 to 7 foot range, but the sampled material appeared to be nearly all organic, woody material. Levi and I told them that we needed to be able to sample the entire range of 6 1/2 to 8 feet deep and also the bottom, so the hole would need to be dewatering. After multiple attempts extending late into the afternoon, they decided to call it a day and try again on Monday.

Caution tape was placed around each of the three excavations.

Working Day 16.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and

Hours Used:

Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Subcontractors on Site

OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

CC:

Form Created

09.25.2017 09:44am

**Comment** By: Tyson Carpenter

09.25.2017 09:47am CC

14 documents were attached.

Attached Files: 2017-09-22 08.48.11.jpg (Removed), 2017-09-22 09.06.32.jpg (Removed), 2017-09-22 09.06.39.jpg (Removed), 2017-09-22 09.16.09.jpg (Removed), 2017-09-22 10.53.34.jpg (Removed), 2017-09-22 11.04.50.jpg, 2017-09-22 11.43.53.jpg, 2017-09-22 14.16.21.jpg, 2017-09-22 14.47.26.jpg, 2017-09-22 14.47.32.jpg, 2017-09-22 15.04.39.jpg, 2017-09-22 15.04.46.jpg, 2017-09-22 17.00.50.jpg

**Comment** By: Tyson Carpenter

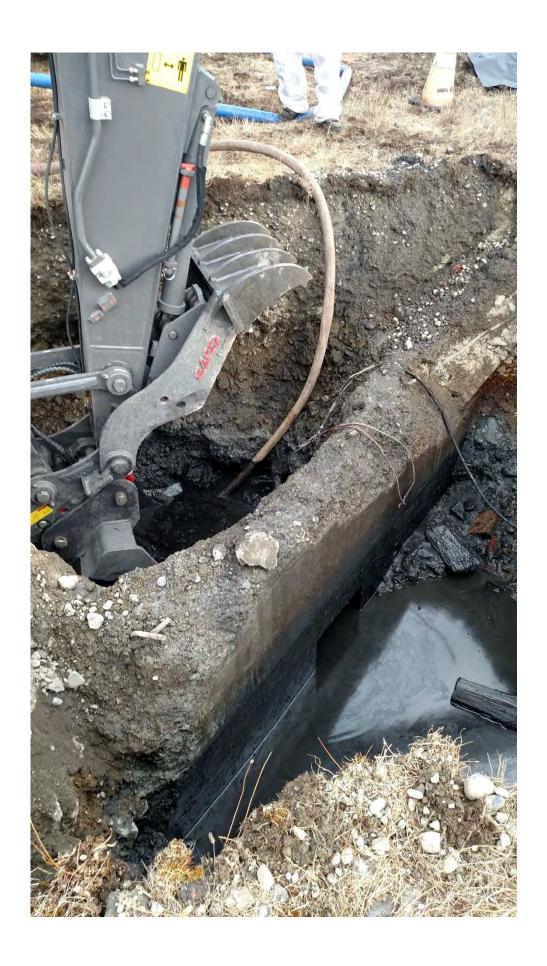
09.25.2017 09:49am CC

5 documents were attached.

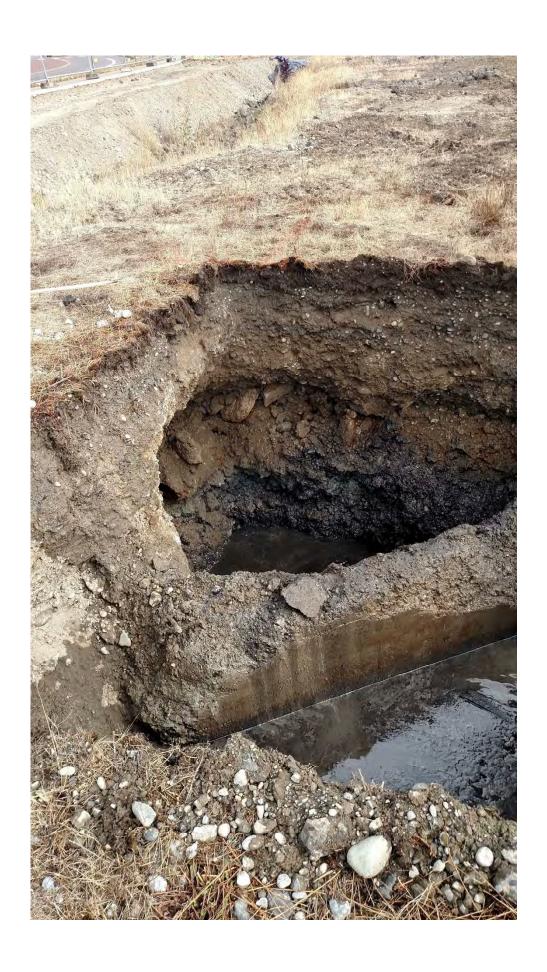
<u>Attached Files:</u> 2017-09-22 08.48.11.jpg, 2017-09-22 09.06.32.jpg, 2017-09-22 09.06.39.jpg, 2017-09-22 09.16.09.jpg, 2017-09-22 10.53.34.jpg

**Comment** By: Tyson Carpenter

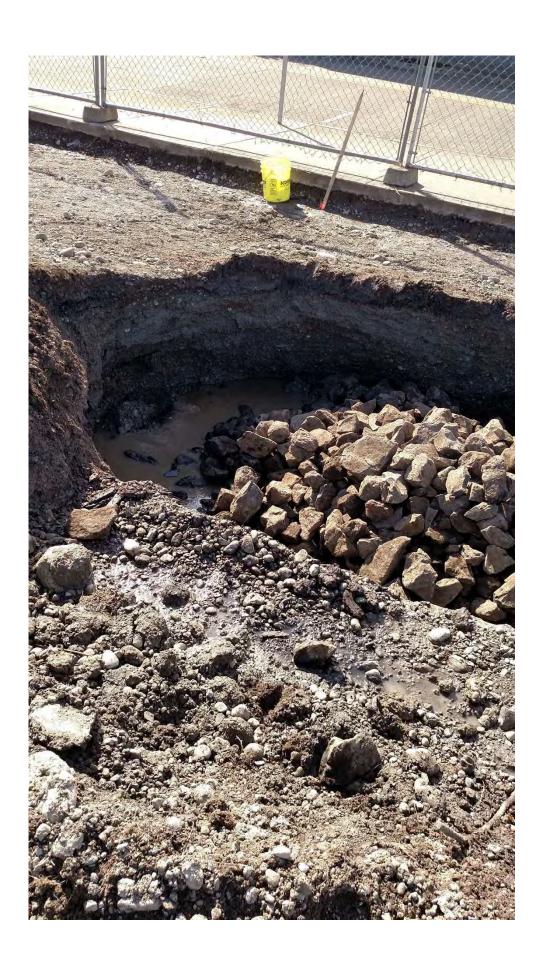
10.05.2017 10:08am CC





















# **Port Inspector's Daily Journal: 14**

**Subject:** 09/25/2017

Author: Tyson Carpenter

**Date Created:** 09.26.2017 12:01pm

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.25.2017

Avg. Temp.

Fereinheight: 65.00

Weather: Scattered Showers
Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am with a safety meeting. There were light scattered

showers throughout the day, but nothing significant enough to affect work progress. Levi was on site to perform dust monitoring and take samples from the

third (MW24S) excavation.

Crews worked on placing geotextile fabric beginning at the construction entrance to Jefferson St and moving south and east and placing an initial layer of gravel cover to hold down the fabric. I inspected the fabric and it is being

placed and overlapped properly.

At about 12:30 they started pumping down the third excavation using a 3 inch trash pump. Levi was able to take samples from all four sides and the bottom. I discussed the proposed pricing for the additional catch basin and 4-8" quarry spalls for the areas with soft soils. They plan to begin placing the quarry spalls

tomorrow.

Working Day 17.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

SWPP Observations: NO SWPP Protection Issues Observed

Labor on Site

Classification or Name, Text

#### and Hours Worked:

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created 09.26.2017 12:01pm

CC:

**Comment** By: Tyson Carpenter

09.29.2017 07:30am CC

9 documents were attached.

<u>Attached Files:</u> 2017-09-25 11.02.59.jpg, 2017-09-25 13.59.36.jpg, 2017-09-25 15.11.26.jpg, 2017-09-25 15.11.37.jpg, 2017-09-25 15.11.50.jpg, 2017-09-26 07.02.41.jpg, 2017-09-26 07.26.04.jpg, 2017-09-26 07.26.18.jpg, 2017-09-26 07.26.21.jpg

**Comment** By: Tyson Carpenter

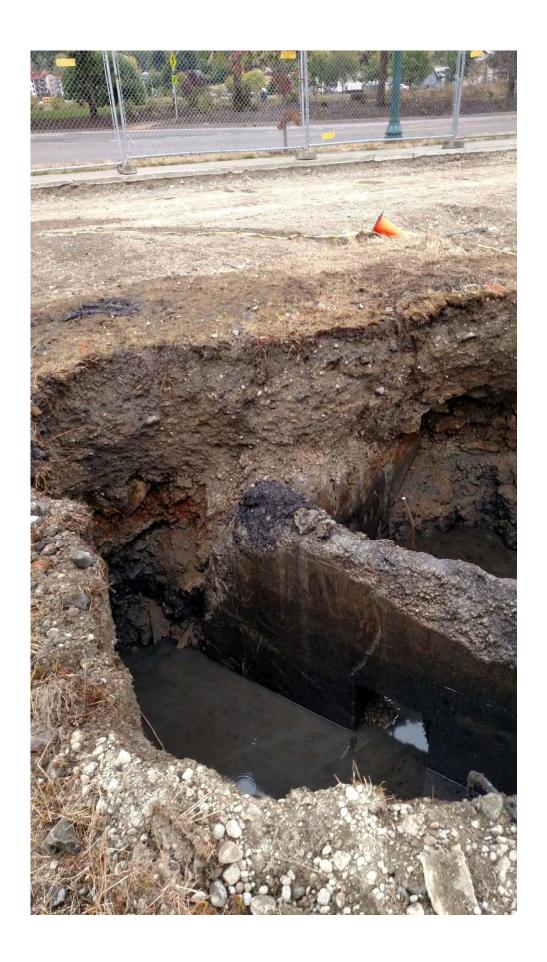
09.29.2017 07:31am CC:





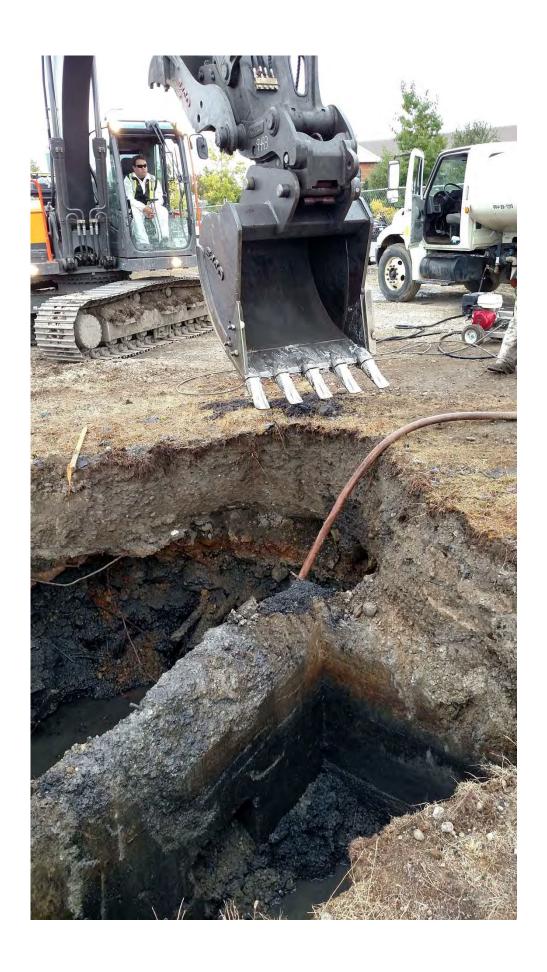
















# **Port Inspector's Daily Journal: 15**

**Subject:** 09/26/2017

Author: Tyson Carpenter

**Date Created:** 09.28.2017 07:28am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.26.2017

Avg. Temp.

Fereinheight: 70.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am. Contractor worked on placing quarry spalls in the

areas with soft soil, more geotextile and gravel cover, and general cleanup. Levi was onsite in the morning to set up the dust monitoring. By noon they the total for quarry spalls was approximately 566 tons, 89 of which were hauled in last week when the quarry spalls were put in the bottom of the trenches. By 2:00 about 208 more tons of quarry spalls had been hauled in. It wasn't quite enough,

so they hauled in a 3 or 4 more truck and pup loads.

Several loads of gravel cover material were hauled in and more geotextile fabric

was placed.

Heather came by just before 3:00 to retrieve the dust monitors.

Working Day 18.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created 09.28.2017 07:28am

CC:

**Comment** By: Tyson Carpenter

09.29.2017 07:27am CC:

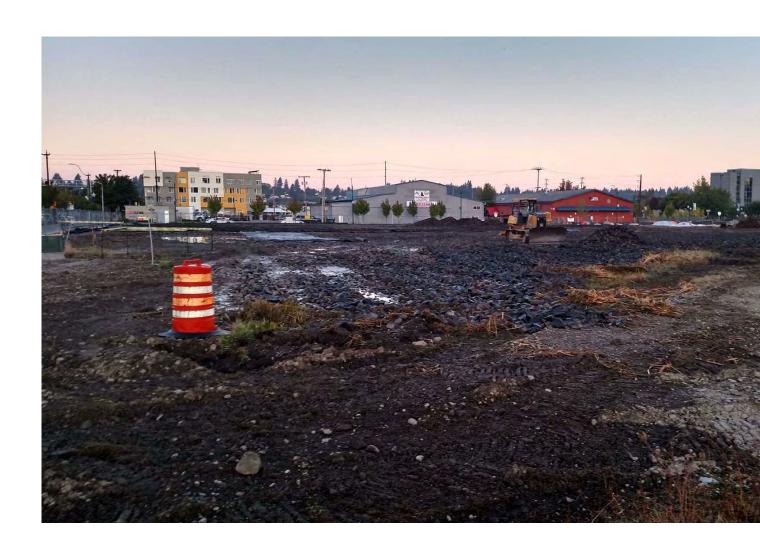
3 documents were attached.

Attached Files: 2017-09-26 10.11.31.jpg, 2017-09-27 07.11.10.jpg, 2017-09-27 07.11.26.jpg

**Comment** By: Tyson Carpenter

CC:

09.29.2017 07:28am









# **Port Inspector's Daily Journal: 16**

**Subject:** 09/27/2017

Author: Tyson Carpenter

**Date Created:** 09.28.2017 07:46am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.27.2017

Avg. Temp.

Fereinheight: 75.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 with a safety meeting. Today they plan to focus on

installing the 12" storm pipe and CB#3. The weekly project meeting was held at

9:00 am.

They were able to get the pipe installed from CB#1 to CB#2. Pipe bedding was

placed below and above the pipe as well as detectable warning tape.

Connections to the CBs were by sand collar and were sealed with grout prior to

backfilling. No major obstructions were encountered during trenching.

A sample of the water in the frac tank from dewatering was taken and submitted

to the lab for analysis.

Surveyors were on site doing the pre-cover survey.

Working Day 19.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

#### Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created

09.28.2017 07:46am

CC:

**Comment** By: Tyson Carpenter

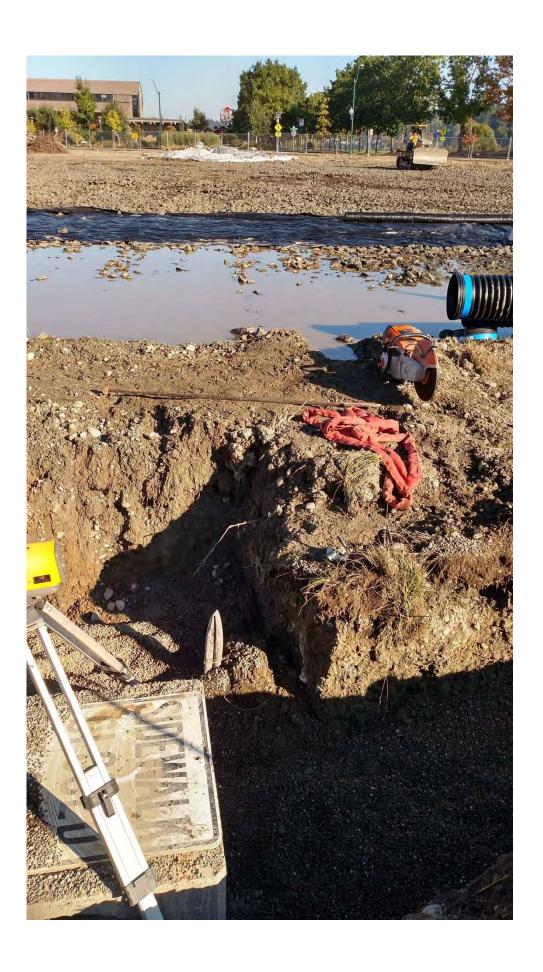
09.29.2017 07:32am CO

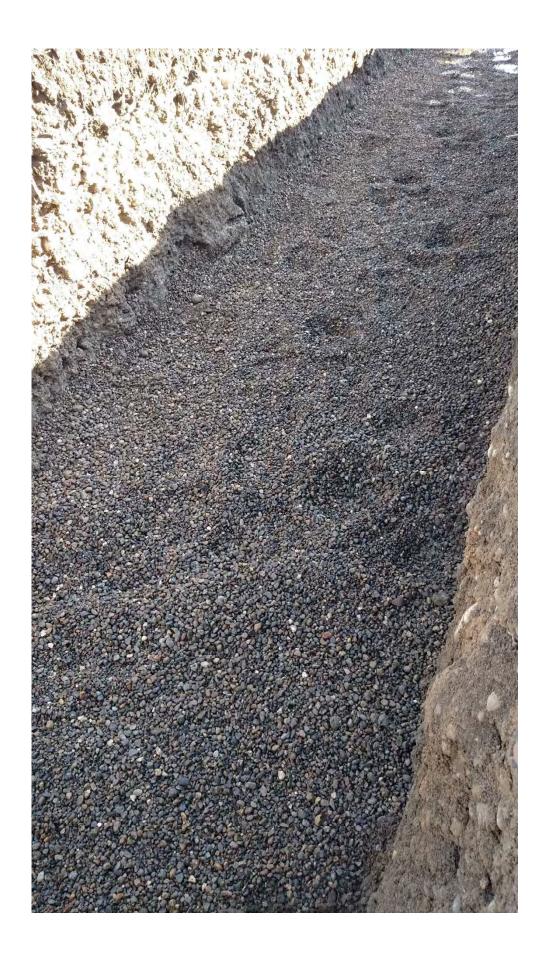
2 documents were attached.

Attached Files: 2017-09-27 09.42.44.jpg, 2017-09-27 09.42.50.jpg

**Comment** By: Tyson Carpenter

10.02.2017 04:04pm Co







# **Port Inspector's Daily Journal: 17**

**Subject:** 09/28/2017

Author: Tyson Carpenter

**Date Created:** 09.29.2017 07:50am

INSPECTOR'S DAILY JOURNAL

**Journal Entry For:** 09.28.2017

Avg. Temp.

Fereinheight: 750.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor started at 7:00 with a safety meeting. Today they plan to continue

installing the 12" storm pipe and CB#5.

At known gas line crossing between CB#2 and CB#3, it was discovered that the gas line elevation conflicted with the storm pipe. The contractor was able to dig along the gas line and move it out of the way temporarily. Once the pipe is installed, the gas line will be re-installed a few inches higher so that it crosses above the 12" storm pipe. Gas line depth will still be more than 24" below finished grade.

A large concrete foundation (about 15 feet wide and at least 4 feet deep) was discovered about half way between CB#2 and CB#3. It will need to be removed from the trench. IOEI was able to locate an available excavator with a rock hammer for the removal from Tyler Rental that can be delivered either Friday or Monday. Equipment rental costs is about \$2,000 per day and about \$6,000 per week.

Given the foundation obstruction, the crew moved on to installing CB#5 and the 12" storm pipe between CB#3 and CB#5.

Working Day 20.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

SWPP Observations: NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Subcontractors on Site

OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported **Attached Files:** 2017-09-28 09.39.00.jpg

2017-09-28 09.44.44.jpg

Form Created

09.29.2017 07:50am

CC:

**Comment** By: Tyson Carpenter

10.02.2017 04:02pm CC

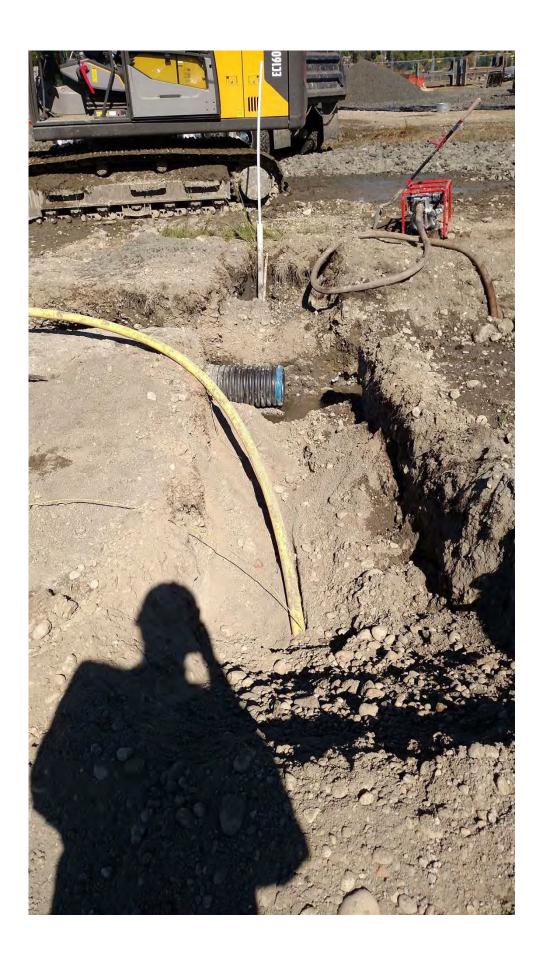
2 documents were attached.

Attached Files: 2017-09-28 12.36.19.jpg, 2017-09-28 12.38.07.jpg

**Comment** By: Tyson Carpenter

10.02.2017 04:04pm CC











# **Port Inspector's Daily Journal: 18**

**Subject:** 09/29/2017

Author: Tyson Carpenter

**Date Created:** 09.29.2017 07:53am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 09.29.2017

Avg. Temp.

Fereinheight: 60.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor started at 7:00 am with a safety meeting. Crews plan to continue

installing the storm pipe and gravel cover.

The Hitachi 245LC Excavator with a rock hammer attachment arrived after 9:30 am and was unloaded. At about 9:50 am they went to work on removing the concrete that was obstructing the 12" storm pipe trench. By about 2:00 pm they had finished removing the concrete and rebar from the trench. Plastic was placed on the fence along State Ave to prevent pieces from leaving the job site while breaking up the concrete. During the removal, on person used the hose on the water truck for dust control. Another operator in the Volvo 160 worked on the removal intermittently to help remove the broken up concrete and rebar from the trench.

12" gravel cover material was hauled in and stockpiled most of the day.

I left the jobsite at about 2:45 pm to go the the office. At 3:38 I received a call from Tiffani King at the City of Olympia stating that some of the fence was down. I went to the jobsite and found two IOEI workers working on standing the fence back up along Jefferson St. between the construction entrance and Olympia Ave. After it was all up, they worked on better securing the panels and placed the loader bucket and loader so that they would prevent the fence from tipping over again.

Working Day 21.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

SWPP Observations: NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Hitachi 245LC Excavator with Rock Hammer attachment

Subcontractors on Site

OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS. Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created 09.29.2017 07:53am

CC:

**Comment** By: Tyson Carpenter

10.02.2017 04:01pm CC

4 documents were attached.

<u>Attached Files:</u> 2017-09-28 09.39.00.jpg (Removed), 2017-09-28 09.44.44.jpg (Removed), 2017-09-28 12.36.19.jpg (Removed), 2017-09-28 12.38.07.jpg (Removed)

**Comment** By: Tyson Carpenter

10.02.2017 04:04pm CC

4 documents were attached.

Attached Files: 2017-09-29 09.50.36.jpg, 2017-09-29 12.01.59.jpg, 2017-09-29 12.02.05.jpg, 2017-09-29 12.03.07.jpg

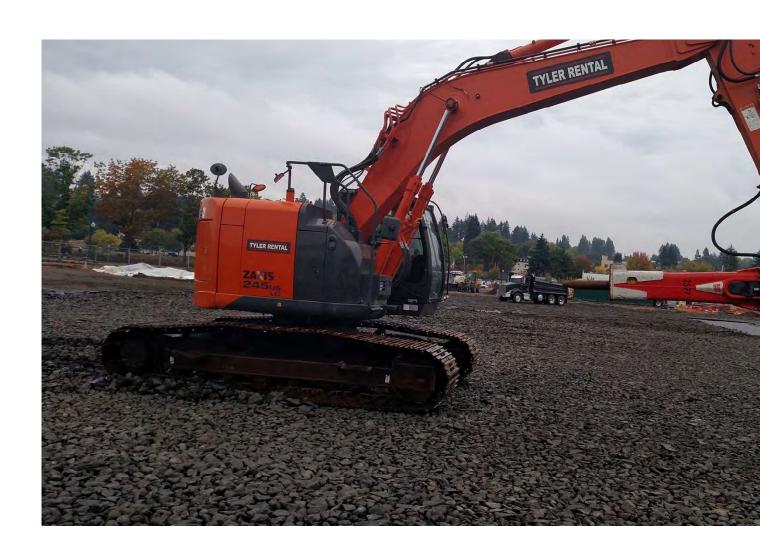
**By:** Tyson Carpenter cc: Comment

10.05.2017 10:08am











## **Port Inspector's Daily Journal: 19**

**Subject:** 10/02/2017

Author: Tyson Carpenter

**Date Created:** 10.02.2017 04:31pm

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.02.2017

Avg. Temp.

Fereinheight: 60.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am with a safety meeting. Crews continued work on

the storm pipe, geotextile fabric, and gravel cover. The 6" perforated pipes were

installed at CB#1. Gravel for the cover was imported all day.

A special Port Commission meeting to tour the site and answer questions was held between 8:30 and about 9:50 am. Port staff present included Rachael

Jamison, Bill Helbig, Tyson Carpenter and Barb Tope. All three Port

Commissioners attended along with about 11 members of the public. The tour

was held on the sidewalk outside the site fence.

Heather was onsite for dust monitoring in the morning and afternoon.

Working Day 22.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name.

and Hours Worked: Text

Record Materials Delivered to Site and Used

#### Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: Volvo EC160EL Excavator

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Hitachi 245LC Excavator with Rock Hammer attachment

Subcontractors on Site

OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created

10.02.2017 04:31pm

CC:

**Comment** By: Tyson Carpenter

10.02.2017 04:32pm CC

2 documents were attached.

Attached Files: 2017-10-02 10.23.18.jpg, 2017-10-02 10.23.21.jpg

**Comment** By: Tyson Carpenter

10.12.2017 11:32am CC







# Port Inspector's Daily Journal: 20

**Subject:** 10/03/2017

Author: Tyson Carpenter

**Date Created:** 10.05.2017 10:24am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.03.2017

Avg. Temp.

Fereinheight: 60.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am. A safety meeting was held. Crews worked on

installing the 6" perforated pipe at CB#1 and finishing up the CB risers, frames and grates for CB#1 and CB#2. Geotextile fabric and gravel cover were installed all day. The gravel supplier switched sources for the permeable ballast to their pit off of Littlerock road. It is a WSDOT approved source. They provided test results showing that the material meets the specifications. IOEI will provide the

information as a submittal.

Potholing to locate utilities for both storm pipe connections to the street were performed. There are several crossings and potential conflicts at the Chestnut St connection. In order to fit the pipe between the crossings of sewer, gas and communications, I directed them to change the storm pipe to 8" PVC and adjust

the grades slightly as needed. Change order to follow.

The connection at Jefferson St may require some slight grade adjustments of

the storm pipe, but should otherwise work.

Working Day 23.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

SWPP Observations: NO SWPP Protection Issues Observed

Labor on Site

Classification or Name, Text

#### and Hours Worked:

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump

Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Hitachi 245LC Excavator with Rock Hammer attachment

Subcontractors on Site

#### OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

**Attached Files:** 2017-10-03 13.04.01.jpg

2017-10-03 13.13.44.jpg 2017-10-04 08.17.02.jpg 2017-10-04 08.17.09.jpg

Form Created 10.05.2017 10:24am

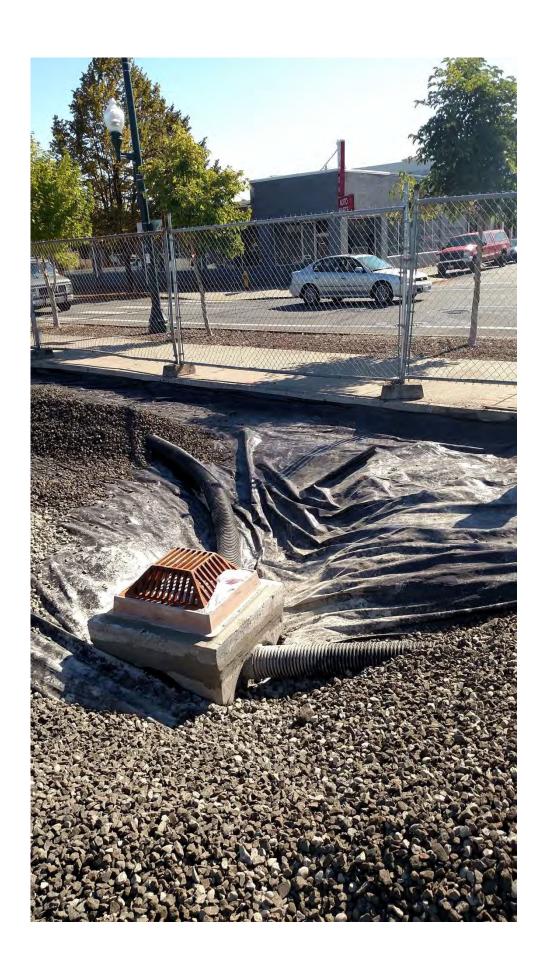
CC:

**Comment** By: Tyson Carpenter

10.12.2017 11:32am C











## **Port Inspector's Daily Journal: 21**

**Subject:** 10/04/2017

Author: Tyson Carpenter

**Date Created:** 10.05.2017 10:33am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.04.2017

Avg. Temp.

Fereinheight: 65.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am with a safety meeting. Crews worked primarily on

installing the storm pipe connection to Chestnut St. The existing catch basins at Chestnut and Jefferson St were cored for the connections to the live City stormwater system. Temporary shoring was used when trench conditions required it. The connection at Chestnut was completed and backfilled before the end of the day. The trench at Jefferson St was covered with a plate and fenced for protection. Sidewalk are being closed as necessary to protect pedestrians.

Levi and Heather were on site most of the day to sample the select excavation stockpiles for characterization for reuse and/or disposal. The overburden stockpile for the MW24S location contained a lot of material that is not suitable

for reuse, so it was combined with the other stockpile for disposal

characterization.

Working Day 24.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

#### Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Hitachi 245LC Excavator with Rock Hammer attachment

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

**Attached Files:** 2017-10-04 08.17.38.jpg

2017-10-04 15.02.50.jpg 2017-10-04 15.02.58.jpg

Form Created

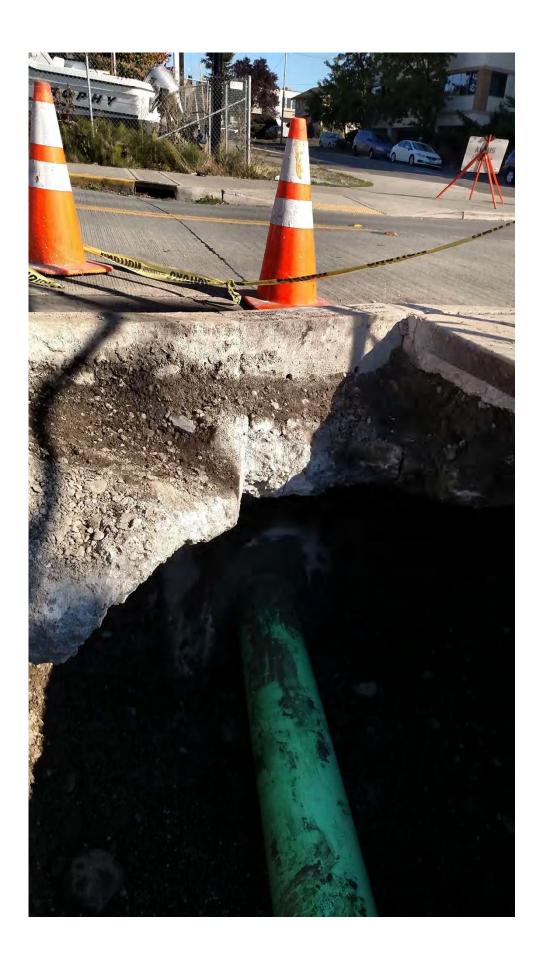
10.05.2017 10:33am

CC:

**Comment** By: Tyson Carpenter

10.12.2017 11:32am C









## **Port Inspector's Daily Journal: 22**

**Subject:** 10/05/2017

Author: Tyson Carpenter

**Date Created:** 10.05.2017 10:51am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.05.2017

Avg. Temp.

Fereinheight: 64.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am with a safety meeting. Contractor worked on

connecting the storm pipe at Jefferson St and installing the perforated pipe at CB 4. The excavations were backfilled with 90.58 tons of quarry spalls up to the groundwater level to prevent settling. Asphalt and concrete were removed from

Parcels 2/3.

Working Day 25.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe

Heavy Flatbed Trailer
John Deere 650K Dozer
2 inch trash pump for wheel wash
3 inch trash pump for dewatering
Hitachi 245LC Excavator with Rock Hammer attachment

Subcontractors on Site

#### OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

CC:

Form Created 10.05.2017 10:51am

**Comment** By: Tyson Carpenter

10.12.2017 11:26am CC

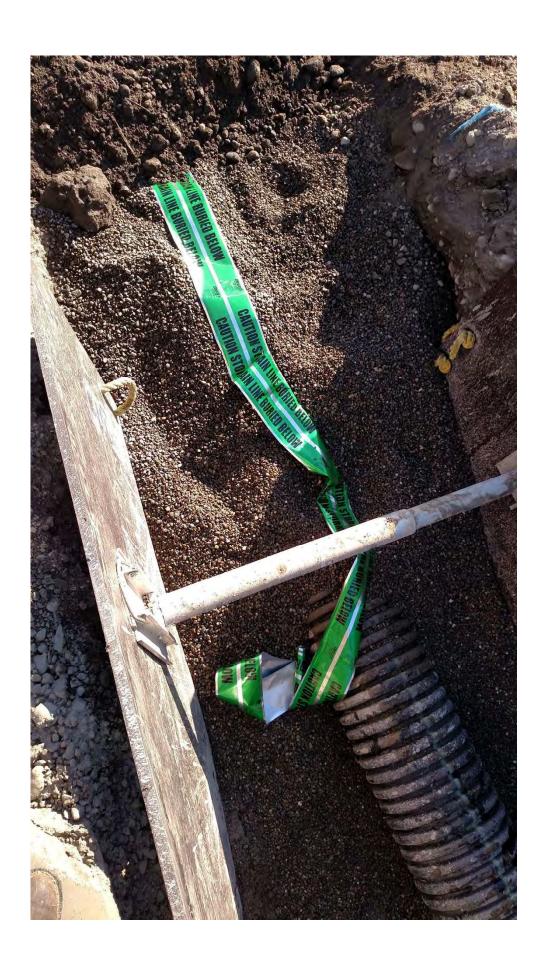
3 documents were attached.

Attached Files: 2017-10-05 11.11.03.jpg, 2017-10-05 11.11.14.jpg, 2017-10-05 11.17.19.jpg

**Comment** By: Tyson Carpenter

10.12.2017 11:31am C









## **Port Inspector's Daily Journal: 23**

**Subject:** 10/06/2017

Author: Tyson Carpenter

**Date Created:** 10.06.2017 11:10am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.06.2017

Avg. Temp.

Fereinheight: 60.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started with a safety meeting at 7:00. Crews are working on finishing

CB riser, frame and grate installation, installing the 6" perforated pipe at CB#4,

geotextile fabric, and gravel cover on Parcel 2/3.

Working Day 26.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe
Heavy Flatbed Trailer
John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering Hitachi 245LC Excavator with Rock Hammer attachment (off rent, waiting mobilization)

Subcontractors on Site

#### OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created 10.06.2017 11:10am

CC:

**Comment** By: Tyson Carpenter

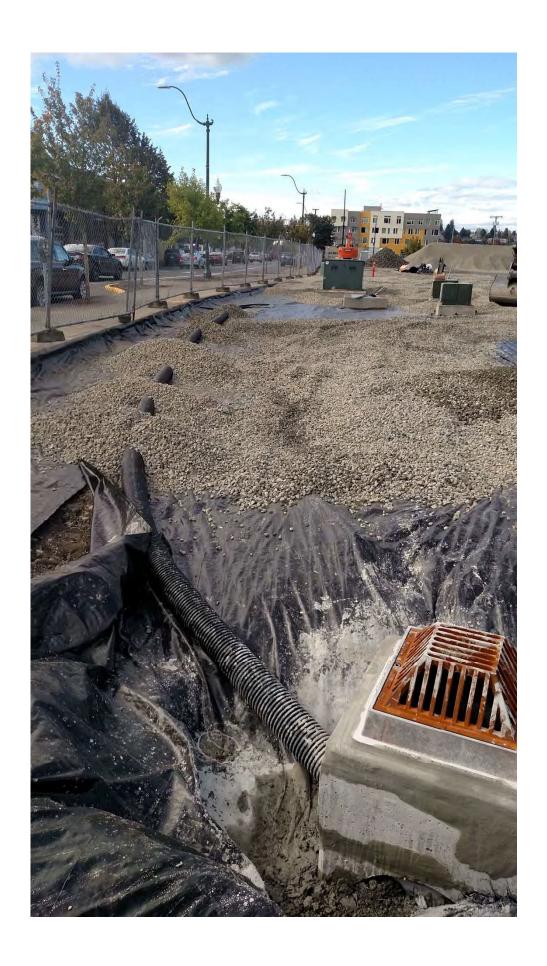
10.12.2017 11:25am CC

5 documents were attached.

<u>Attached Files:</u> 2017-10-06 08.15.15.jpg, 2017-10-06 08.15.23.jpg, 2017-10-06 09.17.11.jpg, 2017-10-06 09.31.58.jpg, 2017-10-06 13.08.14.jpg

**Comment** By: Tyson Carpenter

10.12.2017 11:26am C













## **Port Inspector's Daily Journal: 24**

**Subject:** 10/09/2017

Author: Tyson Carpenter

**Date Created:** 10.12.2017 11:25am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.09.2017

Avg. Temp.

Fereinheight: 50.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am. A daily safety and planning meeting was held.

Temporary fence was delivered and installed for Lot 1. Contractor is maintaining full coverage and appropriate overlap of geotextile fabric. Focus today was mostly on Parcel 2/3 gravel cover. At the end of the day they started preparing

to begin work on Lot 1.

Working Day 27.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

**SWPP Observations:** A CSWPPP inspection was performed by the contractor.

Labor on Site

**Hours Used:** 

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and

John Deere 544K Front End Loader

Single Axle water truck
Truck - End Dump

Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe
Heavy Flatbed Trailer
John Deere 650K Dozer
2 inch trash pump for wheel wash
3 inch trash pump for dewatering
Hitachi 245LC Excavator with Rock Hammer attachment (off rent, awaiting mobilization)

Subcontractors on Site

#### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

CC:

**Attached Files:** 2017-10-09 07.37.25.jpg

2017-10-09 07.37.30.jpg 2017-10-09 13.36.54.jpg

Form Created

10.12.2017 11:25am

**Comment** By: Tyson Carpenter

10.18.2017 02:22pm C









# **Port Inspector's Daily Journal: 25**

**Subject:** 10/10/2017

Author: Tyson Carpenter

**Date Created:** 10.12.2017 11:37am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.10.2017

Avg. Temp.

Fereinheight: 52.00
Weather: Sunny

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am with a safety meeting. Construction entrance was

installed at Lot 1 and they began clearing, grading, removing the existing CB and plugging the pipe, and placing the fabric and gravel cover. By the end of the day it wall all cleared, graded and about 1/4 of the gravel cover was installed.

Working Day 28.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

SWPP Observations: NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck
Truck - End Dump

Biokup Foreman

Pickup - Foreman 2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer 2 inch trash pump for wheel wash 3 inch trash pump for dewatering Hitachi 245LC Excavator with Rock Hammer attachment (off rent, awaiting mobilization)

Subcontractors on Site

#### OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created 10.12.2017 11:37am

CC:

**Comment** By: Tyson Carpenter

10.12.2017 11:43am CC

3 documents were attached.

Attached Files: 2017-10-10 10.34.18.jpg, 2017-10-10 13.35.39.jpg, 2017-10-10 15.06.37.jpg

**Comment** By: Tyson Carpenter

10.18.2017 02:22pm









# Port Inspector's Daily Journal: 26

**Subject:** 10/11/2017

Author: Tyson Carpenter

**Date Created:** 10.12.2017 11:44am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.11.2017

Avg. Temp.

Fereinheight: 55.00

Weather: Scattered Showers
Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am focusing mainly on gravel cover for Lot 1. A

weekly project meeting was held at 9:00 am. The stockpile of gravel was getting low, so they started importing more again. By the end of the day, all of the area was covered with fabric and most of the required 12 inches of gravel. They also started working on Parcels 6/7 by installing the construction entrance, moving the fence out and some clearing and removal of existing asphalt. Dust has not

been visible or an issue, likely due to moisture from recent rain.

There were some scattered, light rain showers, but not enough to impact the

work.

Working Day 29.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

**List Equipment Type,** John Deere 544K Front End Loader

Make and Model and Single Axle water truck

Hours Used: Truck - End Dump

Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash 3 inch trash pump for dewatering

Water Buffalo trailer to supply construction entrance at Lot 1

Subcontractors on Site

#### OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported **Attached Files:** 2017-10-11 08.31.25.jpg

2017-10-11 08.31.52.jpg

Form Created

10.12.2017 11:44am

CC:

**Comment** By: Tyson Carpenter

10.18.2017 02:22pm







# **Port Inspector's Daily Journal: 27**

**Subject:** 10/12/2017

Author: Tyson Carpenter

**Date Created:** 10.12.2017 11:49am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.12.2017

Avg. Temp.

Fereinheight: 47.00
Weather: Rain

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am. Weather started off with light rains, so Contractor

plans to stick to avoid activities that could worsen conditions such as grading and asphalt removal on Parcel 6/7. Instead, they will continue working on finishing up the placement of gravel cover on Lot 1 and other work that they can

do without getting in the mud.

Working Day 30.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck
Truck - End Dump
Dickup Foreman

Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer 2 inch trash pump for wheel wash

Subcontractors on Site

OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

CC:

Form Created

10.12.2017 11:49am

**Comment** By: Tyson Carpenter

10.12.2017 11:49am CC

2 documents were attached.

Attached Files: 2017-10-12 10.57.56.jpg, 2017-10-12 11.05.54.jpg

**Comment** By: Tyson Carpenter

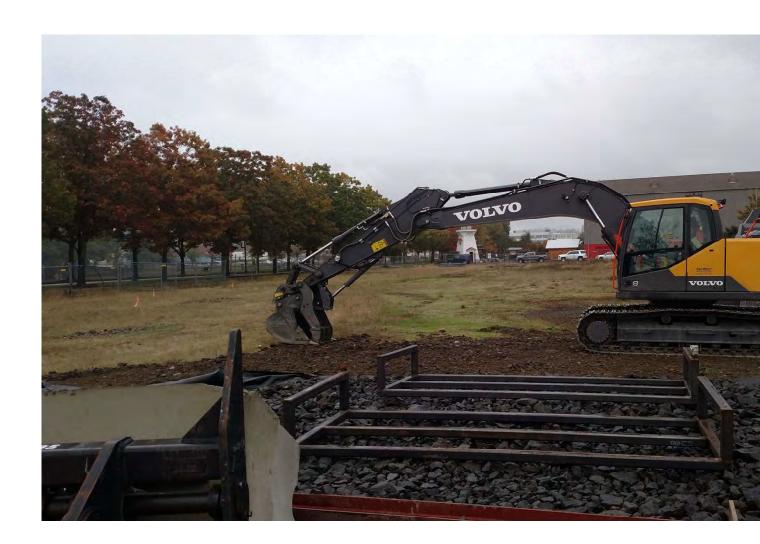
10.18.2017 02:20pm CC

3 documents were attached.

Attached Files: 2017-10-12 12.55.55.jpg, 2017-10-12 12.56.10.jpg, 2017-10-12 12.56.13.jpg

**Comment** By: Tyson Carpenter

10.18.2017 02:22pm C













# **Port Inspector's Daily Journal: 28**

**Subject:** 10/13/2017

Author: Tyson Carpenter

**Date Created:** 10.13.2017 03:13pm

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.13.2017

Avg. Temp.

Fereinheight: 50.00

Weather: Scattered Showers
Wind Conditions: Normal (0-20 mph)

General Notes: Contractor started with a safety meeting at 7:00 am. They worked most of the

day on Parcels 6/7 doing clearing, removal of asphalt and the catch basin, and grading. The pipes leading into the CB dead ended not far from the CB, so they were removed rather than plugging the pipes. By the end of the day they were able to get all of the asphalt removed and most of the grading done. They spent a little time at the end of the day making sure that the sites were prepared for

any storm events that may occur over the weekend.

Working Day 31.

Comments regarding safety related observations, for both good and bad practices.

SAFETY Observation to

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer 2 inch trash pump for wheel wash Water buffalo trailer for wheel wash

Subcontractors on Site

### OTHER WORK

Provide description ( to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

CC:

Form Created 10.13.2017 03:13pm

**Comment** By: Tyson Carpenter

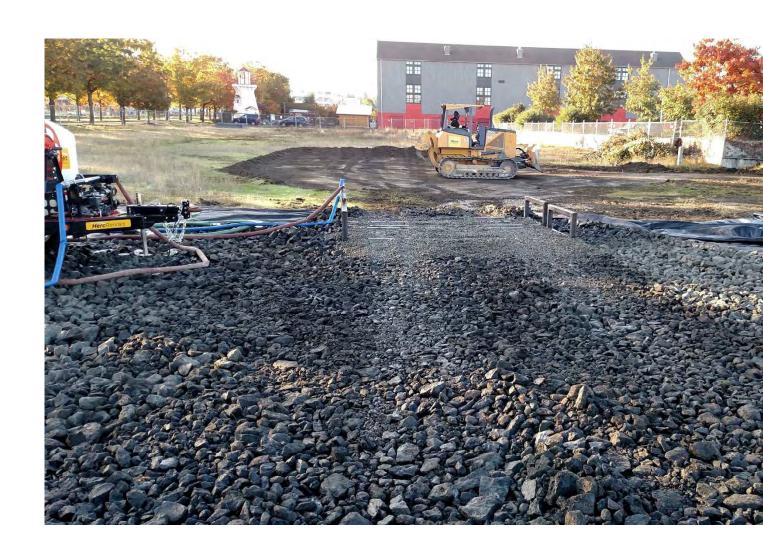
10.18.2017 02:21pm CC

2 documents were attached.

Attached Files: 2017-10-13 08.48.20.jpg, 2017-10-13 08.48.23.jpg

**Comment** By: Tyson Carpenter

10.18.2017 02:21pm C







# **Port Inspector's Daily Journal: 29**

**Subject:** 10/16/2017

Author: Tyson Carpenter

**Date Created:** 10.17.2017 08:06am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.16.2017

Avg. Temp.

Fereinheight: 50.00

Weather: Partly Cloudy

Wind Conditions: Normal (0-20 mph)

**General Notes:** Contractor started at 7:00 am with a safety meeting. They focused mostly on

finishing up grading and placing the geotextile fabric and gravel cover on Parcels 6/7. Grading looked good and was consistent with the plans. Placement of the fabric continues to be done properly with good overlap and it is being spread evenly and tight. The cover is being placed starting at the construction entrance on the north end on Jefferson St and working south and west. This allows them to stay on the imported gravel with equipment which eliminates the potential from cross contamination between the existing soils and the imported gravel cover. It will also allow them to keep working on the gravel cover during

rainy weather which is forecasted for the next few days.

They also hauled off asphalt from Parcels 6/7 that was stockpiled last week.

Working Day 32.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash Water buffalo trailer for wheel wash

Subcontractors on Site

### OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

**Delays:** None observed or reported

Form Created

10.17.2017 08:06am

CC:

**Comment** By: Tyson Carpenter

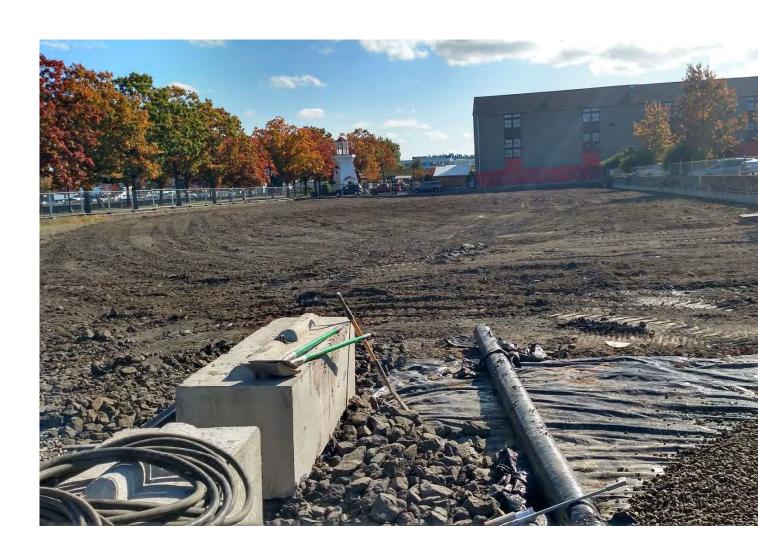
10.18.2017 02:23pm CC

2 documents were attached.

Attached Files: 2017-10-16 14.26.25.jpg, 2017-10-16 14.26.32.jpg

**Comment** By: Tyson Carpenter

10.27.2017 09:39am







# **Port Inspector's Daily Journal: 30**

**Subject:** 10/17/2017

Author: Tyson Carpenter

**Date Created:** 10.17.2017 08:08am

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.17.2017

Avg. Temp.

Fereinheight: 50.00
Weather: Rain

Wind Conditions: Normal (0-20 mph)

General Notes: Contractor started with a safety meeting at 7:00 am. They continued working on

installing the geotextile fabric and gravel cover on Parcels 6/7.

Working Day 33.

Comments regarding safety related observations, for both good and bad practices.

**SAFETY Observation to** 

Report: NONE

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used: John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump Pickup - Foreman

2 Baker Tanks, 1 Frac Tank

Case 580L Backhoe Heavy Flatbed Trailer John Deere 650K Dozer

2 inch trash pump for wheel wash Water buffalo trailer for wheel wash

Subcontractors on Site

OTHER WORK

Provide description (to include drawings, details, and specifications), date recognized, date design professional notified, and date proper instructions were given to the contractor.

Conflicts/Descrepencies: None to report

Provide full information, including dates and times of any delays caused by WEATHER, STRIKES, STOP ORDERS, Or Other ISSUES that have affected PROGRESS.

None observed or reported Delays:

CC:

Form Created

10.17.2017 08:08am

By: Tyson Carpenter Comment

10.18.2017 02:26pm

5 documents were attached.

Attached Files: 2017-10-17 08.22.37.jpg, 2017-10-17 08.22.48.jpg, 2017-10-17 11.49.10.jpg, 2017-10-17 11.51.36.jpg,

2017-10-17 16.48.01.jpg

Comment By: Tyson Carpenter

10.27.2017 09:39am













# **Port Inspector's Daily Journal: 31**

10/18/2017 Subject:

Author: **Tyson Carpenter** 

**Date Created:** 10.18.2017 02:19pm

INSPECTOR'S DAILY JOURNAL

Journal Entry For: 10.18.2017

Avg. Temp.

Fereinheight: 50.00 Weather: Rain

Wind Conditions: Above Normal (20 - 35 mph)

**General Notes:** Contractor started with a safety meeting at 7:00 am. Contractor focused on

stockpiling gravel cover and placing the geotextile fabric and gravel cover on

Parcels 6/7. Stormwater BMPs are holding up to the rain. Additional

preventative measures were taken to ensure that the wind and rain do not cause

issues.

A weekly project meeting was held at 9:00 am. Rachael, Barb, Chris, Levi, Tony

and I attended the meeting.

Working Day 34.

Comments regarding safety related observations, for both good and bad practices.

SAFETY Observation to

NONE Report:

Comments related to environmental protection issues revealed upon site observations pertinent to SWPPP.

**SWPP Observations:** NO SWPP Protection Issues Observed

Labor on Site

Classification or Name,

and Hours Worked: Text

Record Materials Delivered to Site and Used

Record Equipment on Site

List Equipment Type, Make and Model and Hours Used:

John Deere 544K Front End Loader

Single Axle water truck Truck - End Dump

Pickup - Foreman