SOMA
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December 1, 2015

Mr. Martin Musonge
Regional Water Quality Control Board
San Francisco Bay Region
1515 Clay Street, Suite 1400
Oakland, California 94612

Subject: **File No. 01-0098 (MYM)**
Site Located at 2844 Mountain Boulevard, Oakland, California

Dear Mr. Musonge:

Enclosed for your review is SOMA's "Additional Remedial Investigation Workplan" for the subject property. It has been uploaded to the State's GeoTracker database and Alameda County's FTP site.

Thank you for your time in reviewing our report. Please do not hesitate to call me at (925) 734-6400, if you have any questions or comments.

Sincerely,

Mansour Sepehr, Ph.D., PE
Principal Hydrogeologist

cc: Mr. Tejindar Singh w/enclosure
Ms Dilan Roe – Alameda County Env. Health

Additional Remedial Investigation Workplan

2844 Mountain Boulevard
Oakland, California

December 1, 2015

Project 5080
RB File No. 01-0098

Prepared for:

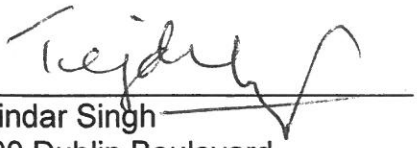
Mr. Tejindar P. Singh
6400 Dublin Blvd.
Dublin, California

SOMA ENVIRONMENTAL ENGINEERING, INC.
6620 Owens Drive Suite A Pleasanton CA 94588 Ph: 925.734.6400 F: 925.734-6401 www.somaenv.com

PERJURY STATEMENT

Site Location: 2844 Mountain Boulevard, Oakland, California

"I declare under penalty of perjury, that the information and/or recommendations contained in the attached document or report is true and correct to the best of my knowledge".



Tejindar Singh
6400 Dublin Boulevard
Dublin, California 94568
Responsible Party

CERTIFICATION

SOMA Environmental Engineering, Inc. has prepared this report on behalf of Mr. Tejindar P. Singh for the site located at 2844 Mountain Blvd., Oakland, California. The report was prepared in accordance with San Francisco Bay Regional Water Quality Control Board correspondence dated October 12, 2015.

Mansour Sepehr, PhD, PE
Principal Hydrogeologist

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1. INTRODUCTION

SOMA Environmental Engineering, Inc. has prepared this workplan on behalf of Mr. Tejindar P. Singh for the site located at 2844 Mountain Blvd., Oakland, California. This workplan was prepared in accordance with San Francisco Bay Regional Water Quality Control Board (SFBRWQCB) correspondence dated October 12, 2015 for delineation of vertical and horizontal extent of MtBE and TBA contamination at the site.

The subject property is located in Alameda County, California. Figure 1 shows the location of the site and vicinity. The site is located on the eastern corner of the intersection of Mountain Boulevard and Werner Court in a commercial/residential area (Figure 2). The Warren Freeway (freeway) is adjacent to Mountain Boulevard, and lies approximately 50 feet southwest of the site. Site history is summarized in Appendix A.

2. SCOPE OF WORK

Historical site data indicates that elevated levels of MtBE and TBA was detected in soil and groundwater samples (First Water Bearing Zone) collected at depth ranging up to 48 feet bgs (see Tables 1 and 2). The results of the Third Quarter 2015 groundwater monitoring event also showed elevated levels of MtBE and TBA in the shallow perched zone (Table 3).

The results of the historical site investigation have shown elevated levels of MtBE in off-site area in DPT-4 and DPT-3 in shallow and especially in the deeper water bearing zone. Since these investigations, SOMA has conducted several remedial efforts at the site. At this time, SOMA is proposing to conduct additional site investigation in order to verify the current extent of MtBE and TBA in the subsurface. Once the extent of MtBE and TBA is verified and delineated, SOMA will prepare a work plan to address the remediation of MtBE and TBA.

SOMA proposes to perform the following as part of proposed MPE event:

Task 1: Permit Acquisition, Notifications, and Health and Safety Plan Preparation

Task 2: Advancement of DP Borings

Task 3: Report Preparation

2.1 Permit Acquisition, Notifications, and Health and Safety Plan Preparation

Prior to initiating field activities, SOMA will obtain all required drilling permits from Alameda County Department of Public Works. For the borings to be advanced in the public right-of-way, excavation and/or obstruction permits will be obtained from the City of Oakland. All required notifications will be submitted in advance of the field activities.

SOMA will prepare a site-specific Health and Safety Plan (HASP). The HASP will be prepared according to the Occupational Safety and Health Administration (OSHA), "Hazardous Waste Operation and Emergency Response" guidelines (29 CFR 1910.120) and the California Occupational Safety and Health Administration (Cal/OSHA) "Hazardous Waste Operation and Emergency Response" guidelines (CCR Title 8, section 5192). The HASP is designed to address safety provisions during field activities and protect the field crew from physical and chemical hazards resulting from drilling and sampling. The HASP establishes personnel responsibilities, general safe work practices, field procedures, personal protective equipment standards, decontamination procedures, and emergency action plans. The HASP will be reviewed and signed by field staff and contractors prior to beginning field operations.

SOMA will visit the site and mark boring locations using chalk-based white paint and then contact Underground Service Alert (USA) to verify that drilling areas are clear of underground utilities. Following USA clearance, SOMA will retain a private utility locator to survey proposed drilling areas and locate any additional subsurface conduits.

2.2 Proposed Soil Borings

SOMA proposes to advance one on-site (DPT-6) and three off-site borings (DPT-7, DPT-8, and DPT-9) to delineate the extent of MtBE and TBA contamination. Boring locations are shown on Figure 3. The borings will be hand cleared to 5 feet bgs, and drilled to total depth utilizing Direct Push Technology (DPT).

DPT is an efficient method, proven to be effective at this site, of collecting continuous soil cores while preventing cross-contamination. It involves hydraulically hammering a set of steel rods into the subsurface with the lead section consisting of a polyethylene-lined sampler. The proposed dual tube sampling uses two sets of probe rods to collect continuous soil cores. One set of rods is driven into the ground as an outer casing. These rods receive the driving force from the hammer and provide a sealed hole from which soil samples may be recovered without the threat of cross contamination.

During the drilling operation the soil borings will be cored to the maximum depth of 60 feet bgs, and cored soil will be described in accordance with the Unified Soil Classification System (USCS). In addition, cored soil will be checked for hydrocarbon odors, visual staining, and liquid phase hydrocarbons (free product), and screened using a photoionization detector (PID). PID readings will be noted on boring logs.

Soil samples for laboratory analysis will be collected from areas of elevated PID readings or where substantial staining or discoloration is observed during drilling. In the absence of visible soil contamination, one soil sample will be collected at each soil- groundwater interface. General Field procedures are summarized in Appendix B.

Each soil sample will be collected using a 4-foot-long by 2-inch-diameter sampling rod lined with a sleeve. The sampler will be advanced to the desired depth, the sampling point on the sampler tip disengaged, and the sampler driven 4 feet to fill the liner. The sampler is then retrieved and the liner removed. SOMA will use a handsaw to cut the retrieved plastic liner into small sections for laboratory submittal. The collected sleeves will be covered at both ends with Teflon sheeting, sealed at both ends with polyethylene end caps, labeled, logged on a chain-of-custody form, placed in an ice-filled cooler, and kept at 4^0C for transport to a state-certified laboratory for analysis.

Dual-tube samplers are typically advanced to collect continuous soil cores; however, groundwater samples can be collected at the end of each core run (US EPA, 2005). Depth-discrete groundwater samples will be collected by driving a 4-foot-long Hydropunch tip attached to the end of the inner drive DP rod to the desired depth-discrete interval. The outer drive casing will be retracted, exposing the 4-foot-long screen interval of the Hydropunch tip. Groundwater samples will be collected with a stainless steel bailer lowered through and beneath the outer drive casing into the Hydropunch screen. Prior to downhole collection events and between borings, the Hydropunch and stainless steel bailer will be field decontaminated to avoid cross-contaminating groundwater samples. Depth to the first encountered and stabilized groundwater in each WBZ will be recorded along with the total boring depth at each groundwater sampling interval. Boring logs will be included in SOMA's report.

Each sample will be labeled with a unique sample identifier, date and time of sample collection, recorded on a chain-of-custody form, and placed in a cooled ice chest pending transport to a California state-certified environmental laboratory for analysis.

Following sampling, the borehole will be decommissioned according to Cal/EPA guidelines with a neat-cement grout mixture tremmied through the DPT rods and completed at the surface to match existing grade.

2.3 Laboratory Sample Analysis

Collected soil and groundwater samples will be submitted to a California state-certified environmental laboratory for chemical analysis of the following:

- Total petroleum hydrocarbons as gasoline and diesel (TPH-g and TPH-d)
- BTEX (Benzene, toluene, ethylbenzene, and total xylenes)
- Fuel oxygenates, additives and lead scavengers including MtBE, tertiary-butyl alcohol (TBA), ethyl tertiary-butyl ether (ETBE), diisopropyl ether (DIPE), tertiary-amyl methyl ether (TAME), 1,2-dichloroethane (1,2-DCA), 1,2-dibromomethane (EDB), naphthalene, and ethanol.

Analyses will employ USEPA Methods 8015 and 8260B.

2.4 Waste Disposal

Soil and wastewater generated during boring activities will be temporarily stored on-site in separate DOT-rated, 55-gallon steel drums pending characterization, profiling, and transport to an approved disposal-recycling facility.

3. PROJECTED SCHEDULE AND REPORT PREPARATION

The workplan will be implemented upon receipt of authorization from SFBRWQCB. We anticipate that the proposed work, can be completed in approximately six weeks following receipt of authorization.

Upon completion of all field activities, SOMA will prepare and submit a report documenting description of field activities, results, conclusions and recommendations.

FIGURES

Source: Google (R) 2012

N

approximate scale in feet

0 100 200

Figure 1: Site Vicinity Map

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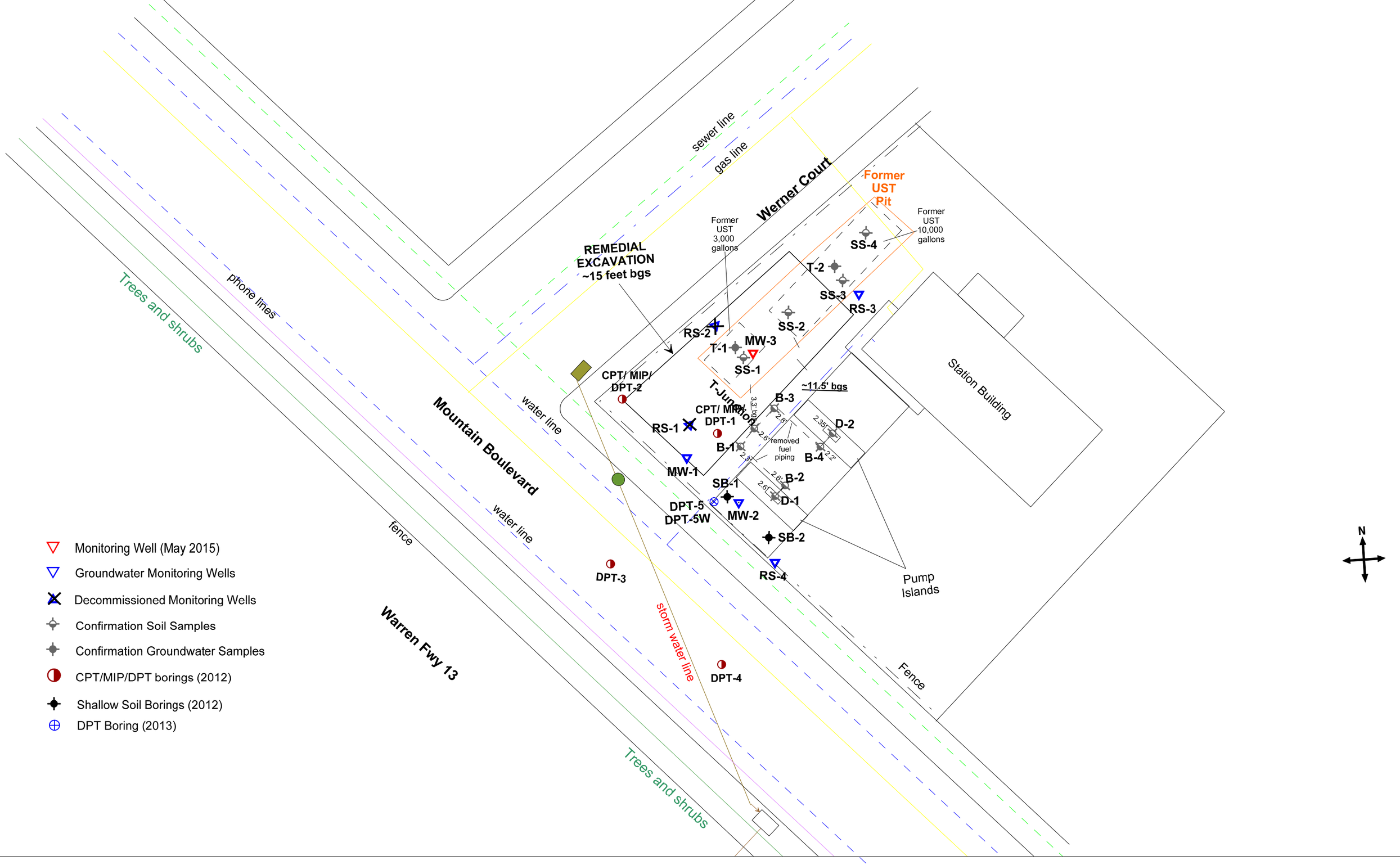

Figure 2: Site Map Showing Locations of Former USTs, Soil Borings, and Groundwater Monitoring Wells

ENVIRONMENTAL ENGINEERING, INC.

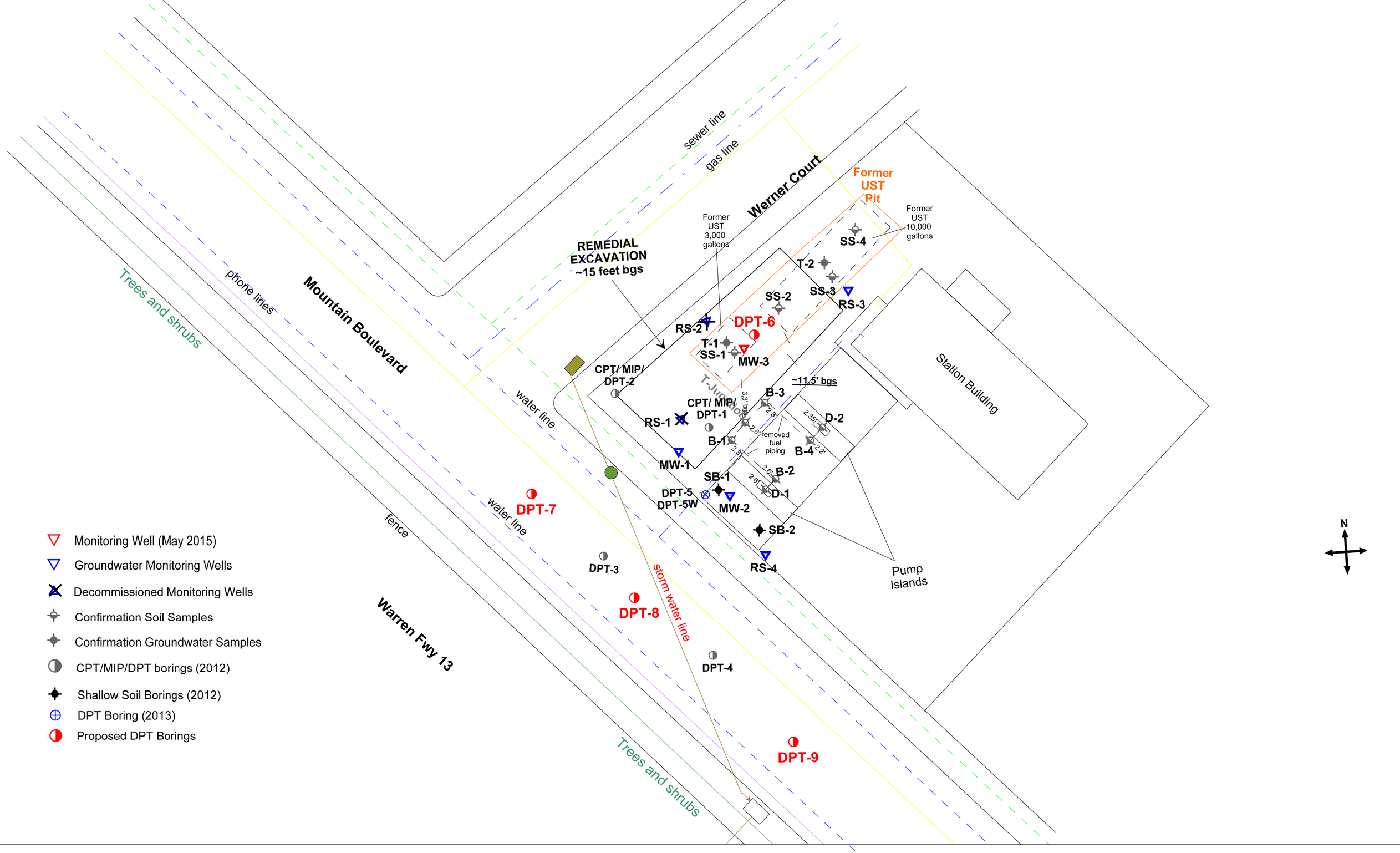

Figure 3: Site Map Showing Proposed Boring Locations

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TABLES

Table 1:
Historical Soil Analytical Data
2844 Mountain Blvd, Oakland, CA

Sample ID	Date	Sample Depth (feet)	TPH-g (mg/kg)	TPH-d (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)	MtBE (mg/kg)	TBA (mg/kg)	TAME (mg/kg)	Methanol(mg/kg)
Sampling Beneath USTs												
~~**SS-1**~~	~~8/9/2011~~	~~11.50~~	~~**2,300**~~	~~**630 Y**~~	~~<2.5~~	~~**15**~~	~~**17**~~	~~**123**~~	~~**3.3**~~	~~<50~~	~~<2.5~~	~~1.5 C~~
~~**SS-2**~~	~~8/9/2011~~	~~11.50~~	~~**690 Y**~~	~~**800**~~	~~<2.0~~	~~<2.0~~	~~<2.0~~	~~<2.0~~	~~<2.0~~	~~<40~~	~~<2.0~~	~~<1.0~~
SS-3	8/9/2011	11.50	<0.91	<1.0	0.0053	0.06	0.0078	0.0430	**0.54**	**0.11**	0.14	<1.0
SS-4	8/9/2011	11.50	30 Y	51 Y	0.0054	0.055	0.011	0.054	**0.310**	<0.1	0.064	<1.0
CS-1-CS-4 Composite	8/9/2011	NA	**570 Y**	**180 Y**	<1.3	2.1	**4.8**	**35**	<1.3	<25	<1.3	<1.0
Sampling Beneath Fuel Piping												
T-Junction	8/18/2011	2.6-3.3	<0.99	11 Y	<0.0047	<0.0047	<0.0047	<0.0047	**0.5**	**0.82**	0.031	<0.98
B-1	8/18/2011	2.30	<0.91	1.4 Y	<0.005	<0.005	<0.005	<0.005	0.013	<0.1	<5	<1
B-2	8/18/2011	2.60	29 Y	**160**	<0.033	<0.033	<0.033	<0.033	**0.410**	**1.6**	0.044	<1
B-3	8/18/2011	2.80	<1.1	25 Y	<0.0045	<0.0045	<0.0045	<0.0045	<0.0045	<0.091	<0.0045	<0.99
B-4	8/18/2011	2.20	<0.92	18 Y	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.097	<0.0049	<0.98
D-1	8/18/2011	2.60	2	4.0 Y	<0.026	<0.026	<0.026	0.050	**0.96**	**3.1**	0.140	1.4 C
D-2	8/18/2011	2.35	1.4 Y	2.7 Y	<0.0048	<0.0048	<0.0048	<0.0048	**0.095**	**0.57**	<0.0048	<0.99
~~**CPT/DPT-1**~~	~~3/16/2012~~	~~8~~	~~**1,300**~~	~~99 Y~~	~~<1.0~~	~~<1.0~~	~~**16**~~	~~**58**~~	~~**16**~~	~~<20~~	~~1.6~~	~~NA~~
~~**CPT/DPT-1**~~	~~3/16/2012~~	~~15~~	~~1.9~~	~~1.6 Y~~	~~<1.0~~	~~<1.0~~	~~<1.0~~	~~<1.0~~	~~**13**~~	~~**38**~~	~~<1.0~~	~~NA~~
CPT/DPT-1	3/16/2012	42	<0.93	2.2 Y	<0.0049	<0.0049	<0.0049	<0.0049	**0.50**	**0.27**	0.020	NA
~~**CPT/DPT-2**~~	~~3/16/2012~~	~~10~~	~~28~~	~~21 Y~~	~~<0.25~~	~~<0.25~~	~~<0.25~~	~~0.260~~	~~**1.7**~~	~~**7.10**~~	~~<0.25~~	~~NA~~
CPT/DPT-2	3/16/2012	16	<0.98	<1.0	<0.046	<0.046	<0.046	<0.046	**0.084**	**14.00**	<0.046	NA
CPT/DPT-2	3/16/2012	48	<1.0	1.1 Y	<0.0049	<0.0049	<0.0049	<0.0049	**0.200**	<0.098	0.013	NA
DPT-3	3/15/2012	8	<1.1	<0.99	<0.0049	<0.0049	<0.0049	<0.0049	**0.490**	<0.099	0.027	NA
DPT-3	3/15/2012	15	<0.97	<1.0	<0.0047	<0.0047	<0.0047	<0.0047	**1.200**	<0.094	0.026	NA
DPT-4	3/15/2012	8	<1.1	<1.0	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.098	<0.0049	NA
DPT-4	3/15/2012	16	7.1 Y	9.0 Y	<0.0049	<0.0049	<0.0049	<0.0049	**0.061**	<0.098	<0.0049	NA
DPT-4	3/15/2012	43	<1.1	<1.0	<0.0049	<0.0049	<0.0049	<0.0049	**0.025**	<0.098	<0.0049	NA
Aug-12												
SB-1	8/31/2012	6	<1.1	<1.0	<0.0049	<0.0049	<0.0049	<0.0049	0.0051	NA	NA	NA
SB-1	8/31/2012	10	**440 Y**	**210 Y**	<0.63	<0.63	**6.50**	**9.70**	**1.60**	NA	NA	NA
SB-1	8/31/2012	13	11 Y	<1.0	<0.02	<0.02	<0.02	<0.02	**0.39**	NA	NA	NA
SB-2	8/31/2012	6	<0.93	63 Y	<0.0048	<0.0048	<0.0048	<0.0048	<0.0048	NA	NA	NA
SB-2	8/31/2012	10	60 Y	3.4 Y	<0.01	<0.01	<0.01	0.016	0.015	NA	NA	NA
SB-2	8/31/2012	13	4.4 Y	2.8 Y	<0.0048	<0.0048	<0.0048	<0.0048	0.022	NA	NA	NA
Oct-12												
CS-1	10/4/2012	15	<1.0	<1.0	<0.049	<0.049	<0.049	<0.049	**1.50**	<0.98	<0.049	NA
CS-2	10/4/2012	15	<1.1	<0.99	<0.0047	<0.0047	<0.0047	<0.0047	**0.97**	**0.78**	0.045	NA
CS-3	10/4/2012	15	<1.1	<1.0	<0.0049	<0.0049	<0.0049	<0.0049	**0.65**	**5.50**	0.031	NA
CS-4	10/4/2012	15	<1.1	<1.0	<0.024	<0.024	<0.024	<0.024	**1.30**	**6.50**	0.110	NA
CS-5	10/5/2012	15	<1.1	<1.0	<0.049	<0.049	<0.049	<0.049	**4.40**	**20**	0.58	NA
WCS-1	10/8/2012	10	3.3	20 Y	<0.047	<0.047	<0.047	0.560	**2.60**	**6.50**	0.53	NA
WCS-2	10/8/2012	10	<0.94	9.4 Y	<0.01	<0.01	<0.01	<0.01	**0.13**	**30**	<0.01	NA
WCS-3	10/8/2012	10	3.6 Y	18 Y	<0.049	<0.049	<0.049	<0.049	<0.049	**4.50**	<0.049	NA

Table 1:
Historical Soil Analytical Data
2844 Mountain Blvd, Oakland, CA

Sample ID	Date	Sample Depth (feet)	TPH-g (mg/kg)	TPH-d (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)	MtBE (mg/kg)	TBA (mg/kg)	TAME (mg/kg)	Methanol(mg/kg)
May-13												
DPT-5	5/9/2013	4 b	3.7 Y	16 Y	<0.25	<0.25	<0.25	<0.25	**2.6**	<5.0	1.0	NA
DPT-5	5/9/2013	10	90 Y	47	<0.25	<0.25	0.77	<0.25	**1.5**	<5.0	<0.25	NA
DPT-5	5/9/2013	12	56 Y	17	<0.25	<0.25	0.87	0.53	**3.10**	<5.0	0.36	NA
DPT-5	5/9/2013	15	<0.98	<1.0	<0.025	<0.025	<0.025	<0.025	**0.073**	**9.10**	<0.025	NA
DPT-5	5/9/2013	30	<0.96	1.1 Y	<0.0047	<0.0047	<0.0047	<0.0047	0.0063	<0.094	<0.0047	NA
DPT-5	5/9/2013	50	<1.1	<1.0	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.098	<0.0049	NA
MW-1	5/9/2013	5 b	3.9	11 Y	<0.25	<0.25	<0.25	<0.25	**7.6**	**6.20**	0.45	NA
MW-1	5/9/2013	10	**750**	**130**	<1.0	<1.0	**22**	**108**	**14**	<20	2.1	NA
MW-1	5/9/2013	12	**910**	**140**	<2.0	**5.6**	**19**	**124**	**7.7**	<40	<2.0	NA
MW-1	5/9/2013	15 b	**460**	91 b	<0.5	1.7 b	**6.8 b**	**42 b**	**3.7 b**	<10	<0.5	NA
MW-1	5/9/2013	25	2	1.3 Y	<0.5	<0.5	<0.5	<0.5	**11**	<10	0.60	NA
MW-2	5/9/2013	7 b	7.2 Y	21 Y	<0.25	<0.25	<0.25	<0.25	**0.39 b**	<5.0	<0.25	NA
MW-2	5/9/2013	10	**960**	**400**	<1.3	<1.3	**18**	**64.5**	**14**	<25	3	NA
MW-2	5/9/2013	12	**270**	95	<1.0	<1.0	**5**	**27**	**27**	<20	4.8	NA
MW-2	5/9/2013	17	<0.99	<1.0	<0.25	<0.25	<0.25	<0.25	**2.2**	**14**	<0.25	NA
May-15												
MW-3	**5/1/2015**	20	<1.1	<1.0	<0.0049	<0.0049	<0.0049	<0.0049	**0.16**	<0.099	0.0056	NA
MW-3	**5/1/2015**	24	<1.1	<1.0	<0.0048	<0.0048	<0.0048	<0.0048	**0.79**	<0.096	0.0320	NA
ESL - Shallow Soil Residential, Potential Drinking			**100**	**100**	**0.044**	**2.9**	**3.3**	**2.3**	**0.023**	**0.075**	NA	NA
ESL-Deep Soil Residential, Potential Drinking			**500**	**110**	**0.044**	**2.9**	**3.3**	**2.3**	**0.023**	**0.075**	NA	NA

Table 1:
Historical Soil Analytical Data
2844 Mountain Blvd, Oakland, CA

Sample ID	Date	Sample Depth (feet)	Acetone (mg/kg)	Methylene chloride (mg/kg)	Isopropylbenzene (mg/kg)	Propylbenzene (mg/kg)	1,3,5-Trimethylbenzene (mg/kg)	1,2,4-Trimethylbenzene (mg/kg)	sec-Butylbenzene (mg/kg)	n-Butylbenzene (mg/kg)	Naphthalene (mg/kg)	Ethanol (mg/kg)
Sampling Beneath USTs												
~~**SS-1**~~	~~8/9/2011~~	~~11.50~~	~~<10~~	~~<10~~	~~2.7~~	~~12~~	~~29~~	~~93~~	~~<2.5~~	~~7.5~~	~~**19**~~	~~2~~
~~**SS-2**~~	~~8/9/2011~~	~~11.50~~	~~<8.0~~	~~<8.0~~	~~<2.0~~	~~<2.0~~	~~<2.0~~	~~<2.0~~	~~<2.0~~	~~2.4~~	~~**3.8**~~	~~<1.0~~
SS-3	8/9/2011	11.50	0.057	0.026	<0.0046	<0.0046	<0.0046	0.0059	<0.0046	<0.0046	<0.0046	<1.0
SS-4	8/9/2011	11.50	0.045	<0.02	<0.005	0.005	<0.005	<0.005	0.0066	0.011	<0.005	<1.0
CS-1-CS-4 Composite	8/9/2011	NA	<5.0	<5.0	<1.3	3.3	9.8	30	<1.3	1.8	**4.5**	<1.0
Sampling Beneath Fuel Piping												
T-Junction	8/18/2011	2.6-3.3	0.087	<0.019	<0.0047	<0.0047	<0.0047	<0.0047	<0.0047	<0.0047	<0.0047	<0.98
B-1	8/18/2011	2.30	0.025	<0.02	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<1
B-2	8/18/2011	2.60	0.320	<0.130	0.048	0.250	<0.033	<0.033	0.055	0.250	0.670	1.4
B-3	8/18/2011	2.80	<0.018	<0.018	<0.0045	<0.0045	<0.0045	<0.0045	<0.0045	<0.0045	<0.0045	<0.99
B-4	8/18/2011	2.20	<0.019	<0.019	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.98
D-1	8/18/2011	2.60	**0.710**	**<0.1**	<0.26	0.038	<0.026	0.099	<0.026	<0.026	<0.026	<0.98
D-2	8/18/2011	2.35	0.170	<0.019	<0.0048	0.0072	0.0054	0.029	<0.0048	<0.0048	<0.0048	<0.99
Oct-12												
CS-1	10/4/2012	15	<0.20	<0.20	<0.049	<0.049	<0.049	<0.049	<0.049	<0.049	<0.049	<9.80
CS-2	10/4/2012	15	<0.019	<0.019	<0.0047	<0.0047	<0.0047	<0.0047	<0.0047	<0.0047	<0.0047	<0.94
CS-3	10/4/2012	15	<0.019	<0.019	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.0049	<0.97
CS-4	10/4/2012	15	<0.097	<0.097	<0.024	<0.024	<0.024	<0.024	<0.024	<0.024	<0.024	<4.90
CS-5	10/5/2012	15	0.25	<0.20	<0.049	<0.049	<0.049	<0.049	<0.049	<0.049	<0.049	<9.80
WCS-1	10/8/2012	10	**1.70**	<0.19	<0.047	<0.047	0.15	0.24	<0.047	<0.047	<0.047	<9.4
WCS-2	10/8/2012	10	**2.90**	<0.041	<0.01	<0.01	<0.01	<0.01	<0.01	<0.01	0.013	<2.0
WCS-3	10/8/2012	10	**0.91**	<0.20	<0.049	<0.049	<0.049	<0.049	<0.049	<0.049	0.077	<9.8
May-13												
DPT-5	5/9/2013	4	NA	NA	NA	NA	NA	NA	NA	NA	<0.25	<50
DPT-5	5/9/2013	10	NA	NA	NA	NA	NA	NA	NA	NA	**1.40**	<50
DPT-5	5/9/2013	12	NA	NA	NA	NA	NA	NA	NA	NA	0.58	<50
DPT-5	5/9/2013	15	NA	NA	NA	NA	NA	NA	NA	NA	<0.048	<5.0
DPT-5	5/9/2013	30	NA	NA	NA	NA	NA	NA	NA	NA	<0.0047	<0.94
DPT-5	5/9/2013	50	NA	NA	NA	NA	NA	NA	NA	NA	<0.0049	<0.98
MW-1	5/9/2013	5	NA	NA	NA	NA	NA	NA	NA	NA	<0.25	<50
MW-1	5/9/2013	10	NA	NA	NA	NA	NA	NA	NA	NA	**5.2**	<200
MW-1	5/9/2013	12	NA	NA	NA	NA	NA	NA	NA	NA	**5.3**	<400
MW-1	5/9/2013	15	NA	NA	NA	NA	NA	NA	NA	NA	**3.2**	<100
MW-1	5/9/2013	25	NA	NA	NA	NA	NA	NA	NA	NA	<0.5	<100
MW-2	5/9/2013	7	NA	NA	NA	NA	NA	NA	NA	NA	<0.25	<50
MW-2	5/9/2013	10	NA	NA	NA	NA	NA	NA	NA	NA	**5.9**	<250
MW-2	5/9/2013	12	NA	NA	NA	NA	NA	NA	NA	NA	**2.4**	<200
MW-2	5/9/2013	17	NA	NA	NA	NA	NA	NA	NA	NA	<0.25	<50
ESL - Shallow Soil Residential, Potential Drinking			0.500	0.077	NA	NA	NA	NA	NA	NA	1.2	NA
ESL-Deep Soil Residential, Potential Drinking			0.500	0.077	NA	NA	NA	NA	NA	NA	1.2	NA

Table 1:
Historical Soil Analytical Data
2844 Mountain Blvd, Oakland, CA

Sample ID	Date	Sample Depth (feet)	Cadmium (mg/kg)	Chromium (mg/kg)	Lead (mg/kg)	Nickel (mg/kg)	Zinc (mg/kg)
Sampling Beneath USTs							
~~**SS-1**~~	~~8/9/2011~~	~~NA~~	~~<0.25~~	~~**190**~~	~~3.7~~	~~**800**~~	~~45~~
~~**SS-2**~~	~~8/9/2011~~	~~NA~~	~~0.26~~	~~**320**~~	~~1.9~~	~~**1,400**~~	~~36~~
SS-3	8/9/2011	NA	<0.25	**250**	1.0	**1,000**	36
SS-4	8/9/2011	NA	<0.25	**230**	1.6	**1,000**	39
CS-1-CS-4 Composite	8/9/2011	NA	<0.25	**280**	2.5	**1,100**	39
Sampling Beneath Fuel Piping							
T-Junction	8/18/2011	NA	<0.25	**260**	4.10	**890**	40
B-1	8/18/2011	NA	<0.25	**240**	3.00	**840**	38
B-2	8/18/2011	NA	<0.25	**260**	5.10	**860**	39
B-3	8/18/2011	NA	<0.25	**260**	2.70	**900**	400
B-4	8/18/2011	NA	<0.25	**280**	2.50	**940**	36
D-1	8/18/2011	NA	<0.25	**220**	2.50	**800**	35
D-2	8/18/2011	NA	<0.25	**280**	3.10	**980**	37
Aug-12							
SB-1	8/31/2012	6	NA	NA	3.60	NA	NA
SB-1	8/31/2012	10	NA	NA	3.20	NA	NA
SB-1	8/31/2012	13	NA	NA	2.70	NA	NA
SB-2	8/31/2012	6	NA	NA	3.80	NA	NA
SB-2	8/31/2012	10	NA	NA	3.80	NA	NA
SB-2	8/31/2012	13	NA	NA	4.70	NA	NA
May-13							
DPT-5	5/9/2013	4	<0.23	NA	NA	**1,600**	NA
DPT-5	5/9/2013	10	<0.23	NA	NA	**1,900**	NA
DPT-5	5/9/2013	12	<0.24	NA	NA	**1,300**	NA
DPT-5	5/9/2013	15	<0.24	NA	NA	**1,100**	NA
DPT-5	5/9/2013	30	<0.25	NA	NA	**910**	NA
DPT-5	5/9/2013	50	<0.22	NA	NA	**1,100**	NA
MW-1	5/9/2013	5	<0.23	NA	NA	**1,100**	NA
MW-1	5/9/2013	10	<0.24	NA	NA	**920**	NA
MW-1	5/9/2013	12	<0.23	NA	NA	**1,700**	NA
MW-1	5/9/2013	15	<0.23	NA	NA	**1,300**	NA
MW-1	5/9/2013	25	<0.23	NA	NA	**780**	NA
MW-2	5/9/2013	7	<0.23	NA	NA	**820**	NA
MW-2	5/9/2013	10	<0.24	NA	NA	**1,800**	NA
MW-2	5/9/2013	12	<0.23	NA	NA	**1,400**	NA
MW-2	5/9/2013	17	<0.24	NA	NA	**960**	NA
ESL - Shallow Soil Residential, Potential Drinking			**12**	**1,000**	**80**	**150**	**600**
ESL-Deep Soil Residential, Potential Drinking			**78**	**2,500**	**80**	**1,500**	**2,500**

Table 1:
Historical Soil Analytical Data
2844 Mountain Blvd, Oakland, CA

Note:

C: Presence confirmed, but RPD between columns exceeds 40%

Y: Sample exhibits chromatographic pattern which does not resemble standard

<: Below laboratory-reporting limit

ESL: California Regional Water Quality Control Board, Environmental Screening Levels, Shallow/Deep Soil, Commercial, Groundwater is a current or potential source of drinking water. December 2013

NA: Not Applicable

~~**CPT/DPT-2**~~ Excavated locations

Table 2:
Historical Grab Groundwater Analytical Data
2844 Mountain Blvd, Oakland, CA

Sample ID	Date	Depth of Boring at the time of sampling (feet)	Depth to water at the time of sampling (feet)	TPH-d (µg/L)	TPH-g (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Total Xylenes (µg/L)	MtBE (µg/L)	TBA (µg/L)	TAME (µg/L)	Naphthalene (µg/L)
Perched Discontinuous Water Bearing Zone													
T-1	8/9/2011	NA	11.50	**14,000**	**76,000**	**1,600**	**11,000**	**2,000**	**10,000**	**5,700**	<1,700	5,600	**530**
T-2	8/9/2011	NA	11.50	**1,500**	**890**	**8**	7.3	<0.5	**157**	**12**	**650**	<0.5	**7.6**
CPT/DPT-1-1	3/16/2012	24	23.1	**140** [Y]	<6,300	**94**	**64**	<63	<63	**36,000**	**2,800**	2,300	NA
CPT/DPT-2-1	3/16/2012	24	21.9	**820**	<13,000	<130	<130	<130	<130	**52,000**	**92,000**	3,000	NA
DPT-4-1	3/15/2012	32	29	**150** [Y]	<50	<0.5	<0.5	<0.5	<0.5	**2,600**	**28**	210	NA
2013													
DPT-5W-1	5/9/2013	15	14	**4,300**	**2,100**	**10**	<6.3	23	<6.3	**640**	**16,000**	54	<25
DPT-5W-2	5/10/2013	25	10	**630 Y**	<2,000	<20	<20	<20	<20	**40,000**	**59,000**	2,200	<80
First Water Bearing Zone													
CPT/DPT-1-2	3/16/2012	48	41.1	**3,200**	**96,000**	**2,400**	**11,000**	**3,100**	**14,700**	**95,000**	**78,000**	7,400	NA
CPT/DPT-2-2	3/16/2012	48	41.9	**300** [Y]	**4,500**	**160**	**390**	**170**	**800**	**11,000**	**6,100**	1,500	NA
DPT-3-2	3/15/2012	49	39	53 [Y]	<1,700	<17	<17	<17	<17	**9,800**	**1,000**	690	NA
2013													
DPT-5W-3	5/9/2013	50	39	**320 Y**	<50	<0.5	<0.5	<0.5	<0.5	2.8	<10	<0.5	<2.0
ESL - Potential Drinking Water				**100**	**100**	**1.0**	**40.0**	**30.0**	**20.0**	**5.0**	**12**	**NA**	**6.2**

Sample ID	Date	Depth of Boring at the time of sampling (feet)	Depth to water at the time of sampling (feet)	Propylbenzene (µg/L)	1,3,5-Trimethylbenzene (µg/L)	1,2,4-Trimethylbenzene (µg/L)	Methanol (mg/L)	Ethanol (mg/L)	*Cadmium (µg/L)*	*Chromium (µg/L)*	*Lead (µg/L)*	*Nickel (µg/L)*	*Zinc (µg/L)*
T-1	8/9/2011	NA	11.50	240	520	1,800	<1.0	<1.0	<5.0	11	**39**	**140**	**210**
T-2	8/9/2011	NA	11.50	<0.5	13	24	<1.0	<1.0	<5.0	6.1	**8**	**43**	73
DPT-5W-1	5/9/2013	15	14	NA	NA	NA	NA	<13	<5.0	NA	NA	**48**	NA
DPT-5W-2	5/10/2013	25	10	NA	NA	NA	NA	<40	<5.0	NA	NA	**24**	NA
DPT-5W-3	5/9/2013	50	39	NA	NA	NA	NA	<1.0	<5.0	NA	NA	<5.0	NA
ESL - Potential Drinking Water				**NA**	**NA**	**NA**	**NA**	**NA**	**0.25**	**50.0**	**2.5**	**8.2**	**81.0**

Notes:
< : below Laboratory Detection Limits
NA- Not Applicable

ESL: California Regional Water Quality Control Board, Environmental Screening Levels, Shallow/Deep Soil, Commercial, Groundwater is a current or potential source of drinking water, Revised May 2013

Table 3
Historical Groundwater Monitoring Analytical Results
2844 Mountain Boulevard, Oakland, CA

Monitoring Well	Date	Casing Elevation (Ft.)	Depth to Top Fluid (Ft.)	Depth to Groundwater (Ft.)	Free-Product Thickness	Groundwater Elevation	TPH-g µg/L	TPH-d µg/L	TPH-mo µg/L	Benzene µg/L	Toluene µg/L	Ethylbenzene µg/L	Xylenes µg/L	MtBE µg/L	TBA µg/L	TAME µg/L
RS-1	5/1/90	675.63	7.20	7.20	0.00	668.43	2,700	-	-	370	420	40	320	-	-	-
	5/1/91	675.63	8.35	8.35	0.00	667.28	1,300	-	-	580	130	62	240	-	-	-
	10/1/91	675.63	10.22	10.22	0.00	665.41	1,100	-	-	140	100	45	210	-	-	-
	1/1/92	675.63	8.06	8.06	0.00	667.57	1,700	-	-	9.9	31	9.7	170	-	-	-
	1/1/93	675.63	5.30	5.30	0.00	670.33	3,700	-	-	650	9.2	51	170	-	-	-
	8/1/93	675.63	8.56	8.56	0.00	667.07	900	-	-	14	0.6	2.1	8	-	-	-
	11/1/93	675.63	8.44	8.44	0.00	667.19	1,400	-	-	9.6	ND	0.9	5	-	-	-
	1/1/94	675.63	6.88	6.88	0.00	668.75	4,200	-	-	95	3.1	58	130	-	-	-
	5/1/94	675.63	7.87	7.87	0.00	667.76	7,500	-	-	270	11	37	96	-	-	-
	8/1/94	675.63	16.28	16.28	0.00	659.35	130	-	-	12	0.5	2.6	5	-	-	-
	11/1/94	675.63	8.02	8.02	0.00	667.61	270	-	-	4.7	0.7	0.6	15	-	-	-
	2/1/95	675.63	6.51	6.51	0.00	669.12	12,000	-	-	81	2.3	1	12	-	-	-
	6/1/95	675.63	7.34	7.34	0.00	668.29	37,000	-	-	460	ND	ND	ND	63,000	-	-
	11/1/95	675.63	8.71	8.71	0.00	666.92	ND	-	-	660	16	140	330	31,000	-	-
	2/1/96	675.63	6.95	6.95	0.00	668.68	66,000	-	-	110	ND	12	21	84,000	-	-
	9/18/96	675.63	8.44	8.52	0.08	667.17	1 INCH FLOATING PRODUCT			-	-	-	-	-	-	-
	12/11/96	675.63	6.42	6.62	0.20	669.17	79,000	-	-	4,000	37,000	8,000	45,000	220,000	-	-
	2/21/97	675.63	6.88	6.92	0.04	668.74	1/2 INCH FLOATING PRODUCT			-	-	-	-	-	-	-
	5/28/97	675.63	7.88	7.96	0.08	667.73	156,000	-	-	9,400	51,000	7,000	45,000	112,000	-	-
	9/2/97	675.63	8.34	8.38	0.04	667.28	1/2 INCH FLOATING PRODUCT			-	-	-	-	-	-	-
	11/24/97	675.63	6.98	7.00	0.02	668.65	1/4 INCH FLOATING PRODUCT			-	-	-	-	-	-	-
	2/25/98	675.63	3.51	3.52	0.01	672.12	1/8 INCH FLOATING PRODUCT			-	-	-	-	-	-	-
	5/27/98	675.63	7.31	7.31	0.00	668.32	40,000	-	-	2,200	4,000	2,300	19,000	350,000	-	-
	9/16/98	675.63	8.10	8.10	0.00	667.53	62,000	-	-	2,400	2,300	2,100	14,000	250,000	-	-
	11/23/98	675.63	7.10	7.10	0.00	668.53	99,000	-	-	2,600	5,800	2,500	18,000	130,000	-	-
	2/23/99	675.67	4.82	4.87	0.05	670.84	5/8 INCH FLOATING PRODUCT			-	-	-	-	-	-	-
	5/5/99	675.67	6.86	6.90	0.04	668.80	FLOATING PRODUCT		-	-	-	-	-	-	-	-
	8/24/99	675.67	7.87	7.90	0.03	667.80	FLOATING PRODUCT		-	-	-	-	-	-	-	-
	2/8/12	675.67	6.80	6.80	0.00	668.87	60,000 x	8,200 x	<936	790	<6.4	2,000	430	65,000	41,000	5,100
	5/4/12	675.67	6.57	6.57	0.00	669.10	18,000	10,000	NA	600	<36	2,000	870	22,000	11,000	1,800
	8/6/12	675.67	7.61	7.61	0.00	668.06	16,000	12,000	NA	940	<130	2,000	560	42,000	35,000	3,400
	Well Destroyed October 1, 2012															
RS-2	5/1/90	689.00	7.06	7.06	0.00	681.94	23,000	-	-	7,200	4,800	300	3,300	-	-	-
	5/1/91	689.00	7.14	7.14	0.00	681.86	26,000	-	-	14,000	1,800	750	2,900	-	-	-
	10/1/91	688.89	8.84	8.84	0.00	680.05	13,000	-	-	4,300	910	300	2,300	-	-	-
	1/1/92	688.89	7.34	7.34	0.00	681.55	8,300	-	-	1,800	920	140	1,700	-	-	-
	1/1/93	688.89	4.10	4.10	0.00	684.79	41,000	-	-	7,000	210	1,200	4,200	-	-	-
	8/1/93	688.89	7.32	7.32	0.00	681.57	19,000	-	-	5,300	62	810	1,600	-	-	-
	11/1/93	688.89	7.34	7.34	0.00	681.55	9,300	-	-	2,400	3.90	46	800	-	-	-
	1/1/94	688.89	5.52	5.52	0.00	683.37	30,000	-	-	4,900	ND	880	2,600	-	-	-
	5/1/94	675.25	6.40	6.40	0.00	668.85	120,000	-	-	3,300	330	ND	2,200	-	-	-
	8/1/94	675.25			0.00	675.25	510	-	-	7.30	3.80	3.50	32	-	-	-
	11/1/94	675.25	9.82	9.82	0.00	665.43	620	-	-	6.60	3.90	1.10	47	-	-	-

Table 3
Historical Groundwater Monitoring Analytical Results
2844 Mountain Boulevard, Oakland, CA

Monitoring Well	Date	Casing Elevation (Ft.)	Depth to Top Fluid (Ft.)	Depth to Groundwater (Ft.)	Free-Product Thickness	Groundwater Elevation	TPH-g µg/L	TPH-d µg/L	TPH-mo µg/L	Benzene µg/L	Toluene µg/L	Ethylbenzene µg/L	Xylenes µg/L	MtBE µg/L	TBA µg/L	TAME µg/L
RS-2 cont.	2/1/95	675.25	4.81	4.81	0.00	670.44	22,000	-	-	228	80	2	463	-	-	-
	6/1/95	675.25	5.80	5.80	0.00	669.45	49,000	-	-	1,300	160	200	1,600	71,000	-	-
	11/1/95	675.25	7.64	7.64	0.00	667.61	ND	-	-	670	25	150	360	65,000	-	-
	2/1/96	675.25	4.69	4.69	0.00	670.56	75,000	-	-	1,400	170	59	460	71,000	-	-
	9/18/96	675.25	7.34	7.34	0.00	667.91	6,300	-	-	2,000	48	350	570	160,000	-	-
	12/11/96	675.25	5.08	5.08	0.00	670.17	16,000	-	-	2,000	840	200	3,200	180,000	-	-
	2/21/97	675.25	5.42	5.42	0.00	669.83	22,000	-	-	2,100	1,300	600	5,100	56,000	-	-
	5/28/97	675.25	6.40	6.40	0.00	668.85	156,000	-	-	4,200	89	1,000	6,900	390,000	-	-
	9/2/97	675.25	6.93	6.93	0.00	668.32	<50	-	-	1,300	25	360	1,400	180,000	-	-
	11/24/97	675.25	5.93	5.93	0.00	669.32	<50	-	-	600	ND	ND	ND	610,000	-	-
	2/25/98	675.25	4.59	4.59	0.00	670.66	11,000	-	-	1,100	<50	320	2,400	330,000	-	-
	5/27/98	675.25	5.61	5.61	0.00	669.64	13,000	-	-	2,000	150	600	2,700	380,000	-	-
	9/16/98	675.25	6.84	6.84	0.00	668.41	11,000	-	-	1,600	20	1,600	1,600	280,000	-	-
	11/23/98	675.25	6.24	6.24	0.00	669.01	12,000	-	-	1,200	84	<5	960	140,000	-	-
	2/23/99	675.28	4.62	4.62	0.00	670.66	8,800	-	-	1,500	650	640	1,500	450,000	-	-
	5/5/99	675.28	7.55	7.55	0.00	667.73	29,000	-	-	2,000	1,300	500	3,700	270,000	-	-
	8/24/99	675.28	6.62	6.62	0.00	668.66	12,000	-	-	1,900	20	370	980	340,000	-	-
	2/8/12	675.28	5.52	5.52	0.00	669.76	18,000 x	6,800 x	<378	540	<6.4	120	710	2,800	64,000	420
	5/4/12	675.28	5.18	5.18	0.00	670.10	16,000	13,000	NA	690	23	460	1,140	6,800	21,000	960
	8/6/12	675.28	6.33	6.33	0.00	668.95	11,000	10,000	NA	810	<25	210	473	3,300	18,000	580
	Well Destroyed October 1, 2012															
RS-3	5/1/90	670.00	6.00	6.00	0.00	664.00	330	-	-	2	1	1	150	-	-	-
	5/1/91	670.00	6.76	6.76	0.00	663.24	ND	-	-	0.40	ND	0.80	8	-	-	-
	10/1/91	670.00	8.98	8.98	0.00	661.02	ND	-	-	ND	ND	ND	ND	-	-	-
	1/1/92	670.00	6.81	6.81	0.00	663.19	ND	-	-	2.20	7.20	0.60	4	-	-	-
	1/1/93	670.00	4.05	4.05	0.00	665.95	ND	-	-	ND	ND	ND	ND	-	-	-
	8/1/93	670.00	7.19	7.19	0.00	662.81	ND	-	-	30	6	2.40	5	-	-	-
	11/1/93	670.00	7.12	7.12	0.00	662.88	ND	-	-	4.80	0.40	0.60	2	-	-	-
	1/1/94	670.00	5.42	5.42	0.00	664.58	330	-	-	25	3.20	3.90	12	-	-	-
	5/1/94	676.20	5.78	5.78	0.00	670.42	670	-	-	34	4	28	70	-	-	-
	8/1/94	676.20	5.86	5.86	0.00	670.34	ND	-	-	ND	ND	ND	ND	-	-	-
	11/1/94	676.20	5.08	5.08	0.00	671.12	69	-	-	2.50	3.10	1	4	-	-	-
	2/1/95	676.20	4.51	4.51	0.00	671.69	ND	-	-	0.30	0.40	ND	1	-	-	-
	6/1/95	676.20	5.29	5.29	0.00	670.91	ND	-	-	ND	ND	ND	ND	66	-	-
	11/1/95	676.20	7.10	7.10	0.00	669.10	ND	-	-	ND	ND	ND	ND	44	-	-
	2/1/96	676.20	4.48	4.48	0.00	671.72	120	-	-	ND	ND	ND	ND	110	-	-
	9/18/96	676.20	6.92	6.92	0.00	669.28	1,000	-	-	13	8.60	10	17	33	-	-
	12/11/96	676.20	4.90	4.90	0.00	671.30	85	-	-	20	2	<0.5	14	4,700	-	-
	2/21/97	676.20	4.94	4.94	0.00	671.26	120	-	-	5	2	2	6	850	-	-
	5/28/97	676.20	7.92	7.92	0.00	668.28	<50	-	-	6	<0.5	<0.5	<2	2,400	-	-
	9/2/97	676.20	6.60	6.60	0.00	669.60	<50	-	-	0.90	<0.5	<0.5	<2	8,600	-	-
	11/24/97	676.20	5.89	5.89	0.00	670.31	140	-	-	13	2	1	12	3,600	-	-
	2/25/98	676.20	4.29	4.29	0.00	671.91	<50	-	-	<0.5	<0.5	<0.5	4	850	-	-
	5/27/98	676.20	5.01	5.01	0.00	671.19	<50	-	-	7	<0.5	<0.5	11	940	-	-

Table 3
Historical Groundwater Monitoring Analytical Results
2844 Mountain Boulevard, Oakland, CA

Monitoring Well	Date	Casing Elevation (Ft.)	Depth to Top Fluid (Ft.)	Depth to Groundwater (Ft.)	Free-Product Thickness	Groundwater Elevation	TPH-g µg/L	TPH-d µg/L	TPH-mo µg/L	Benzene µg/L	Toluene µg/L	Ethylbenzene µg/L	Xylenes µg/L	MtBE µg/L	TBA µg/L	TAME µg/L
RS-3 cont.	9/16/98	676.20	6.21	6.21	0.00	669.99	<50	-	-	2	2	2	10	670	-	-
	11/24/98	676.20	5.58	5.58	0.00	670.62	85	-	-	9	23	<0.5	19	180	-	-
	2/24/99	676.23	4.30	4.30	0.00	671.93	<50	-	-	<0.5	0.90	<0.5	<1.0	150	-	-
	5/5/99	676.23	4.92	4.92	0.00	671.31	<50	-	-	1	2	1	6	130	-	-
	8/24/99	676.23	6.64	6.64	0.00	669.59	80	-	-	0.80	<0.5	0.60	<1	300	-	-
	2/8/12	676.23	5.72	5.72	0.00	670.51	130 x	<42	<94	<0.13	0.59	2.90	18.1	7.9	<1.5	<0.17
	5/4/12	676.23	5.25	5.25	0.00	670.98	<50	330 Y	NA	<0.5	<0.5	<0.5	<0.5	10	18	2.4
	8/6/12	676.23	6.65	6.65	0.00	669.58	<50	390 Y	NA	<0.5	<0.5	<0.5	<0.5	13	<10	3.2
	3/29/13	676.23	6.01	6.01	0.00	670.22	<50	90 Y	NA	<0.5	<0.5	<0.5	<0.5	3.6	<10	<0.5
	6/6/13	676.08	6.45	6.45	0.00	669.63	<50	66 Y	NA	<0.5	<0.5	<0.5	<0.5	1.5	<10	<0.5
	9/4/13	676.08	6.91	6.91	0.00	669.17	<50	170 Y	NA	<0.5	<0.5	<0.5	<0.5	<0.5	<10	<0.5
	12/30/13	676.08	7.21	7.21	0.00	668.87	<50	61 Y	NA	<0.5	<0.5	<0.5	<0.5	21	680	0.64
	3/10/14	676.08	5.68	5.68	0.00	670.40	<50	<50	NA	<0.5	<0.5	<0.5	<0.5	14	320	0.61
	6/3/14	676.08	6.72	6.72	0.00	669.36	<50	<50	NA	<0.5	<0.5	<0.5	<0.5	41	490	1.70
	8/27/14	676.08	7.10	7.10	0.00	668.98	<50	120 Y	NA	<0.5	<0.5	<0.5	<0.5	27	<10	1.20
	11/13/14	676.08	6.53	6.53	0.00	669.55	<50*	58 Y	NA	<0.5	<0.5	<0.5	<0.5	19	<10	0.60
	2/12/15	676.08	5.95	5.95	0.00	670.13	<50	56 Y	NA	<0.5	<0.5	<0.5	<0.5	19	<10	<0.5
	5/13/15	676.08	6.93	6.93	0.00	669.15	<50	<50	NA	<0.5	<0.5	<0.5	<0.5	4.6	<10	<0.5
post-MPE	6/22/15	676.08	8.87	8.87	0.00	667.21	<50	<50	NA	<0.5	<0.5	<0.5	<0.5	<0.5	<10	<0.5
	8/12/15	**676.08**	**7.79**	**7.79**	**0.00**	**668.29**	**<50**	**<52**	**NA**	**<0.5**	**<0.5**	**<0.5**	**<0.5**	**0.57**	**<10**	**<0.5**
RS-4	5/1/90	675.38	8.34	8.34	0.00	667.04	440	-	-	9	11	9	49	-	-	-
	5/1/91	675.38	9.50	9.50	0.00	665.88	ND	-	-	8	4	3	5	-	-	-
	10/1/91	675.38	10.82	10.82	0.00	664.56	830	-	-	280	120	24	170	-	-	-
	1/1/92	675.38	9.31	9.31	0.00	666.07	620	-	-	34	8.30	2.10	21	-	-	-
	1/1/93	675.38	6.89	6.89	0.00	668.49	150	-	-	32	1.70	5.80	13	-	-	-
	8/1/93	675.38	9.68	9.68	0.00	665.70	ND	-	-	0.90	0.70	ND	0	-	-	-
	11/1/93	675.38	9.83	9.83	0.00	665.55	ND	-	-	ND	ND	ND	ND	-	-	-
	1/1/94	675.38	8.17	8.17	0.00	667.21	ND	-	-	1.70	ND	0.81	2	-	-	-
	5/1/94	675.38	8.69	8.69	0.00	666.69	ND	-	-	ND	ND	ND	1	-	-	-
	8/1/94	675.38	9.04	9.04	0.00	666.34	420	-	-	6.50	4.10	1.90	40	-	-	-
	11/1/94	675.38	8.00	8.00	0.00	667.38	130	-	-	4.10	0.70	1.70	8	-	-	-
	2/1/95	675.38	7.93	7.93	0.00	667.45	ND	-	-	6	1.20	3.50	13	-	-	-
	6/1/95	675.38	8.61	8.61	0.00	666.77	ND	-	-	ND	ND	ND	ND	69	-	-
	11/1/95	675.38	10.43	10.43	0.00	664.95	ND	-	-	ND	ND	ND	ND	47	-	-
	2/1/96	675.38	7.44	7.44	0.00	667.94	960	-	-	ND	ND	0.60	ND	80	-	-
	9/18/96	675.38	9.58	9.58	0.00	665.80	<50	-	-	<0.5	<0.5	<0.5	<2	200	-	-
	12/11/96	675.38	7.50	7.50	0.00	667.88	75	-	-	<0.5	0.60	<0.5	<0.5	104	-	-
	2/21/97	675.38	8.26	8.26	0.00	667.12	<50	-	-	1	1	<0.5	1	190	-	-
	5/28/97	675.38	8.92	8.92	0.00	666.46	<50	-	-	6	<0.5	<0.5	<2	110	-	-
	9/2/97	675.38	9.39	9.39	0.00	665.99	100	-	-	3	<0.5	<0.5	<2	39	-	-
	11/24/97	675.38	8.22	8.22	0.00	667.16	41	-	-	<0.5	2	<0.5	<2	210	-	-
	2/25/98	675.38	7.19	7.19	0.00	668.19	<50	-	-	3	<0.5	<0.5	<1	5,600	-	-
	5/27/98	675.38	8.40	8.40	0.00	666.98	<50	-	-	<0.5	<0.5	<0.5	<1	2,400	-	-

Table 3
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2844 Mountain Boulevard, Oakland, CA

Monitoring Well	Date	Casing Elevation (Ft.)	Depth to Top Fluid (Ft.)	Depth to Groundwater (Ft.)	Free-Product Thickness	Groundwater Elevation	TPH-g µg/L	TPH-d µg/L	TPH-mo µg/L	Benzene µg/L	Toluene µg/L	Ethylbenzene µg/L	Xylenes µg/L	MtBE µg/L	TBA µg/L	TAME µg/L
RS-4 cont.	9/16/98	675.38	9.26	9.26	0.00	666.12	<50	-	-	<0.5	<0.5	<0.5	<1	230	-	-
	11/24/98	675.38	8.50	8.50	0.00	666.88	<50	-	-	2	<0.5	<0.5	<1	100	-	-
	2/24/99	675.42	7.20	7.20	0.00	668.22	<50	-	-	2	3	0.80	5	670	-	-
	5/5/99	675.42	8.37	8.37	0.00	667.05	100	-	-	<0.5	<0.5	<0.5	<1	440	-	-
	8/24/99	675.42	8.36	8.36	0.00	667.06	<50	-	-	<0.5	<0.5	<0.5	<1	<500	-	-
	2/8/12	675.42	8.11	8.11	0.00	667.31	140,000	130,000 x	<9,360	120	2,600	4,700	28,200	28,000	100,000	1,800
	5/4/12	675.42	8.31	8.31	0.00	667.11	67,000	12,000 Y	NA	61	900	2,100	9,700	32,000	69,000	1,700
	8/6/12	675.42	9.01	9.01	0.00	666.41	49,000	8,900	NA	<130	350	1,700	8,100	19,000	90,000	1,300
	3/29/13	675.42	8.49	8.49	0.00	666.93	14,000	14,000	NA	<100	<100	440	1,340	14,000	110,000	590
	6/6/13	675.27	8.48	8.48	0.00	666.79	12,000	7,200	NA	11	<3.6	420	886	16,000	66,000	970
	9/4/13	675.27	9.39	9.39	0.00	665.88	20,000	5,100	NA	<100	<100	660	2,830	18,000	75,000	1,200
	12/30/13	675.27	9.57	9.57	0.00	665.70	<13,000	9,900	NA	<130	<130	<130	150	16,000	37,000	1,100
	3/10/14	675.27	7.65	7.65	0.00	667.62	<10,000	3,700	NA	<100	<100	<100	<100	11,000	38,000	640
	6/3/14	675.27	9.27	9.27	0.00	666.00	<3,600	4,400	NA	<36	<36	40	<36	3,700	27,000	260
	8/27/14	675.27	9.43	9.43	0.00	665.84	2,500	4,700	NA	<20	<20	40	<20	2,100	28,000	150
	11/13/14	675.27	9.56	9.56	0.00	665.71	2,200*	3,500	NA	<20	<20	<20	36	11,000	15,000	910
	2/12/15	675.27	8.03	8.03	0.00	667.24	<1,300	1,900	NA	<13	<13	<13	<13	500	14,000	25
	5/13/15	675.27	9.05	9.05	0.00	666.22	<1,300	1,100	NA	<13	<13	<13	<13	460	25,000	21
Post-MPE	6/22/15	675.27	10.62	10.62	0.00	664.65	<1,300	770	NA	<13	<13	<13	<13	5,900	7,900	500
	8/12/15	**675.27**	**9.93**	**9.93**	**0.00**	**665.34**	**320**	**1,300**	**NA**	**<1.3**	**<1.3**	**1.3**	**1.7**	**230**	**6,400**	**18**
MW-1	6/6/13	674.92	6.03	6.03	0.00	668.89	<17,000	13,000	NA	930	370	470	1,760	55,000	32,000	7,200
	9/4/13	674.92	7.10	7.10	0.00	667.82	<50,000	13,000	NA	2,000	<500	1,400	4,200	70,000	48,000	7,700
	12/30/13	674.92	7.27	7.27	0.00	667.65	34,000	13,000	NA	920	1,000	1,300	4,900	43,000	43,000	4,500
	3/10/14	674.92	5.51	5.51	0.00	669.41	<20,000	11,000	NA	720	<200	890	1,970	25,000	30,000	2,600
	6/3/14	674.92	6.74	6.74	0.00	668.18	8,900	7,400	NA	350	<83	550	1,420	11,000	28,000	1,300
	8/27/14	674.92	7.23	7.23	0.00	667.69	8,100	12,000	NA	640	<63	610	720	8,400	23,000	1,500
	11/13/14	674.92	7.36	7.36	0.00	667.56	7,400*	7,900	NA	270	<63	360	880	6,100	12,000	910
	2/12/15	674.92	5.80	5.80	0.00	669.12	4,300	11,000	NA	200	<25	200	350	3,400	18,000	500
	5/13/15	674.92	7.00	7.00	0.00	667.92	2,700	7,100	NA	150	<8.3	170	76	1,000	12,000	150
Post-MPE	6/22/15	674.92	12.11	12.11	0.00	662.81	<1,300	2,600	NA	<13	<13	<13	<13	4,800	17,000	450
	8/12/15	**674.92**	**8.25**	**8.25**	**0.00**	**666.67**	**2,000**	**8,100**	**NA**	**31**	**<8.3**	**27**	**46**	**530**	**10,000**	**57**
MW-2	6/6/13	675.02	6.70	6.70	0.00	668.32	16,000	5,400	NA	910	<130	610	2,290	59,000	64,000	7,700
	9/4/13	675.02	7.79	7.79	0.00	667.23	<25,000	3,900	NA	860	<250	710	1,580	32,000	31,000	4,600
	12/30/13	675.02	8.05	8.05	0.00	666.97	<13,000	6,300	NA	180	<130	<130	330	18,000	53,000	1,800
	3/10/14	675.02	6.08	6.08	0.00	668.94	14,000	11,000	NA	210	<130	360	700	15,000	40,000	1,800
	6/3/14	675.02	7.54	7.54	0.00	667.48	<7,100	6,200	NA	170	<71	310	150	8,000	29,000	920
	8/27/14	675.02	7.90	7.90	0.00	667.12	3,400	5,000	NA	100	<8.3	120	88	2,300	25,000	310
	11/13/14	675.02	8.12	8.12	0.00	666.90	1,000*	4,700	NA	120	<8.3	11	<8.3	4,000	22,000	460
	2/12/15	675.02	6.33	6.33	0.00	668.69	<4,200	5,400	NA	98	<42	58	<42	6,300	42,000	610
	5/13/15	675.02	7.72	7.72	0.00	667.30	<2,000	4,900	NA	86	<20	45	<20	870	34,000	96
Post-MPE	6/22/15	675.02	11.30	11.30	0.00	663.72	<2,000	3,300	NA	<20	<20	<20	<20	3,400	18,000	460
	8/12/15	**675.02**	**8.86**	**8.86**	**0.00**	**666.16**	**<2,000**	**2,800 Y**	**NA**	**<20**	**<20**	**<20**	**<20**	**470**	**23,000**	**31**

Table 3
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2844 Mountain Boulevard, Oakland, CA

Monitoring Well	Date	Casing Elevation (Ft.)	Depth to Top Fluid (Ft.)	Depth to Groundwater (Ft.)	Free-Product Thickness	Groundwater Elevation	TPH-g µg/L	TPH-d µg/L	TPH-mo µg/L	Benzene µg/L	Toluene µg/L	Ethylbenzene µg/L	Xylenes µg/L	MtBE µg/L	TBA µg/L	TAME µg/L
MW-3	**5/13/15**	675.58	6.60	6.60	0.00	668.98	<50	7,000	NA	<0.5	<0.5	<0.5	0.75	160	380	8.4
Post-MPE	6/22/15	675.58	14.31	14.31	0.00	661.27	<100	650 Y	NA	<1.0	<1.0	<1.0	<1.0	190	17	6.3
	8/12/15	**675.58**	**7.80**	**7.80**	**0.00**	**667.78**	**<170**	**410 Y**	**NA**	**<1.7**	**<1.7**	**<1.7**	**<1.7**	**590**	**41**	**20**
ESLs (µg/L)	**Ground-water**						100	100	100	1.00	40	30	20	5.00	12	NL
	Vapor Intrusion						NV	NV	NV	27	95,000	310	37,000	9,900	NV	NL

Note:

< : Below Laboratory Reporting Limit (Method Detection Limit)

x : Does not match pattern of reference Gasoline standard/ Not typical of diesel standard pattern (possibly fuel lighter than diesel)

* : Laboratory instruments for EPA8260 were down. Therefore, TPH-g was analyzed by EPA8015B instead of EPA8260 for samples collected on 11/13/2014

ESL: Environmental Screening Level by California Regional Water Quality Control Board San Francisco Bay Region

December 2013 (Table-F1a, groundwater is a current or potential drinking water source)

NL: Not Listed

NV: No Value

APPENDIX A

SITE HISTORY

Site History and Use

Soil contamination was initially identified at the site in March 1989, during the replacement of the product lines by Diablo Tank and Equipment. Up to 8,400 mg/kg of total PHCs as gasoline (TPH-g) were identified in soil samples collected from the southern edge of the USTs.

In July 1989, On-Site Technologies excavated and disposed of between 90 and 150 cubic yards of contaminated soil from the southern end of the UST that then contained premium unleaded fuel. Up to 3,300 mg/kg of total PHCs as gasoline (TPH-g) were detected in samples collected from excavation sidewalls.

In May 1990, Remediation Service International (RSI) conducted a soil and groundwater assessment at the site including installation of four groundwater monitoring wells (RS-1 through RS-4). Hydrocarbons were detected in both soil and groundwater during this assessment.

In June 1991, soil remediation began at the site using soil vapor extraction (SVE). In October 1991, groundwater remediation began at the site using RSI's remedial system. Remediation was suspended in 1992, apparently due to Desert Petroleum's financial problems.

In 1994 a 280-gallon waste oil UST was removed along with approximately 40 cubic yards of contaminated soil and in 1998 the 4,000-gallon gasoline UST was removed along with approximately 40 cubic yards of contaminated soil.

Reportedly the site has been monitored on a quarterly basis since May 1990, monitoring was discontinued in 1999. A Corrective Action Plan for the site was prepared in February 1995.

Beginning in 1995, hydrocarbon concentrations started to rise and free hydrocarbons appeared in monitoring well RS-1. During interim free-product removal, between October and December 1996, 30.4 gallons of gasoline and 1,077 gallons of contaminated groundwater were removed from monitoring well RS-1.

In March 1999, Western Geo-Engineers of Woodland, California prepared a quarterly groundwater monitoring report and subsurface conduit study for the site. This subsurface conduit study identified a sewer line that was partially submerged below the typical depth to groundwater at the site. This sewer line could potentially act as a conduit for migration of groundwater contamination.

A Report for Soil and Groundwater Assessment was prepared by Agua Science Engineers, Inc in May 24, 2000 which documented further delineation of the soil and groundwater contamination extent in the off-site area.

"Out-of-compliance" correspondence dated June 18, 2009, was issued by Alameda County Environmental Health Services (ACEHS) for the site; this letter was related to a workplan dated December 7, 2000 for installation of five monitoring wells in both on- and off-site areas where elevated concentrations of fuel hydrocarbons had been detected.

Between July 29 and August 18, 2011 two underground storage tanks (USTs), one 10,000-gallon and one 3,000-gallon capacity, were excavated and disposed of off-site. During this event, associated fuel piping was also excavated and disposed of off-site. Depth to the bottom of excavation pit was recorded at 11.5 feet bgs. The UST pit and trenches were not backfilled to grade with clean (imported) fill material or resurfaced because the owner indicated he intends to install new USTs and piping in the near future. The UST pit was lined and backfilled with existing material and concrete rubble. The site is currently fenced in, which limits public access to the property. Confirmation soil samples were collected from beneath removed USTs and associated piping. Two groundwater samples were collected from the UST pit. It appeared that soil and groundwater contamination still exists in the area of removed USTs, as illustrated by levels of chemicals of concern (COCs) in excess of Environmental Screening Levels (ESLs). Lesser soil contamination exists in the area beneath the removed fuel piping.

On March 15 and 16, 2012, under SOMA's oversight, Fisch Drilling (Fisch) advanced on-site borings CPT/MIP-1 and CPT/MIP-2, and borings DPT-1 through DPT-4. Borings DPT-1 and DPT-2 were advanced adjacent to CPT/MIP-1 and CPT/MIP-2. Boring DPT-1 was renamed CPT/DPT-1 and was continuously logged to verify the CPT obtained data. Based on results of this sampling it appeared that soil and groundwater contamination still exists in the area of removed USTs and in the explored downgradient (off-site) areas. In order to address residual soil contamination, SOMA proposed conducting a shallow soil excavation in the vicinity of former USTs.

In October 2012, based on chemical concentrations in soil, an interim remedial excavation to address the residual contamination in the area of the former USTs was implemented. As part of this remedial excavation an area of approximately 1,200 square feet was excavated to approximately 12 feet bgs and then deepened to approximately 15 feet bgs based on soil discoloration and field PID readings. Approximately 788.65 tons of excavated soils were disposed of at an approved disposal facility and excavation pit was backfilled with clean fill material. Prior to backfill placement confirmation soil samples were collected from the bottom and sidewalls of excavation (where feasible); once backfilled the area was resurfaced with asphalt and concrete, as appropriate. Two groundwater monitoring wells RS-1 and RS-2 were located near or inside the footprint of the excavation, and as required were decommissioned prior to the initiation of excavation activities at the site

In December 2012, SOMA submitted a workplan for additional investigation, well replacement and (multi-phase extraction) MPE pilot testing. This workplan was approved by the San Francisco Bay regional water quality Control board (SF RWQCB) on April 3, 2013. In May 2013, two replacement wells (MW-1 and MW-2) and two soil borings next to each other (DPT-5 and DPT-5W) for collection of soil and groundwater samples were installed. Results were documented in SOMA's report 'Additional investigation and Monitoring Wells Replacement Report' dated September 13, 2013.

In December 2013, MPE pilot test was conducted at the site and results and recommendation were documented in 'Multi-Phase Extraction Pilot Testing Report' dated January 21, 2014. Approximately 497 pounds of volatile PHCs were removed during the MPE pilot test at an average VOC mass removal rate of approximately 36 lbs/day SOMA's recommendation to conduct further MPE events at the site was approved in RWQCB's directive dated June 27, 2014.

An MPE event was conducted at the site from September 17 to November 5, 2014 utilizing MW-1, MW-2, and RS-4 as extraction wells. Approximately 887 pounds of volatile PHCs were removed during this event with an average VOC mass removal rate of approximately 22 lbs/day.

On May 1, 2015, SOMA installed a 4-inch diameter MPE/monitoring well (MW-3) in the vicinity of T-1 to be utilized during the next MPE event and to monitor elevated levels of chemicals in groundwater.

Upon SFB-RWQCB's approval an MPE event was conducted from May 19 to June 19, 2015 utilizing MW-1, MW-2, RS-4, and newly installed MW-3 as extraction wells. Approximately 328 pounds of volatile PHCs were removed during this event with an average VOC mass removal rate of approximately 17 lbs/day.

APPENDIX B

GENERAL FIELD PROCEDURES

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Utility Locating

Prior to drilling, boring locations are marked with white paint or other discernible marking and cleared for underground utilities through Underground Service Alert (USA). In addition, the first five feet of each borehole are air-knifed, or carefully advanced with a hand auger if shallow soil samples are necessary, to help evaluate the borehole location for underground structures or utilities.

DPT Borehole Advancement

Pre-cleaned push rods (typically one to two inches in diameter) are advanced using a hydraulic push type rig for the purpose of collecting samples and evaluating subsurface conditions. The drill rod serves as a soil sampler, and an acetate liner is inserted into the annulus of the drill rod prior to advancement. Once the sample is collected, the rods and sampler are retracted and the sample tubes are removed from the sampler head. The sampler head is then cleaned, filled with clean sample tubes, inserted into the borehole and advanced to the next sampling point where the sample collection process is repeated.

Borehole Completion

Upon completion of drilling and sampling, the rods are retracted. Neat cement grout, mixed at a ratio of 6 gallons of water per 94 pounds of Portland cement, is introduced, *via* a tremmie pipe, and pumped to displace standing water in the borehole. Displaced groundwater is collected at the surface into DOT approved 55-gallon steel drums, or an equivalent storage container. In areas where the borehole penetrates asphalt or concrete, the borehole is capped with an equivalent thickness of asphalt or concrete patch to match finished grade.

Equipment Decontamination

Equipment that could potentially contact subsurface media and compromise the integrity of the samples is carefully decontaminated prior to drilling and sampling. Drill augers and other large pieces of equipment are decontaminated using high pressure hot water spray. Samplers, groundwater pumps, liners and other equipment are decontaminated in an Alconox scrub solution and double rinsed in clean tap water rinse followed by a final distilled water rinse.

The rinsate and other wastewater are contained in 55-gallon DOT-approved drums, labeled (to identify the contents, generation date and project) and stored on-site pending waste profiling and disposal.