

December 29, 2012

Environmental Health Services

1131 Harbor Bay Parkway, Suite 250 Alameda, California 94502-6577

Environmental Protection

Roya C. Kambin Project Manager Marketing Business Unit Chevron Environmental Management Company 6101 Bollinger Canyon Road San Ramon, CA 94583 Tel (925) 790-6270 RKambin@chevron.com

RECEIVED

By Alameda County Environmental Health at 8:45 am, Jan 07, 2013

Re: Chevron Facility No. 351639 (Former Unocal Service Station No. 6129)

3420 35th Avenue, Oakland, California ACEH Fuel Leak Case No. RO0000058 RWQCB Case No. 01-1590 GeoTracker Global ID T0600101465.

I have reviewed the attached report dated December 19 2012.

Alameda County Health Care Services Agency

I agree with the conclusions and recommendations presented in the referenced report. The information in this report is accurate to the best of my knowledge and all local Agency/Regional Board guidelines have been followed. This report was prepared by AECOM, upon whose assistance and advice I have relied.

This letter is submitted pursuant to the requirements of California Water Code Section 13257(b)(1) and the regulating implementation entitled Appendix A pertaining thereto.

I declare under penalty of perjury that the foregoing is true and correct to the best of my knowledge.

Sincerely,

Roya/Kambin Project Manager

Attachment: Second Quarter 2012 Semi-Annual Groundwater Monitoring Report by AECOM

Environment, Inc.

Poga & Kami



AECOM Environment 10461 Old Placerville Road, Suite 170 Sacramento, CA 95827 tel (916) 361-6400 fax (916) 361-6401

December 20, 2012

Mr. Keith Nowell Alameda County Environmental Health (ACEH) 1131 Harbor Bay Parkway, Suite 250 Alameda CA 94502

Subject: Second Semi-Annual 2012 Groundwater Monitoring Report

Chevron Facility No. 351639 (Former Unocal Service Station No. 6129)

3420 35th Avenue, Oakland, California

Fuel Leak Case RO0000058

Dear Mr. Nowell,

On behalf of Chevron Environmental Management Company, for itself and as Attorney-in-Fact for Union Oil Company of California (hereinafter "EMC"), AECOM Environment, Inc. (AECOM) has been authorized by CEMC to prepare the second semi-annual 2012 groundwater monitoring report for the site located at 3420 35th Avenue in Oakland, California (Site) (**Figure 1**). The locations of former and current site features are illustrated on **Figure 2**. Semi-annual groundwater monitoring is intended to evaluate the distribution of petroleum hydrocarbon constituents in groundwater beneath the site. Groundwater sampling was performed by TRC Solutions (TRC) of Irvine, California. This report summarizes sample results collected from the Site during the second semi-annual event of 2012.

Site Background and History

In 1989, two 10,000-gallon gasoline underground storage tanks (USTs) and one 550-gallon waste oil UST were removed from the site. Low concentrations of petroleum hydrocarbons were present in soil samples below the former gasoline USTs, used-oil UST, and product piping. Four soil samples were taken under the USTs, one sample under the waste oil UST, and five samples under the product piping. The soil samples under the USTs contained total petroleum hydrocarbons (TPH) as gasoline (TPHg) at concentrations ranging from 1.8 to 10 parts per million (ppm). One of the piping samples had soil concentrations of TPHg at 3.5 feet below ground surface (bgs) of 690 ppm. This area was over excavated to 7.5 feet bgs and soil samples were found to be non-detect for TPHg. The waste oil UST samples had low detections of TPH as diesel (TPHd) and total oil and grease (TOG).

There are currently two 12,000 gallon gasoline USTs in use and two dispenser islands. There is also one waste oil UST and three hydraulic lifts associated with the service bay.

In 1989, three monitoring wells (MW-1 through MW-3) were installed at the site to approximately 44 feet bgs. TPHg and benzene, toluene, ethylbenzene, and xylenes (BTEX) were only detected in MW-3 at 5 feet bgs. In 1990, four soil borings (EB-1 through EB-4) were advanced in the vicinity of MW-3 to define hydrocarbon impacts to soil. In April 1991, approximately 230 cubic yards of soil were excavated based on analytical data from the soil borings between the dispenser islands and MW-3 and around MW-3. Monitoring well MW-3 was not destroyed.

In November 2003, four soil borings were advanced to approximate depths of 31.5 to 36.5 feet bgs. Methyl tertiary butyl ether (MTBE) was detected at concentrations of 0.37 to 0.41 ppm at sample depths of 26 to 31 feet bgs. Groundwater was encountered at approximately 35 feet bgs.

In September 2006, six cone penetrometer testing (CPT) borings were completed, and no soil or groundwater samples were collected. In November 2006, five soil borings were advanced, four adjacent to the CPT borings. In December 2006, four soil borings were advanced. The reports concluded that soil and groundwater near the dispenser islands has been impacted and is migrating downgradient. The groundwater analytical data collected from the soil borings are consistent with historic site groundwater concentrations.

Groundwater Monitoring Field Data

Groundwater elevation data was recorded in three monitoring wells, MW-1 through MW-3, on October 23, 2012 (**Table 1**). Copies of the groundwater gauging logs are included in **Attachment A**. The groundwater flow direction was calculated to flow to the east/southeast with an average hydraulic gradient of approximately 0.009 feet per foot (**Figure 2**). The depth to groundwater ranged from 29.39 to 30.51 feet below the top of well casings (159.19 to 160.66 feet above mean sea level). A summary of historical groundwater elevations is presented in **Attachment B**.

Groundwater Sampling and Analytical Results

Groundwater samples were collected from monitoring wells MW-1 through MW-3 on October 23, 2012. Groundwater stabilization parameters including; temperature, pH, and electrical conductivity readings were collected during purging. Copies of the groundwater purge/sample logs are included in **Attachment A**. Laboratory analyses were performed by BC Laboratories, Inc. (BC Labs) of Bakersfield, California. The BC Labs analytical report dated October 30, 2012 is included as **Attachment C**. Samples were analyzed for the following analytes:

- BTEX by USEPA method 8260B;
- Total Purgeable Petroleum Hydrocarbons (TPPH)/TPHg by GC/MS;
- Fuel oxygenates including MTBE, tertiary-amyl methyl ether (TAME), tertiary butyl alcohol (TBA), di-isopropyl ether (DIPE), and ethyl tertiary-butyl ether (ETBE), ethanol, ethylene dibromide (EDB), and 1,2-Dichloroethane (1,2-DCA or ethylene dichloride [EDC]) by USEPA method 8260B.

The monitoring event is coordinated with the adjacent former Exxon station number 70234, during the second quarter 2012 the former Exxon was sampled on October 31, 2012. Results from the former Exxon sampling are included as **Attachment D**. **Figure 2** includes the groundwater data for both sites.

Analytical results for this semi-annual groundwater monitoring event are consistent with previous reporting periods (**Table 1**). The following presents a brief summary of the analytical sample results:

- ETBE, TAME, EDB, 1, 2-DCA, and ethanol, were not detected in any of the samples analyzed above the laboratory reporting limits.
- MTBE was detected in all three wells, MW-1 (140 μg/L), MW-2 (1,300 μg/L), and MW-3 (500 μg/L), all are within historic concentration ranges.
- TBA was detected in all three wells, MW-1 (47 μg/L), MW-2 (410 μg/L), and MW-3 (160 μg/L).
- DIPE was detected in MW-2 at 14 μg/L.
- TPPH was detected in all three wells, MW-1 (130 μg/L), MW-2 (750 μg/L), and MW-3 (480 μg/L).
 The laboratory report narrative, Attachment C, states that the TPPH detections in MW-1 and MW-3 do not exhibit a "gasoline" pattern and that TPPH is entirely due to MTBE.

A summary of historical groundwater analytical data is presented in **Attachment B.**

Approximately 24 gallons of purgewater were generated during sampling activities. Purged water was removed from the site by TRC and transported to their facility in Concord, CA for future disposal.

Conclusions and Recommendations

The sample results of the groundwater monitoring activities at the site indicate the following:

- No BTEX was detected.
- TPHg, MTBE, and detected oxygenate concentrations fluctuate seasonally but are generally stable or declining.
- Concentrations of TPHg and MTBE are generally higher at the upgradient former Exxon Service Station.

AECOM recommends continued semi-annual monitoring coordinated with the former Exxon Service Station 70234 and sampling to verify decreasing concentrations.

Future Activities

Groundwater Monitoring

AECOM will coordinate monitoring and sampling activities as per the established schedule. AECOM will submit semiannual groundwater monitoring and sampling reports.

Additional Activity

CRA submitted the *Conceptual Site Model and Well Installation Work* Plan on May 3, 2012. AECOM will initiate the Work Plan submitted by CRA following ACEH concurrence/approval.

Remarks/Signatures

The interpretations in this report represent our professional opinions and are based, in part, on the information supplied by the client. These opinions are based on currently available information and are arrived at in accordance with currently accepted hydrogeologic and engineering practices at this time and location. Other than this, no warranty is implied or intended.

If you have any questions regarding this project, please contact either of the undersigned at (916) 361-6400.

Sincerely,

James Harms

Project Manager

Brett Lehman, P.G.

Geologist

cc: Roya Kambin, CEMC (electronic)

Son Nguyen & Le Pham, Nguyen/Pham Family Trust, Property Owner

Tables

Table 1 Groundwater Monitoring and Sampling Data

Exp. 05-24-2014

AECOM Environment Mr. Keith Nowell December 20, 2012 Page 4

Figures

Figure 1 Site Location Map

Figure 2 Groundwater Concentration Map

Attachments

Attachment A October 23, 2012 Groundwater Data Field Sheets

Attachment B Historic Groundwater Data

Attachment C BC Laboratories Analytical Report

Attachment D Former Exxon Station Groundwater Data

Tables

TABLE 1 GROUNDWATER MONITORING AND SAMPLING DATA CHEVRON #351639 FORMER UNOCAL #6129 3420 35TH AVE., OAKLAND, CALIFORNIA

					HYDROCARBONS PRIMARY VOCS												
_					HYDROCARBONS			1		PRIM	IARY VO	CS	1			•	
Location	Date	тос	DTW	GWE	TPH - Gasoline	В	T	E	X	WTBE by SW8260	ſBA	STBE	DIPE	<i>[AME</i>]	ЕДВ	1,2-DCA	Ethanol
	Units	ft	ft	ft-amsl	μg/L	μg/L	μg/L	μg/L	μg/L	µg∕L	μg/L	μg/L	μg/L	μg/L	μg/L	μg/L	μg/L
MW-1	05/27/2011	190.79	26.87	163.92	110	< 0.50	< 0.50	< 0.50	<1.0	220	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/23/2011	190.79	29.14	161.65	110	< 0.50	< 0.50	< 0.50	<1.0	150	41	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	05/24/2012	190.79	26.58	164.21	140	< 0.50	< 0.50	< 0.50	<1.0	190	66	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	10/23/2012	190.79	30.51	160.28	130	<0.50	<0.50	<0.50	<1.0	140	47	<0.50	<0.50	<0.50	<0.50	<0.50	<250
MW-2	05/27/2011	190.80	26.44	164.36	560	< 0.50	< 0.50	< 0.50	<1.0	1,100	210	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/23/2011	190.80	28.53	162.27	830	< 0.50	< 0.50	< 0.50	<1.0	1,500	400	< 0.50	9.0	< 0.50	< 0.50	< 0.50	<250
	05/24/2012	190.80	25.97	164.83	1,000	< 0.50	< 0.50	< 0.50	<1.0	1,200	430	< 0.50	8.8	< 0.50	< 0.50	< 0.50	<250
	10/23/2012	190.80	30.14	160.66	750	<0.50	<0.50	<0.50	<1.0	1,300	410	<0.50	14	<0.50	<0.50	<0.50	<250
MW-3	05/27/2011	188.58	26.53	162.05	340	< 0.50	< 0.50	< 0.50	<1.0	890	73	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/23/2011	188.58	28.11	160.47	520	< 0.50	< 0.50	< 0.50	<1.0	730	170	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	05/24/2012	188.58	25.95	162.63	660	< 0.50	< 0.50	< 0.50	<1.0	1,100	300	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	10/23/2012	188.58	29.39	159.19	480	<0.50	<0.50	<0.50	<1.0	500	160	<0.50	<0.50	<0.50	<0.50	< 0.50	<250

Abbreviations and Notes:

TOC = Top of Casing MTBE = Methyl tert butyl ether

DTW = Depth to Water TBA = Tert-Butyl alcohol

GWE = Groundwater elevation DIPE = Diisopropyl ether

 $(\text{ft-amsl}) = \text{Feet Above Mean sea level} \\ \qquad \qquad \text{ETBE} = \text{Tert-Butyl ethyl ether}$

ft = Feet TAME = Tert-Amyl methyl ether

 μ g/L = Micrograms per Liter EDB = 1,2-Dibromoethane (Ethylene dibromide)

TPH - Total Petroleum Hydrocarbons 1,2-DCA = 1,2-Dichloroethane

VOCS = Volatile Organic Compounds -- = Not available / not applicable

B = Benzene <x = Not detected above laboratory method detection limit

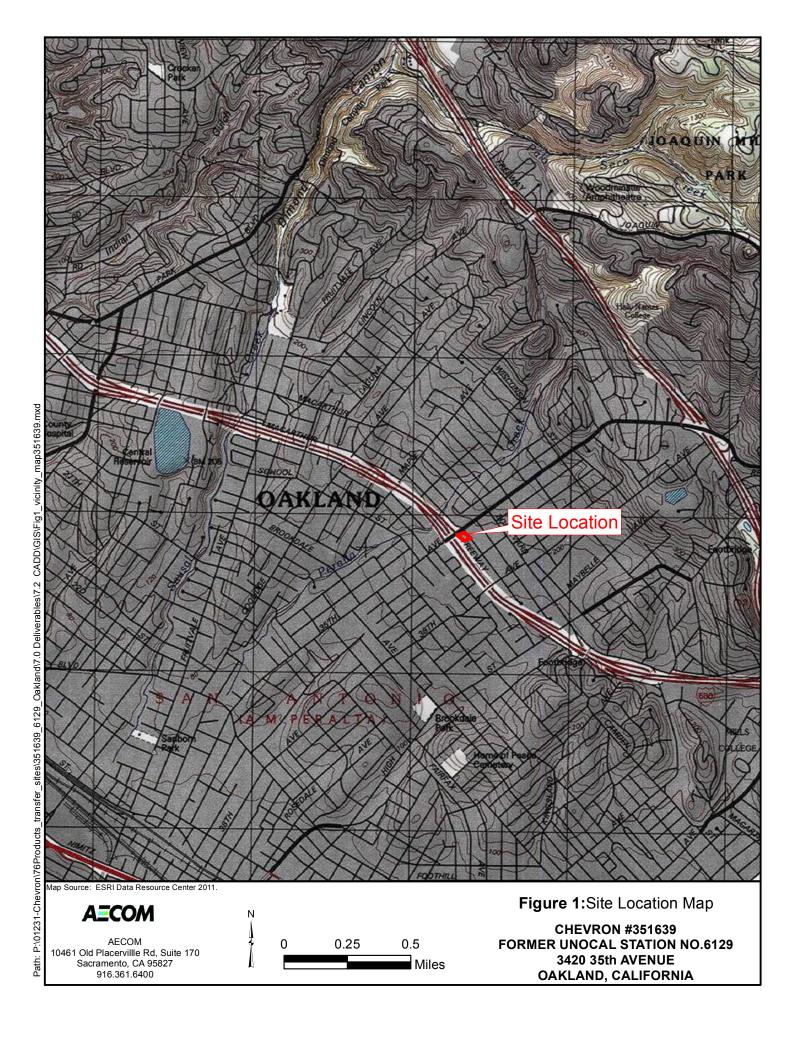
T = Toluene

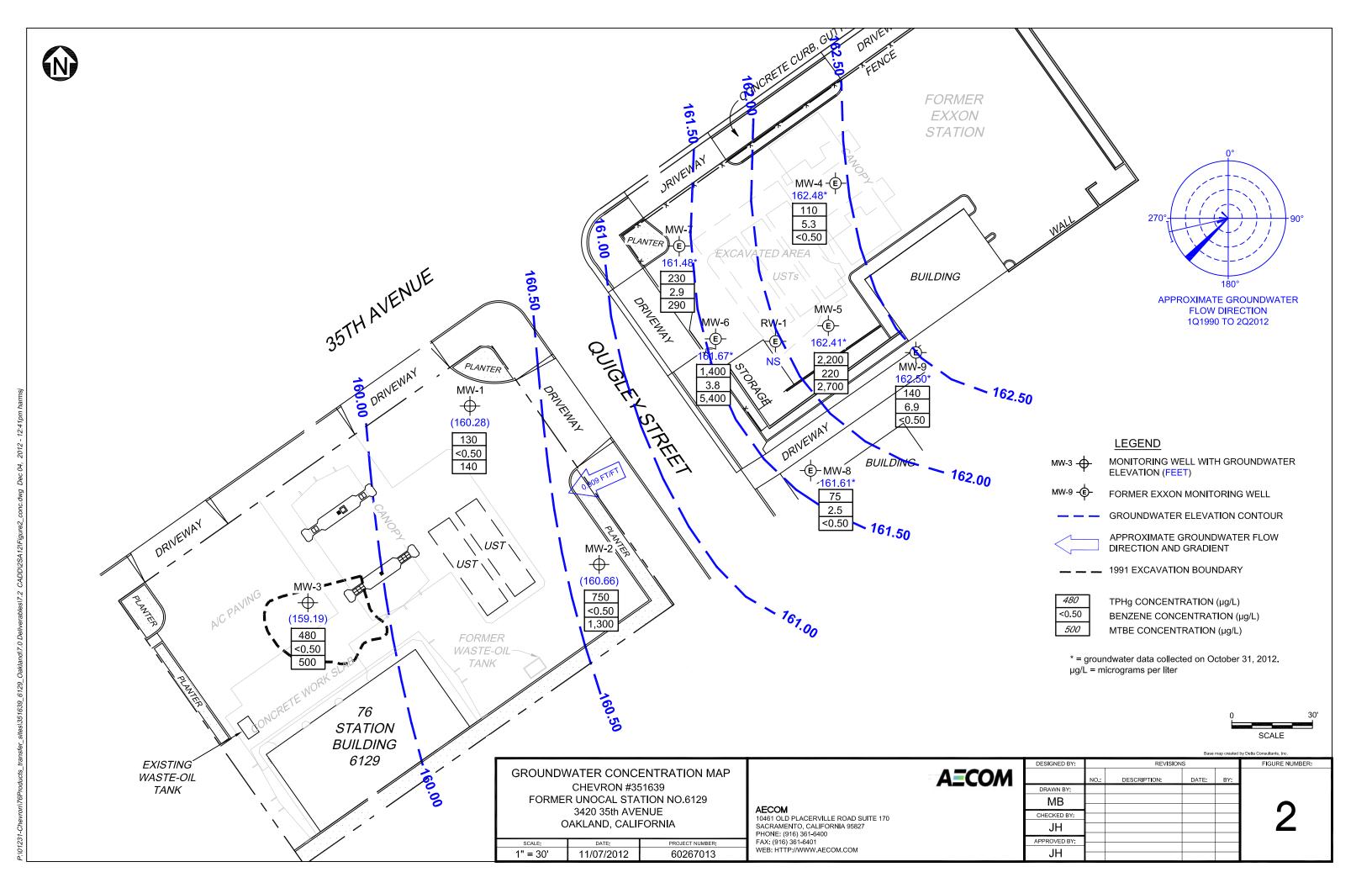
E = Ethylbenzene

X = Xylene

60267013

Figures





Attachment A

October 23, 2012 Groundwater Data Field Sheets



123 Technology Drive Irvine, California 92618

949.727.9336 PHONE 949.727.7399 FAX

www.TRCsolutions.com

DATE: November 1, 2012

TO: Jim Harms, AECOM

Unocal Site 6129 SITE:

Facility 351639 3420 35th Avenue, Oakland, CA

RE: Transmittal of Groundwater Monitoring Data

Please find attached the field data sheets, chain of custody (COC) forms, and technical services request (TSR) form for the monitoring event that was completed on October 23, 2012. Field measurements and collection of samples submitted to the laboratory were completed in general accordance with our usual groundwater monitoring protocol which is also attached for your reference.

Please call me at 949-341-7440 if you have questions.

Sincerely,

Anju Farfan

Groundwater Program Operations Manager

GENERAL FIELD PROCEDURES

Groundwater Gauging and Sampling Assignments

For each site, TRC technicians are provided with a Technical Service Request (TSR) that specifies activities required to complete the groundwater gauging and sampling assignment for the site. TSRs are based on client directives, instructions from the primary environmental consultant for the site, regulatory requirements, and TRC's previous experience with the site.

Fluid Level Measurements (Gauging)

Initial site activities include determination of well locations based on a site map provided with the TSR. Well boxes are opened and caps are removed. Indications of well or well box damage or of pressure buildup in the well are noted.

Fluid levels in each well are measured using a coated cloth tape equipped with an electronic interface probe, which distinguishes between liquid phase hydrocarbon (LPH) and water. The depth to LPH (if it is present), to water, and to the bottom of the well are measured from the top of the well casing (surveyors mark or notch if present) to the nearest 0.01 foot. Unless otherwise instructed, a well with less than 0.67 foot between the measured top of water and the measured bottom of the well casing is considered dry, and is not sampled. If the well contains 0.67 foot or more of water, an attempt is made to bail and/or sample as specified on the TSR.

Unless otherwise instructed, a well that is found to contain a measureable amount of LPH (0.01 foot) is not purged or sampled. Instead, one casing volume of fluid is bailed from the well and the well is re-sealed.

Purging and Groundwater Parameter Measurement

TSR instructions may specify that a well not be purged (no-purge sampling), be purged using low-flow methods, or be purged using conventional pump and/or bail methods. Conventional purging generally consists of pumping or bailing until a minimum of three casing volumes of water have been removed or until the well has been pumped dry. Pumping is generally accomplished using submersible electric or pneumatic diaphragm pumps. The pump intake is initially set at about 5 feet below the level of water in the casing, and is lowered as needed to compensate for falling water level. Pump depths are recorded in Field Notes.

During conventional purging, three groundwater parameters (temperature, pH, and conductivity) are measured after removal of each casing volume. Stabilization of these parameters, to within 10 percent, confirm that sufficient purging has been completed. In some cases, the TSR indicates that other parameters are also to be measured during purging. TRC commonly measures dissolved oxygen (DO), oxidation-reduction potential (ORP), and/or turbidity. Instruments used for groundwater parameter measurements are calibrated daily according to manufacturer's instructions.

Low-flow purging utilizes a bladder or peristaltic pump to remove water from the well at a low rate. Groundwater parameters specified by the TSR are measured continuously, using a flow cell, until they become stable in general accordance with EPA guidelines.

Groundwater Sample Collection

After wells are purged, or not purged, according to TSR instructions, samples are collected for laboratory analysis. For wells that have been purged using conventional pump or bail methods, sampling is conducted after the well has recovered to 80 percent of its original volume or after two hours if the well does not recover to at least 80 percent. If there is insufficient recharge of water in the well after two hours, the well is not sampled.

GENERAL FIELD PROCEDURES

Samples are collected by lowering a new, disposable polyethylene bottom-fill bailer to just below the water level in the well. The bailer is retrieved and the water sample is carefully transferred to containers specified for the laboratory analytical methods indicated by the TSR. Particular care is given to containers for volatile organic analysis (VOAs) which require filling to zero headspace and fitting with Teflon-sealed caps.

Sample containers are labeled with project number (or site number), well designation, sample date, sample time, and the sampler's initials, and placed in an insulated chest with ice. Samples remain chilled prior to and during transport to a state-certified laboratory for analysis. Sample container descriptions and requested analyses are entered onto a chain-of-custody form in order to provide instructions to the laboratory. The chain-of-custody form accompanies the samples during transportation to provide a continuous record of possession from the field to the laboratory. If a freight or overnight carrier transports the samples, the carrier is noted on the form.

For wells that have been purged using low-flow methods, sample containers are filled from the effluent stream of the bladder or peristaltic pump. In some cases, if so specified by the TSR, samples are taken from the sample ports of actively pumping remediation wells.

Sequence of Gauging, Purging and Sampling

The sequence in which monitoring activities are conducted is specified on the TSR. In general, wells are gauged beginning with the least affected well and ending with the well that has the highest concentration based on previous analytic results. After all gauging for the site is completed, wells are purged and/or sampled from the least-affected to the most-affected well. If wells must be gauged or sampled out of order, alternate interface probes and/or pumps are utilized and are noted in field documentation.

Decontamination

In order to reduce the possibility of cross contamination between wells, strict isolation and decontamination procedures are observed. Portable pumps are not used in wells with LPH. Technicians wear nitrile gloves during all gauging, purging, and sampling activities. Gloves are changed between wells and more often if warranted. Any equipment that could come in contact with fluids are either dedicated a particular well, decontaminated prior to each use, or discarded after a single use. Decontamination consists of washing in a solution of Liquinox and water and rinsing twice. The final rinse is in deionized water.

Purge Water Disposal

Purge water is generally collected in labeled drums for disposal as non-hazardous waste. Drums may be left on site for disposal by others, or transported to a collection location at a TRC field office, in either Fullerton, California or Concord, California, for eventual transfer to a licensed treatment or recycling facility. Alternatively, purge water may be collected directly from the site by a licensed vacuum truck company, or may be treated on site by an active remediation system, if so directed.

Exceptions

Additional tasks or non-standard procedures, if any, that may be requested or required for a particular site, are documented in field notes on the following pages.

FIELD MONITORING DATA SHEET

Technician:_	JOE	Job #/Task #: <u>18979/,0035, 16</u> 39	Date: _	10/23/12
Site#_	6129	Project Manager A. Fafan	Page _	<u> of </u>

Well#	TOC	Time Gauged	Total Depth	Depth to Water	Depth to Product	Product Thickness (feet)	Time Sampled	Misc. Well Notes
MW-1	Χ	0607	43,50	30,51	e-:m@emax-	Agraelania.	0727	2"
MW-3	X	0612	39.45	29.39	Albertanyor-	***************************************	0828	211
MW-2	X	0614	43.63	30,14	- missemen	and the second second	0319	2"
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FIELD DATA	COMPL	ETE ·	QA/QC		COC		ELL ROX C	ONDITION SHEETS
	···	0011114			TDAEELO	CONTROL		
MANIFEST		או ואוטאט	IVENTOR	I	INAFFIC	CONTROL	 +	



GROUNDWATER SAMPLING FIELD NOTES

	Technician:	JOE		
Site: 6129	Project No.: 19	39791.0035.1639	9	Date: 10/23/12
Well No. MW-[Purge Method:	SUB	
Depth to Water (feet): 30.6	51	Depth to Product (fe	eet):	
Total Depth (feet) 43.5	50	LPH & Water Recov	ered (gallons):	COMPANDE (FOLLOW) COMPAND COMP
Water Column (feet):i ゚゚゚ えい	99	Casing Diameter (In	iches): '	
80% Posharge Denth/feet): 33	.10	1 Well Volume (galle	ons). 3	•

Time Start	Time Stop	Pump Depth (feet)	Volume Purged (gallons)	Conductivity (µS/cm)	Temperature (F,C)	pН	D.O. (mg/L)	ORP	Turbidity
Pre-	urge						1.04	216	
0.708		36',41'	3	789.0	17.3	7.26	1,07	226	
			6	805.3	18.1	6.97	0.93	228	
	0713	43'	9	837,5	18.2	4.84	1,19	229	
Stat	ic at Time S	Sampled	Tota	al Gallons Purg	ed		Sample	Time	
	33.10		9				072	7	
omments	: Dry at	9 gals.						·	

Well No. MW-3	Purge Method: SUB
Depth to Water (feet): 29.39	Depth to Product (feet):
Total Depth (feet) 39.45	LPH & Water Recovered (gallons):
Water Column (feet): 10.06	Casing Diameter (Inches): 2"
80% Recharge Depth(feet): 31,40	1 Well Volume (gallons): 2

Time Start	Time Stop	Pump Depth (feet)	Volume Purged (gallons)	Conductivity (µS/cm)	Temperature (F(C)	pН	D.O. (mg/L)	ORP	Turbidity
Pre-	Purge						1,20	201	
074/		34"	2	473,9	17.0	7.43	1.39	205	
		39'	4	531-6	17.4	7.15	0.33	207	
	0746	V	6	550,7	17.8	7.05	1.15	209	
		+							
Stat	ic at Time S	Sampled	Tota	al Gallons Purg	ed		Sample	Time	
	16 3H-1		6				087	2-3	
		t 6 gals.							



GROUNDWATER SAMPLING FIELD NOTES

		Tec	hnician: _	JOE									
Site: 612	9		ect No.: <u>13</u>	7791.0035	1639		Date:_	10/23	112				
Well No	MW-	2		Purge Method Depth to Produ	:Si	rB							
Depth to Wa	ater (feet):_	30.14 43.63 13.49		Depth to Produ	uct (feet):	,- <u></u>							
Total Depth	(feet)	43.63		LPH & Water Recovered (gallons):									
Water Colu	mn (feet):	13.49		Casing Diameter (Inches): 2"									
80% Recha	rae Depth(f	eet): <u>32,83</u>		1 Well Volume									
00701100110	ago Bopan(r	· · · · · · · · · · · · · · · · · · ·		, , , , , , , , , , , , , , , , , , , ,	(94/-								
Time Start	Time Stop	Pump Depth (feet)	Volume Purged (gallons)	Conductivity (µS/cm)	Temperature (FC)	рН	D.O. (mg/L)	ORP	Turbidity				
Pre-F	urge						0.98	214					
0801		35'	3	837.4	17.4	6:74	-	206					
		40'	6	931.6	17.6		0.80	20/					
	0806	V	9	934.5	14.0	655	0.80	206					
Stati	l ic at Time S	ampled:	Tota	<u>l</u> al Gallons Purg	ed	<u> </u>	Sample	I : Time	<u> </u>				
O.G.	31.72		9				0819						
Comments	1												

Time Start	Time Stop	Pump Depth (feet)	Volume Purged (gallons)	Conductivity (µS/cm)	Temperature (F,C)	рН	D.O. (mg/L)	ORP	Turbidity
Pre-P	urge						_		
				<u> </u>					
							•		
								<u> </u>	<u> </u>
Stati	c at Time S	3ampled	Tota	al Gallons Purg	ed		Sample	Time	

Well No._____

Depth to Water (feet):_____

Total Depth (feet)_______
Water Column (feet):______

80% Recharge Depth(feet):_____

Purge Method:

Depth to Product (feet):_____

LPH & Water Recovered (gallons):_____

Casing Diameter (Inches):_____

1 Well Volume (gallons):_____



WELL BOX CONDITION REPORT

SITE NO. ADDRESS DATE	G1 34 10/	29 20 23/	35 12	Th :	Atte	÷			•••••••											PERFOMED BY:
Well Name	Current Well Box Size	# of Ears	# of Stripped Ears	# of Broken Ears		# of Missing Bolls	Seal Damaged	Missing Lid	Broken Lld	Well Box is Exposed	Well Box is Below Grade	Unable to Access	Unable to Locate	Foundation Damaged	Paved Over	Street Well	Saw Cul Needed	System Well	USA Marked Well	Comments
MW-1	1211	1																		
mW-3	12"	1																		
MW-3 MW-2	12"	2																		
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CHAIN OF CUSTODY FORM

Union Oil Company of California 5 6101 Bollinger Canyon Road 5 San Ramon, CA 94583

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Union Oil Site ID: 67				Union Oil Consultant: A 4	ECUM							ANAL	YSE	S RE	QUIRE	.D			
Site Global ID: アクタの	0/0/563			Consultant Contact:	n 1 cm3												Turnarou	nd Time (*	TAT);
Site Address: 3429	3 7 7	و الاستان ال		Consultant Phone No.:	9 - 30 - UML]											Standard 🖾	24 H	ours 🗆
ン タル	44 G			Sampling Company: TRC									İ			L	48 Hours 🗆	72 H	ours 🗆
Union Oil PM: メンバス	1. 2 m 201			Sampled By (PRINT):	-				į.				ļ				Specia	Instructio	ns
Union Oil PM Phone No.:	(インド //)	7-64 10		: -				2601		တ	Š								
Charge Code: NWRTB- 0	35/63	<u> </u>		Sampler Signature:	garage of the second	8015		EPA 8		ih oxy	8000								
					atories, Inc.	EPA 8	S	S by	260E	st w	$\tilde{\mathcal{D}}$				Ì				
This is a LEGAL document COMPLETELY.	. ALL fields m	nust be filled out	CORRECTLY and	4100 Atlas Court, E	er: Molly Meyers Bakersfield, CA 93308 661-327-4911	- Diesel by E	by GC/MS	BTEX/MTBE/OXYS by EPA 8260B	Ethanol by EPA 8260B	EPA 8260B Full List with OXYS	90								
	SAMPLE	ID.				- in	9-	SMT	iq lot	3260	.780		ĺ						
Field Point Name Matrix DTW (yymmdd) W-S-A 2/2/25				Sample Time	# of Containers	TPH	TPH	BTE		EPA 8	<i>tc.</i> 7						Notes	Commer	nts
NW-1	W-S-A		212/23	0727	7		\times	×	X		X		ŀ						
MW-3	W-S-A		1	0828			19.00 per miles	and death days	**************************************		}								
14 14 F	W-S-A		V	Ø 979			V	\checkmark	\		\bigvee								
	W-S-A																		
	W-S-A																		
	W-S-A																		
	W-S-A																		
	W-S-A																		
	W-S-A																		
	W-S-A																		
	W-S-A				<u> </u>														
	W-S-A											Ì							
Relinquished By Co	ompany	Date / Time:	0930	Relinquished By Cor	mpany Date / Time :				Relin	nquish	ed By		Co	mpar	ny	Dat	te / Time:		
lae el Jenn	T _i C	/2/23 [[]																	
	mpany	Date / Time:		Received By Cor	mpany Date / Time :				Rece	eived 6	 Зу		С	ompa	iny	Dat	te / Time:		
Man 3 man SolAB 11 25 12 14 X																			

TRC SOLUTIONS TECHNICAL SERVICES REQUEST FORM

17-Sep-12

Site ID: 6129 Address 3420 35th Ave. City: Oakland Cross Street: Quigley St.						189791.0035.163 Roya Kambin 925-790-6270 Jim Harms 916-361-6412	89 / 00TAC AECO		
Total number Depth to Wate	r (ft.):	28	Min. Well Diameter Max. Well Diamete Max. Well Depth (fi	r (in.): 2		# of Techs, # o Travel Time (hi Hotel Po	ʻs):	1, 3	
ACTIVITIES		Frequency	•	,	No	tes			
Gauging:	√ S	Semi Q2/Q4							
Purge/Sampling		Semi Q2/Q4							
No Purge/Samp	ole 🗌	* 125 L. L. 111 L. 1		. mai a si si ami si		•			
RELATED A	CTIVITII								
Drums:	✓								—-
Other Activities:							·		
Traffic Control:							. ,		
PERMIT INF	ORMAT								
	To the training of the second	T-1			r. 10000011 2 am. 11	The second secon			
			•			•			
NOTIFICATION AND TO SAID									
35th Ave. 76: 510-	530-3550								
1									
SITE INFORI	MATION]•							
Coordinated event			7-0234			w.c			
			each casing volume purge	d.					
		o pargo and artor	caon caong rolano pargo	w.					
	٠								
1		-							- 1

TRC SOLUTIONS TECHNICAL SERVICES REQUEST FORM

17-Sep-12

Site ID:

6129

Address

3420 35th Ave.

City:

Oakland

Cross Street: Quigley St.

Contact #:

189791.0035.1639 / 00TA01

Client:

Project No.:

Roya Kambin

PM:

925-790-6270 Jim Harms

AECOM

PM Contact #: 916-361-6412

LAB INFORMATION:

Global ID: T0600101465

Lab WO: 351639

Lab Notes: Lab analyses:

Lab Used: BC Labs

TPH-G by GC/MS, BTEX/MTBE/OXYS by 8260B, EDB/EDC by 8260B, Ethanol by 8260B [Containers: 3 voas w/HCI]

TRC SOLUTIONS

TECHNICAL SERVICES REQUEST FORM

17-Sep-12

Site ID.:

Address

6129 3420 35th Ave.

City:

Oakland

Cross Street Quigley St.

	Gauging I				1	Sam	pling		,	Field Measu	rements				
Well IDs	Benz.	MTBE	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Pre-Purge	Post-Purge	Туре	Comments	
MVV-1	0	190		V		V		✓		~	V	V	D.O., ORP	2" casing	
MW-3	0	1100		V		V		V		V	▽	✓	D.O., ORP	2" casing	
MW-2	0	1200		Y		✓		V		V	✓	V	D.O., ORP	2" casing	

Attachment B

Historic Groundwater Data

GROUNDWATER MONITORING AND SAMPLING DATA CHEVRON STATION 351639/FORMER UNOCAL 6129 3420 35TH AVENUE, OAKLAND, CALIFORNIA

				Ground-														
		TOC		Water														
Well	Date		Depth to		TPHg	TPHg	_	- ·	Ethyl-	Total								
ID	Sampled	n	Water	n	(8015)	(8260)	Benzene	Toluene	benzene	Xylenes	MTBE	TBA	ETBE	DIPE	TAME	EDB	1,2-DCA	
		(feet)	(feet)	(feet)	0	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)
MW-1	1/5/1990				ND		ND	ND	ND	ND								
	5/11/1990				ND		ND	7.10	ND	ND								
	8/9/1990				ND		ND	ND	ND	ND								
	11/14/1990				ND		ND	ND	ND	ND								
	2/12/1991				ND		0.32	ND	ND	ND								
	5/9/1991				ND		ND	ND	ND	ND								
	11/13/2003					180.00	<1.0	<1.0	<1.0	< 2.0	240.00	<200	<4.0	<4.0	<4.0	<4.0	<4.0	<1000
	8/27/2004	190.79	30.65	71.59		< 50	< 0.50	< 0.50	< 0.50	<1.0	< 0.50	< 5.0	< 0.50	<1.0	< 0.50	< 0.50	< 0.50	< 50
	11/23/2004	190.79	29.35	72.89		< 50	< 0.50	< 0.50	< 0.50	<1.0	< 0.50	< 5.0	< 0.50	<1.0	< 0.50	< 0.50	< 0.50	< 50
	2/9/2005	190.79	26.89	75.35		< 50	< 0.50	< 0.50	< 0.50	<1.0	9.30	< 5.0	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	< 50
	5/17/2005	190.79	26.56	75.68		< 50	< 0.50	< 0.50	< 0.50	<1.0	1.90	< 5.0	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	< 50
	7/27/2005	190.79	27.33	74.91		< 50	< 0.50	< 0.50	< 0.50	<1.0	< 0.50	< 5.0	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	< 50
	12/6/2005	190.79	29.59	72.65		< 50	< 0.50	0.93	< 0.50	1.80	< 0.50	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	2/21/2006	190.79	28.27	73.97		< 50	< 0.50	< 0.50	< 0.50	<1.0	2.60	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	6/8/2006	190.79	26.07	76.17		< 50	< 0.50	< 0.50	< 0.50	<1.0	11.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	9/15/2006	190.79	28.86	73.38		< 50	< 0.50	< 0.50	< 0.50	< 0.50	1.40	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	12/14/2006	190.79	29.49	72.75		< 50	< 0.50	< 0.50	< 0.50	< 0.50	3.50	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	3/28/2007	190.79	27.24	75.00		< 50	< 0.50	< 0.50	< 0.50	< 0.50	0.64	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	6/25/2007	190.79	28.30	73.94		< 50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	9/22/2007	190.79	30.61	71.63		< 50	< 0.50	< 0.50	< 0.50	< 0.50	4.10	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	12/14/2007	190.79	30.30	71.94		< 50	< 0.50	< 0.50	< 0.50	<1.0	0.65	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	3/17/2008	190.79	27.22	75.02		< 50	< 0.50	< 0.50	< 0.50	<1.0	14.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	6/20/2008	190.79	30.10	72.14		< 50	< 0.50	< 0.50	< 0.50	<1.0	11.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	9/11/2008	190.79	31.04	71.20		< 50	< 0.50	< 0.50	< 0.50	<1.0	1.30	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/25/2008	190.79	30.88	71.36		< 50	< 0.50	< 0.50	< 0.50	<1.0	5.80	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	3/9/2009	190.79	27.50	74.74		< 50	< 0.50	< 0.50	< 0.50	<1.0	25.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	5/28/2009	190.79	28.25	73.99		< 50	< 0.50	< 0.50	< 0.50	<1.0	17.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	12/11/2009	190.79	30.60	160.19		< 50	< 0.50	< 0.50	< 0.50	<1.0	18.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	5/7/2010	190.79	26.06	164.73		67.00	< 0.50	< 0.50	< 0.50	<1.0	64.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/1/2010	190.79	30.18	160.61		< 50	< 0.50	< 0.50	< 0.50	<1.0	92.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	5/27/2011	190.79	26.87	163.92		110.00	< 0.50	< 0.50	< 0.50	<1.0	220.00	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/23/2011	190.79	29.14	161.65		1101.00	< 0.50	< 0.50	< 0.50	<1.0	150.00	41.00	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	05/24/2012	190.79	26.58	164.21		140.00	< 0.50	< 0.50	< 0.50	<1.0	190.00	66.00	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	10/23/2012	190.79	30.51	160.28		130.00	<0.50	<0.50	<0.50	<1.0	140.00	47.00	<0.50	<0.50	<0.50	<0.50	<0.50	<250
MW-2	1/5/1990				ND		ND	ND	ND	ND								
	5/11/1990				ND		ND	ND	ND	ND								

CRA 060722

GROUNDWATER MONITORING AND SAMPLING DATA CHEVRON STATION 351639/FORMER UNOCAL 6129 3420 35TH AVENUE, OAKLAND, CALIFORNIA

				Ground-														
		TOC		Water														
Well	Date	Elevatio	Depth to	Elevatio	TPHg	TPHg			Ethyl-	Total								
ID	Sampled	n	Water	n	(8015)	(8260)	Benzene	Toluene	benzene	Xylenes	MTBE	TBA	ETBE	DIPE	TAME	EDB	1,2-DCA	Ethanol
	•	(feet)	(feet)	(feet)	0	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)
	8/9/1990				ND		ND	ND	ND	ND								
	11/14/1990				ND		ND	ND	ND	ND								
	2/12/1991				ND		ND	0.42	ND	0.51								
	5/9/1991				ND		ND	ND	ND	ND								
	11/13/2003					< 2000	< 20	<20	< 20	<40	2100.00	<4000	<80	<80	< 80	< 80	< 80	<20000
	8/27/2004	190.80	30.28	71.88		950	< 5.0	< 5.0	< 5.0	<10	1400	< 5.0	< 5.0	24	< 5.0	< 5.0	< 5.0	< 500
	11/23/2004	190.80	28.75	73.41		53	< 0.50	< 0.50	< 0.50	<1.0	4.2	< 5.0	< 0.50	18	< 0.50	< 0.50	< 0.50	< 50
	2/9/2005	190.80	26.08	76.08		< 500	< 0.50	< 0.50	< 0.50	<1.0	400	< 5.0	< 5.0	19	< 5.0	< 5.0	< 5.0	< 500
	5/17/2005	190.80	24.53	77.63		< 50	< 0.50	< 0.50	< 0.50	<1.0	330	< 5.0	< 0.50	12	< 0.50	< 0.50	< 0.50	< 50
	7/27/2005	190.80	27.51	74.65		< 500	< 5.0	< 5.0	< 5.0	<10	580	140	< 5.0	16	< 5.0	< 5.0	< 5.0	< 500
	12/6/2005	190.80	29.13	73.03		340	< 0.50	< 0.50	< 0.50	<1.0	780	61	< 0.50	15	< 0.50	< 0.50	< 0.50	<250
	2/21/2006	190.80	29.23	72.93		190	< 0.50	< 0.50	< 0.50	<1.0	340	<10	< 0.50	18	< 0.50	< 0.50	< 0.50	<250
	6/8/2006	190.80	25.76	76.40		< 500	< 5.0	< 5.0	< 5.0	<10	440	<100	< 5.0	14	< 5.0	< 5.0	< 5.0	<2500
	9/15/2006	190.80	29.17	72.99		< 500	< 5.0	< 5.0	< 5.0	< 5.0	570	<100	< 5.0	17	< 5.0	< 5.0	< 5.0	<2500
	12/14/2006	190.80	29.11	73.05		520	< 0.50	< 0.50	< 0.50	< 0.50	770	27	< 0.50	20	< 0.50	< 0.50	< 0.50	<250
	3/28/2007	190.80	26.68	75.48		290	< 0.50	< 0.50	< 0.50	< 0.50	460	260	< 0.50	23	< 0.50	< 0.50	< 0.50	<250
	6/25/2007	190.80	25.91	76.25		< 50	< 0.50	< 0.50	< 0.50	< 0.50	1.2	<10	< 0.50	23	< 0.50	< 0.50	< 0.50	<250
	9/22/2007	190.80	30.18	71.98		400	< 0.50	< 0.50	< 0.50	< 0.50	530	<10	< 0.50	35	< 0.50	< 0.50	< 0.50	<250
	12/14/2007	190.80	29.96	72.20		400	< 0.50	< 0.50	< 0.50	<1.0	930	48	< 0.50	24	< 0.50	< 0.50	< 0.50	<250
	3/17/2008	190.80	26.74	75.42		570	< 5.0	< 5.0	< 5.0	<10	630	<100	< 5.0	18	< 5.0	< 5.0	< 5.0	<2500
	6/20/2008	190.80	29.78	72.38		580	< 0.50	< 0.50	< 0.50	<1.0	1200	<10	< 0.50	16	< 0.50	< 0.50	< 0.50	<250
	9/11/2008	190.80	30.62	71.54		220	< 0.50	< 0.50	< 0.50	<1.0	29	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/25/2008	190.80	30.48	71.68		500	< 0.50	< 0.50	< 0.50	<1.0	1500	<10	< 0.50	19	< 0.50	< 0.50	< 0.50	<250
	3/9/2009	190.80	25.75	76.41		910	< 5.0	< 5.0	< 5.0	<10	1400	<100	< 5.0	15	< 5.0	< 5.0	< 5.0	<2500
	5/28/2009	190.80	27.71	74.45		460	< 0.50	< 0.50	< 0.50	<1.0	740	<10	< 0.50	20	< 0.50	< 0.50	< 0.50	<250
	12/11/2009	190.80	29.80	161.00		640	< 5.0	< 5.0	< 5.0	<10	1300	<100	< 5.0	19	< 5.0	< 5.0	< 5.0	<2500
	5/7/2010	190.80	25.11	165.69		600	<1.0	<1.0	<1.0	< 2.0	940	<20	<1.0	14	<1.0	<1.0	<1.0	< 500
	11/1/2010	190.80	29.90	160.90		140	< 0.50	< 0.50	< 0.50	<1.0	730	<10	< 0.50	28	< 0.50	< 0.50	< 0.50	<250
	5/27/2011	190.80	26.44	164.36		560	< 0.50	< 0.50	< 0.50	<1.0	1,100	210.00	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/23/2011	190.80	28.53	162.27		830	< 0.50	< 0.50	< 0.50	<1.0	1,500	400.00	< 0.50	9.00	< 0.50	< 0.50	< 0.50	<250
	05/24/2012	190.80	25.97	164.83		1,000	< 0.50	< 0.50	< 0.50	<1.0	1,200	430	< 0.50	8.8	< 0.50	< 0.50	< 0.50	<250
	10/23/2012	190.80	30.14	160.66		750	<0.50	<0.50	<0.50	<1.0	1,300	420	<0.50	14	<0.50	<0.50	<0.50	<250
MW-3	1/5/1990				ND		ND	ND	ND	ND								
	5/11/1990				ND		ND	ND	ND	ND								
	8/9/1990				ND		ND	ND	ND	ND								
	11/14/1990				ND		ND	ND	ND	ND								
	2/12/1991				ND		ND	ND	ND	ND								

CRA 060722

Attachment B Page 3 of 4

GROUNDWATER MONITORING AND SAMPLING DATA CHEVRON STATION 351639/FORMER UNOCAL 6129 3420 35TH AVENUE, OAKLAND, CALIFORNIA

		TOC		Ground- Water														
Well	Date		Depth to		ТРНд	ТРНд			Ethyl-	Total								
ID	Sampled	n	Water	n	(8015)	(8260)	Benzene	Toluene	benzene	Xylenes	MTBE	TBA	ETBE	DIPE	TAME	EDB	1,2-DCA	Ethanol
	•	(feet)	(feet)	(feet)	0	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)
	5/9/1991				ND		ND	ND	ND	ND								
	11/13/2003					2600	<20	<20	<20	<40	3700	<4000	<80	<80	< 80	< 80	<80	<20000
	8/27/2004	188.58	29.61	70.39		1700	<10	<10	<10	< 20	2600	<100	<10	<20	<10	<10	<10	<1000
	11/23/2004	188.58	28.48	71.52		1500	<10	<10	<10	< 20	1800	<100	<10	<20	<10	<10	<10	<1000
	2/9/2005	188.58	26.45	73.55		<1000	< 0.50	< 0.50	< 0.50	<1.0	2100	130	<10	<10	<10	<10	<10	<1000
	5/17/2005	188.58	25.61	74.39		<1000	< 0.50	< 0.50	< 0.50	<1.0	1200	<100	<10	<10	<10	<10	<10	<1000
	7/27/2005	188.58	27.35	72.65		<1000	<10	<10	<10	< 20	1400	360	<10	<10	<10	<10	<10	<1000
	12/6/2005	188.58	28.78	71.22		430	< 0.50	1.6	< 0.50	3.6	1800	160	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	2/21/2006	188.58	28.91	71.09		420	< 0.50	< 0.50	< 0.50	<1.0	1100	88	< 0.50	< 0.50	0.58	< 0.50	< 0.50	<250
	6/8/2006	188.58	25.97	74.03		<1200	<12	<12	<12	<25	1000	<250	<12	<12	<12	<12	<12	<6200
	9/15/2006	188.58	28.73	71.27		<1200	<12	<12	<12	<12	1200	<250	<12	<12	<12	<12	<12	<6200
	12/14/2006	188.58	28.62	71.38		<1000	<10	<10	<10	<10	1300	< 200	<10	<10	<10	<10	<10	< 5000
	3/28/2007	188.58	26.69	73.31		500	<1.0	<1.0	<1.0	<1.0	860	500	<1.0	<1.0	<1.0	<1.0	<1.0	< 500
	6/25/2007	188.58	26.74	73.26		270	< 0.50	< 0.50	< 0.50	< 0.50	570	11	< 0.50	< 0.50	< 0.50	< 0.50	0.65	<250
	9/22/2007	188.58	29.57	70.43		500	< 0.50	< 0.50	< 0.50	< 0.50	980	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	12/14/2007	188.58	29.30	70.70		270	< 0.50	< 0.50	< 0.50	<1.0	570	26	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	3/17/2008	188.58	26.82	73.18		220	< 0.50	< 0.50	< 0.50	<1.0	520	<10	< 0.50	< 0.50	< 0.50	< 0.50	0.65	<250
	6/20/2008	188.58	29.10	70.90		490	< 0.50	< 0.50	< 0.50	<1.0	1300	49	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	9/11/2008	188.58	29.89	70.11		630	< 5.0	< 5.0	< 5.0	<10	1200	<100	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	<2500
	11/25/2008	188.58	29.74	70.26		380	< 0.50	< 0.50	< 0.50	<1.0	870	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	3/9/2009	188.58	25.56	74.44		310	< 0.50	< 0.50	< 0.50	<1.0	720	15	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	5/28/2009	188.58	27.55	72.45		410	< 0.50	< 0.50	< 0.50	<1.0	750	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	12/11/2009	188.58	29.10	159.48		220	< 0.50	< 0.50	< 0.50	<1.0	620	63	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	5/7/2010	188.58	25.72	162.86		360	< 0.50	< 0.50	< 0.50	<1.0	660	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	11/1/2010	188.58	29.29	159.29		120	< 0.50	< 0.50	< 0.50	<1.0	490	<10	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	5/27/2011	188.58	26.53	162.05		340	< 0.50	< 0.50	< 0.50	<1.0	890	73.00	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	05/24/2012	188.58	25.95	162.63		660	< 0.50	< 0.50	< 0.50	<1.0	1,100	300	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50	<250
	10/23/2012	188.58	29.39	159.19		480	<0.50	<0.50	<0.50	<1.0	500	160	<0.50	<0.50	<0.50	<0.50	<0.50	<250

Abbreviations and Notes:

TOC = Top of casing

 μ g/L = Micrograms per liter

TPHg = Total petroleum hydrocarbons as gasoline by EPA Method 8015 and 8260

Benzene, toluene, ethylbenzene, and total xylenes by EPA Method 8260B

MTBE = Methyl tertiary butyl ether by EPA Method 8260B

TBA= tertiary butyl alcohol by EPA Method 8260B

DIPE= di-isopropyl ether by EPA Method 8260B

Attachment B Page 4 of 4

GROUNDWATER MONITORING AND SAMPLING DATA CHEVRON STATION 351639/FORMER UNOCAL 6129 3420 35TH AVENUE, OAKLAND, CALIFORNIA

				Ground-														
		TOC		Water														
Well	Date	Elevatio	Depth to	Elevatio	ТРНд	ТРНд			Ethyl-	Total								
ID	Sampled	n	Water	n	(8015)	(8260)	Benzene	Toluene	benzene	Xylenes	MTBE	TBA	ETBE	DIPE	TAME	EDB	1,2-DCA	Ethanol
		(feet)	(feet)	(feet)	0	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)	(μg/l)

ETBE= ethyl tertiary butyl ether by EPA Method 8260B TAME= tertiary amyl methyl ether by EPA Method 8260B 1,2-DCA= 1,2-Dichloroethane by EPA Method 8260B EDB= 1,2-Dibromoethane by EPA Method 8260B Lead = Total lead by Method 6010 Ethanol by EPA Method 8260B

^{-- =} Not available / not applicable

x = Not detected at or above laboratory method detection limit indicated

ND = Not detected, detection limit not known

^{1 =} TPHg does not exhibit a "gasoline" pattern, is entirely due to MTBE

Attachment C

BC Laboratories Analytical Report



Date of Report: 10/30/2012

Jim Harms

AECOM 10461 Old Placerville Rd, Suite 170 Sacramento, CA 95827

6129 Project: 1220465 BC Work Order: B133091 Invoice ID:

Enclosed are the results of analyses for samples received by the laboratory on 10/23/2012. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Contact Person: Molly Meyers

molly meyers

Client Service Rep

Authorized Signature

Certifications: CA ELAP #1186; NV #CA00014



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ω

Laboratories,

Inc.

Environmental Testing Laboratory Since 1949

Chain of Custody and Cooler Receipt Form for 1220465

Page 1 of 2

BCLAB Company

10.23.12 2130

Received By

18:30

10-23-12

12-204105

10-23-12 1430

CHAIN OF CUSTODY FORM

	29			Union Oll Consultant: A	ECOM							ANA	LYSES	REQU	IRED		
Site Global ID: 7060	010146	5		Consultant Contact: Ji	n Harms											Turnaround	Time (TAT):
ilte Address: 3420 3 Oak	35 TH,	Aue,		Consultant Phone No.: 97	6-361-6412											Standard 2	24 Hours I
oak	land			Sampling Company: TRC		1								ı		48 Hours □	72 Hours
Jnlon Oil PM: Roya	Kambir	1		Sampled By (PRINT):	F / FUTC			м				İ				Special in	structions
Jnlon Oil PM Phone No.:	125-79	10-6270		302	LLWIS	-		82608		Ś	8	l					
Charge Code: NWRTB- 0	3516	3 <u>9</u> -0- LAB		Sampler Signature:	D. Sein	3015		EPA	_	ili OX	8560B						
				BC Labor	atories, inc.	8	<u>n</u>	(S b)	260E	ist w	Ŕ		- 1	ŀ			
This is a LEGAL document COMPLETELY.	t. <u>ALL</u> fields	must be filled ou	it CORRECTLY and	4100 Atlas Court, E	er: Molly Meyers Bakersfield, CA 93308 661-327-4911	Diesel by EPA 8015	by GC/MS	BTEX/MTBE/OXYS by	Ethanol by EPA 8260B	EPA 8260B Full List with OXYS	E08/E0C						
	SAMPL	E ID				ᄚ	G _b	CIMIT	ام بو اه	3260	7						
Field Point Name	Matrix	DTW	Date (yymmdd)	Sample Time	# of Containers	TPH.	H	BTE		EPA						Notes / C	omments
MW-1	Ø-S-A	-1	12/10/23	0727	3		χ,	Χ.	X		X						
MW-3	W-S-A	- ク	1 . 1	0828													
MW-2-	W-S-A	-3	V	0819	V		→	\downarrow									
	W-S-A																
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	W-S-A												5	1/2			
	W-S-A											71			st	B-OUT 🗀]
·	W-S-A																
	W-S-A																
	W-S-A																
Relinquished By Co	ompany	Date / Time	: 0930	1 1 ' '	mpany Date / Time :			_	Relin	quish	ed By		Com	pany	ı	Date / Time:	

BCLAB



Chain of Custody and Cooler Receipt Form for 1220465 Page 2 of 2

BC LABORATORIES INC. COOLER RECEIPT FORM Rev. No. 13 08/17/12 Page 1 Of 1													
Submission #: 12-20468	,												
SHIPPING INFORI Federal Express UPS BC Lab Field Service Other		very 🗆			lce Chest Box			AINER er ∐ (Spe	cify)				
Refrigerant: Ice D Blue Ice D	None	• □	Other 🗆	Comm	ents:								
Custody Seals Ice Chest I	Contain	I	None	Comr	nents:								
All samples received? Yes Ø No □	All samples	containers	intact? Y	es 🖸 No l	3	Descript	ion(s) matc	h COC? Ye	95 B No [.			
∥ #/v⊑e ⊓NO i					Thermom			Date/Fimi Analyst Ir	10-23.	⁷ 9130 -i⊃			
- SAMPLE NUMBERS													
SAMPLE CONTAINERS	,	2	3	- 4	5	6	7	a	9	10			
OT GENERAL MINERAL/ GENERAL PHYSICAL													
PT PE UNPRESERVED													
QT INORGANIC CHEMICAL METALS								<u> </u>					
PT INORGANIC CHEMICAL METALS				<u> </u>									
PT CYANIDE PT NITROGEN FORMS			•				-						
PT TOTAL SULFIDE													
202. NITRATE / NITRITE													
PT TOTAL ORGANIC CARBON													
PT TOX													
PT CHEMICAL OXYGEN DEMAND													
PIA PHENOLICS													
40ml VOA VIAL TRAVEL BLANK	- 0 0	.0.0	0.0							<u> </u>			
40ml VOA VIAL	F/13	A 3	115	1	*** . []		1	t 1	1	- ' '			
OT EPA 413.1, 413.2, 418.1	·			<u> </u>									
PT ODOR RADIOLOGICAL		· ·			 	 							
BACTERIOLOGICAL				<u> </u>				 					
40 ml VOA VIAL- 504	 			1 .			T						
QT EPA 508/608/8080		İ							<u> </u>				
QT EPA 515. L/8150	1				<u> </u>								
QT EPA 525													
QT EPA 525 TRAVEL BLANK													
100ml EPA 547	<u> </u>							<u> </u>	ļ. <u>.</u>				
100ml EPA 531.1						<u> </u>							
QT EPA 548	<u> </u>						ļ			1			
QT El'A 549	ļ			 	ļ	<u> </u>	<u> </u>	 -	ļ	 			
QT EPA 632			<u> </u>						 				
QT EPA 8015M	1	ļ				ļ	-	ļ	<u> </u>				
QT AMBER	1		 -	1		<u> </u>	1	 	 				
8 OZ. JAR	-				<u>-</u>		 	 	 	-			
32 OZ. JAR SOIL SLEEVE		 		1			-	 	-	1			
PCB VIAL	 				-					$+-\parallel$			
PLASTIC BAG		·		-									
FERROUS IRON										<u> </u>			
ENCORE	1			1				1					
SMART KET	1								1	 			
Comments:	-!		d	, 1									
Sample Numbering Completed By: A = Actual / C = Corrected	مال	W Dat	e/Time: _(0 (23/12		40							

10461 Old Placerville Rd, Suite 170

Sacramento, CA 95827

Reported: 10/30/2012 16:04

Project Number: 351639
Project Manager: Jim Harms

Laboratory / Client Sample Cross Reference

Laboratory Client Sample Information

1220465-01 COC Number:

Project Number: 6129
Sampling Location: ---

Sampling Point: MW-1-W-121023

Sampled By: TRCI

Receive Date: 10/23/2012 21:30 **Sampling Date:** 10/23/2012 07:27

Sample Depth: ---Lab Matrix: Water

Sample Type: Groundwater

Delivery Work Order: Global ID: T0600101465 Location ID (FieldPoint): MW-1

Matrix: W

Sample QC Type (SACode): CS

10/23/2012 21:30

Cooler ID:

Receive Date:

1220465-02 COC Number: ---

Project Number: 6129 Sampling Location: ---

Sampling Point: MW-3-W-121023

TRCI

Sampled By:

 Sampling Date:
 10/23/2012 08:28

 Sample Depth:
 --

Lab Matrix: Water
Sample Type: Groundwater

Delivery Work Order: Global ID: T0600101465 Location ID (FieldPoint): MW-3

Matrix: W

Sample QC Type (SACode): CS

Cooler ID:

1220465-03 COC Number: --

Project Number: 6129
Sampling Location: ---

Sampling Point: MW-2-W-121023

Sampled By: TRCI

Receive Date: 10/23/2012 21:30

Sampling Date: 10/23/2012 08:19

Sample Depth: --Lab Matrix: Water
Sample Type: Groundwater

Delivery Work Order: Global ID: T0600101465 Location ID (FieldPoint): MW-2

Matrix: W

Sample QC Type (SACode): CS

Cooler ID:

10461 Old Placerville Rd, Suite 170 Sacramento, CA 95827

Reported: 10/30/2012 16:04

Project Number: 351639
Project Manager: Jim Harms

Volatile Organic Analysis (EPA Method 8260)

BCL Sample ID: 1220465-0	1 Client Sampl	e Name:	6129, MW-1-W-121	023, 10/23/2012	7:27:00AM		
Constituent	Result	Units	PQL	Method	MB Bias	Lab	Dun #
Benzene	ND	ug/L	0.50	EPA-8260B	ND ND	Quals	Run #
1,2-Dibromoethane	ND		0.50	EPA-8260B	ND		•
·		ug/L					1
1,2-Dichloroethane	ND	ug/L	0.50	EPA-8260B	ND		1
Ethylbenzene	ND	ug/L	0.50	EPA-8260B	ND		1
Methyl t-butyl ether	140	ug/L	2.5	EPA-8260B	ND	A01	2
Toluene	ND	ug/L	0.50	EPA-8260B	ND		1
Total Xylenes	ND	ug/L	1.0	EPA-8260B	ND		1
t-Amyl Methyl ether	ND	ug/L	0.50	EPA-8260B	ND		1
t-Butyl alcohol	47	ug/L	10	EPA-8260B	ND		1
Diisopropyl ether	ND	ug/L	0.50	EPA-8260B	ND		1
Ethanol	ND	ug/L	250	EPA-8260B	ND		1
Ethyl t-butyl ether	ND	ug/L	0.50	EPA-8260B	ND		1
Total Purgeable Petroleum Hydrocarbons	130	ug/L	50	Luft-GC/MS	ND	A90	1
1,2-Dichloroethane-d4 (Surrogate)	106	%	75 - 125 (LCL - UCL)	EPA-8260B			1
1,2-Dichloroethane-d4 (Surrogate)	97.1	%	75 - 125 (LCL - UCL)	EPA-8260B			2
Toluene-d8 (Surrogate)	91.0	%	80 - 120 (LCL - UCL)	EPA-8260B			1
Toluene-d8 (Surrogate)	94.6	%	80 - 120 (LCL - UCL)	EPA-8260B			2
4-Bromofluorobenzene (Surrogate)	91.7	%	80 - 120 (LCL - UCL)	EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	89.4	%	80 - 120 (LCL - UCL)	EPA-8260B			2

			Run				QC
Run#	Method	Prep Date	Date/Time	Analyst	Instrument	Dilution	Batch ID
1	EPA-8260B	10/26/12	10/26/12 11:28	JMC	MS-V12	1	BVJ2187
2	EPA-8260B	10/26/12	10/29/12 14:10	JMC	MS-V12	5	BVJ2187

10461 Old Placerville Rd, Suite 170 Sacramento, CA 95827

Reported: 10/30/2012 16:04

Project Number: 351639
Project Manager: Jim Harms

Volatile Organic Analysis (EPA Method 8260)

BCL Sample ID:	1220465-02	Client Sampl	e Name:	6129, MW-3-W-121	023, 10/23/2012	8:28:00AM		
Constituent		Result	Units	PQL	Method	MB Bias	Lab Quals	Run #
Benzene		ND	ug/L	0.50	EPA-8260B	ND	-	1
1,2-Dibromoethane		ND	ug/L	0.50	EPA-8260B	ND		1
1,2-Dichloroethane		ND	ug/L	0.50	EPA-8260B	ND		1
Ethylbenzene		ND	ug/L	0.50	EPA-8260B	ND		1
Methyl t-butyl ether		500	ug/L	12	EPA-8260B	ND	A01	2
Toluene		ND	ug/L	0.50	EPA-8260B	ND		1
Total Xylenes		ND	ug/L	1.0	EPA-8260B	ND		1
t-Amyl Methyl ether		ND	ug/L	0.50	EPA-8260B	ND		1
t-Butyl alcohol		160	ug/L	10	EPA-8260B	ND		1
Diisopropyl ether		ND	ug/L	0.50	EPA-8260B	ND		1
Ethanol		ND	ug/L	250	EPA-8260B	ND		1
Ethyl t-butyl ether		ND	ug/L	0.50	EPA-8260B	ND		1
Total Purgeable Petroleu Hydrocarbons	m	480	ug/L	50	Luft-GC/MS	ND	A90	1
1,2-Dichloroethane-d4 (Su	ırrogate)	103	%	75 - 125 (LCL - UCL)	EPA-8260B			1
1,2-Dichloroethane-d4 (Su	ırrogate)	96.1	%	75 - 125 (LCL - UCL)	EPA-8260B			2
Toluene-d8 (Surrogate)		85.6	%	80 - 120 (LCL - UCL)	EPA-8260B			1
Toluene-d8 (Surrogate)		95.4	%	80 - 120 (LCL - UCL)	EPA-8260B			2
4-Bromofluorobenzene (S	urrogate)	87.2	%	80 - 120 (LCL - UCL)	EPA-8260B			1
4-Bromofluorobenzene (S	urrogate)	91.5	%	80 - 120 (LCL - UCL)	EPA-8260B			2

			Run				QC		
Run#	Method	Prep Date	Date/Time	Analyst	Instrument	Dilution	Batch ID		
1	EPA-8260B	10/26/12	10/26/12 11:10	JMC	MS-V12	1	BVJ2187		
2	EPA-8260B	10/26/12	10/29/12 13:52	JMC	MS-V12	25	BVJ2187		

10461 Old Placerville Rd, Suite 170

Sacramento, CA 95827

10/30/2012 16:04 Reported:

Project: 6129 Project Number: 351639 Project Manager: Jim Harms

Volatile Organic Analysis (EPA Method 8260)

BCL Sample ID:	1220465-03	Client Sampl	e Name:	6129, MW-2-W-121	023, 10/23/2012	8:19:00AM		
Constituent		Result	Units	PQL	Method	MB Bias	Lab Quals	Run#
Benzene		ND	ug/L	0.50	EPA-8260B	ND		1
1,2-Dibromoethane		ND	ug/L	0.50	EPA-8260B	ND		1
1,2-Dichloroethane		ND	ug/L	0.50	EPA-8260B	ND		1
Ethylbenzene		ND	ug/L	0.50	EPA-8260B	ND		1
Methyl t-butyl ether		1300	ug/L	25	EPA-8260B	ND	A01	2
Toluene		ND	ug/L	0.50	EPA-8260B	ND		1
Total Xylenes		ND	ug/L	1.0	EPA-8260B	ND		1
t-Amyl Methyl ether		ND	ug/L	0.50	EPA-8260B	ND		1
t-Butyl alcohol		410	ug/L	10	EPA-8260B	ND		1
Diisopropyl ether		14	ug/L	0.50	EPA-8260B	ND		1
Ethanol		ND	ug/L	250	EPA-8260B	ND		1
Ethyl t-butyl ether		ND	ug/L	0.50	EPA-8260B	ND		1
Total Purgeable Petroleu Hydrocarbons	ım	750	ug/L	50	Luft-GC/MS	ND	A90	1
1,2-Dichloroethane-d4 (Su	urrogate)	106	%	75 - 125 (LCL - UCL)	EPA-8260B			1
1,2-Dichloroethane-d4 (Su	urrogate)	105	%	75 - 125 (LCL - UCL)	EPA-8260B			2
Toluene-d8 (Surrogate)		91.4	%	80 - 120 (LCL - UCL)	EPA-8260B			1
Toluene-d8 (Surrogate)		91.9	%	80 - 120 (LCL - UCL)	EPA-8260B			2
4-Bromofluorobenzene (S	surrogate)	89.6	%	80 - 120 (LCL - UCL)	EPA-8260B			1
4-Bromofluorobenzene (S	surrogate)	90.7	%	80 - 120 (LCL - UCL)	EPA-8260B			2

			Run				QC		
Run#	Method	Prep Date	Date/Time	Analyst	Instrument	Dilution	Batch ID		
1	EPA-8260B	10/26/12	10/26/12 10:53	JMC	MS-V12	1	BVJ2187		
2	EPA-8260B	10/26/12	10/29/12 13:35	JMC	MS-V12	50	BVJ2187		

Environmental resumg Easteracty Sines 10.10

AECOM

10461 Old Placerville Rd, Suite 170 Sacramento, CA 95827

Reported: 10/30/2012 16:04

Project: 6129

Project Number: 351639
Project Manager: Jim Harms

Volatile Organic Analysis (EPA Method 8260)

Quality Control Report - Method Blank Analysis

Constituent	QC Sample ID	MB Result	Units	PQL	MDL	Lab Quals
QC Batch ID: BVJ2187						
Benzene	BVJ2187-BLK1	ND	ug/L	0.50		
1,2-Dibromoethane	BVJ2187-BLK1	ND	ug/L	0.50		
1,2-Dichloroethane	BVJ2187-BLK1	ND	ug/L	0.50		
Ethylbenzene	BVJ2187-BLK1	ND	ug/L	0.50		
Methyl t-butyl ether	BVJ2187-BLK1	ND	ug/L	0.50		
Toluene	BVJ2187-BLK1	ND	ug/L	0.50		
Total Xylenes	BVJ2187-BLK1	ND	ug/L	1.0		
t-Amyl Methyl ether	BVJ2187-BLK1	ND	ug/L	0.50		
t-Butyl alcohol	BVJ2187-BLK1	ND	ug/L	10		
Diisopropyl ether	BVJ2187-BLK1	ND	ug/L	0.50		
Ethanol	BVJ2187-BLK1	ND	ug/L	250		
Ethyl t-butyl ether	BVJ2187-BLK1	ND	ug/L	0.50		
Total Purgeable Petroleum Hydrocarbons	BVJ2187-BLK1	ND	ug/L	50		
1,2-Dichloroethane-d4 (Surrogate)	BVJ2187-BLK1	97.3	%	75 - 125	(LCL - UCL)	
Toluene-d8 (Surrogate)	BVJ2187-BLK1	98.0	%	80 - 120	(LCL - UCL)	
4-Bromofluorobenzene (Surrogate)	BVJ2187-BLK1	96.6	%	80 - 120	(LCL - UCL)	

AECOM

10461 Old Placerville Rd, Suite 170 Sacramento, CA 95827

10/30/2012 16:04 Reported:

Project: 6129

Project Number: 351639 Project Manager: Jim Harms

Volatile Organic Analysis (EPA Method 8260)

Quality Control Report - Laboratory Control Sample

								Control I	imits	
O and the sect	00.0	-	D 16	Spike	1114	Percent	DDD	Percent		Lab
Constituent	QC Sample ID	Туре	Result	Level	Units	Recovery	RPD	Recovery	RPD	Quals
QC Batch ID: BVJ2187										
Benzene	BVJ2187-BS1	LCS	28.500	25.000	ug/L	114		70 - 130		
Toluene	BVJ2187-BS1	LCS	27.280	25.000	ug/L	109		70 - 130		
1,2-Dichloroethane-d4 (Surrogate)	BVJ2187-BS1	LCS	9.9800	10.000	ug/L	99.8		75 - 125		
Toluene-d8 (Surrogate)	BVJ2187-BS1	LCS	10.110	10.000	ug/L	101		80 - 120		
4-Bromofluorobenzene (Surrogate)	BVJ2187-BS1	LCS	9.9900	10.000	ug/L	99.9		80 - 120		

AECOM

10461 Old Placerville Rd, Suite 170 Sacramento, CA 95827

Reported: 10/30/2012 16:04

Project Number: 351639
Project Manager: Jim Harms

Volatile Organic Analysis (EPA Method 8260)

Quality Control Report - Precision & Accuracy

		•		•			•	•			
								Control Limits			
		Source	Source		Spike			Percent		Percent	Lab
Constituent	Type	Sample ID	Result	Result	Added	Units	RPD	Recovery	RPD	Recovery	Quals
QC Batch ID: BVJ2187	Use	ed client samp	ole: N								
Benzene	MS	1220293-01	ND	25.350	25.000	ug/L		101		70 - 130	
	MSD	1220293-01	ND	26.980	25.000	ug/L	6.2	108	20	70 - 130	
Toluene	MS	1220293-01	ND	23.350	25.000	ug/L		93.4		70 - 130	
	MSD	1220293-01	ND	25.440	25.000	ug/L	8.6	102	20	70 - 130	
1,2-Dichloroethane-d4 (Surrogate)	MS	1220293-01	ND	9.8100	10.000	ug/L		98.1		75 - 125	
	MSD	1220293-01	ND	9.8400	10.000	ug/L	0.3	98.4		75 - 125	
Toluene-d8 (Surrogate)	MS	1220293-01	ND	9.6100	10.000	ug/L		96.1		80 - 120	
	MSD	1220293-01	ND	9.6100	10.000	ug/L	0	96.1		80 - 120	
4-Bromofluorobenzene (Surrogate)	MS	1220293-01	ND	9.4100	10.000	ug/L		94.1		80 - 120	
	MSD	1220293-01	ND	9.4300	10.000	ug/L	0.2	94.3		80 - 120	

AECOM

10461 Old Placerville Rd, Suite 170

Sacramento, CA 95827

Reported: 10/30/2012 16:04

Project: 6129

Project Number: 351639 Project Manager: Jim Harms

Notes And Definitions

MDL Method Detection Limit

ND Analyte Not Detected at or above the reporting limit

PQL Practical Quantitation Limit RPD Relative Percent Difference

PQL's and MDL's are raised due to sample dilution. A01

TPPH does not exhibit a "gasoline" pattern. TPPH is entirely due to MTBE. A90

Attachment D

Former Exxon Station Groundwater Data

Former Exxon Service Station 70234 3450 35th Avenue Oakland, California

MW1	ell ID	Sampling Date	Depth (feet)	TOC Elev. (feet)	DTW (feet)	GW Elev. (feet)	NAPL (feet)	TPHg (μg/L)	MTBE (μg/L)	B (µg/L)	Τ (μg/L)	E (µg/L)	Χ (μg/L)	Total Pb (μg/L)	Organic Pb (mg/L)
MW1 07/17/92 192.00 33.02 158.98 No 67 6.6 6.9 2.0 4.5 MW1 1022/92 192.00 34.07 157.93 No <50	nitoring	y Well Samples	:												
MW1 10/22/92 192.00 34.07 157.93 No <50 2.9 <0.5 <0.5 <0.5 MW1 02/04/93 192.00 29.43 162.57 No <50 0.8 <0.5 <0.5 <0.5 MW1 05/03/93 192.00 32.95 159.05 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	W1	07/15/92			Well installe	ed.									
MW1 02/04/93 192.00 29.43 162.57 No < 50 0.8 < 0.5 < 0.5 < 0.5 MW1 05/03/93 192.00 29.72 162.28 No 71 2.8 7.2 2.2 22 22 MW1 07/30/93 192.00 34.34 157.66 No < 50 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5 < 0.5	V1	07/17/92		192.00	33.02	158.98	No	67		6.6	6.9	2.0	4.5	17	
MW1 05/03/93 192.00 29.72 162.28 No 71 2.8 7.2 2.2 22 MW1 07/30/93 192.00 32.95 159.05 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0	V1	10/22/92			34.07	157.93	No	<50		2.9		<0.5		16	
MW1 07/30/93 192.00 32.95 159.05 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	02/04/93		192.00	29.43	162.57	No	<50		0.8	<0.5	<0.5	<0.5	4	
MW1 10/19/93 192.00 34.34 157.66 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	05/03/93		192.00	29.72	162.28	No	71		2.8	7.2	2.2	22	40	
MW1 02/23/94 192.00 31.72 160.28 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	07/30/93		192.00	32.95	159.05	No	<50		<0.5	<0.5	<0.5	<0.5	5	
MW1 06/06/94 192.00 31.77 160.23 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	10/19/93		192.00	34.34	157.66	No	<50		<0.5	<0.5	<0.5	<0.5	12	
MW1 08/18/94 192.00 33.76 158.24 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	02/23/94		192.00	31.72	160.28	No	<50		< 0.5	< 0.5	< 0.5	< 0.5	4	
MW1 11/15/94 192.00 34.08 157.92 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	06/06/94		192.00	31.77	160.23	No	<50		< 0.5	<0.5	< 0.5	< 0.5	<3	
MW1 02/06/95 192.00 28.50 163.50 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	08/18/94		192.00	33.76	158.24	No	<50		< 0.5	< 0.5	< 0.5	< 0.5	130	
MW1 05/10/95 192.00 29.30 162.70 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	11/15/94		192.00	34.08	157.92	No	<50		< 0.5	<0.5	< 0.5	< 0.5	<3.0	<100
MW1 09/20/99 192.00 33.30 158.70 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	02/06/95		192.00	28.50	163.50	No	<50		< 0.5	< 0.5	< 0.5	< 0.5		
MW1 Well destroyed in June 2000. MW2 07/15/92 Well installed. MW2 07/17/92 194.85 34.65 160.20 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	05/10/95		192.00	29.30	162.70	No	<50		< 0.5	< 0.5	< 0.5	< 0.5		
MW2 07/15/92 194.85 34.65 160.20 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	V1	09/20/99		192.00	33.30	158.70	No	<50	<0.5	< 0.5	<0.5	< 0.5	< 0.5	<75	<50
MW2 07/17/92 194.85 34.65 160.20 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	W1	Well destroyed	d in June 2000.												
MW2 10/22/92 194.85 35.64 159.21 No <50 <0.5 <0.5 <0.5 MW2 02/04/93 194.85 31.13 163.72 No <50	W2	07/15/92			Well installe	ed.									
MW2 02/04/93 194.85 31.13 163.72 No <50 <0.5 <0.5 <0.5 <0.5 MW2 05/03/93 194.85 31.08 163.77 No <50	W2	07/17/92		194.85	34.65	160.20	No	<50		<0.5	<0.5	<0.5	<0.5	<3	
MW2 05/03/93 194.85 31.08 163.77 No <50 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5 <0.5	W2	10/22/92		194.85	35.64	159.21	No	<50		<0.5	<0.5	<0.5	<0.5		
MW2 07/30/93 194.85 34.34 160.51 No <50 <0.5 <0.5 <0.5 <0.5 MW2 10/19/93 194.85 36.00 158.85 No <50	W2	02/04/93		194.85	31.13	163.72	No	<50		<0.5	<0.5	<0.5	<0.5	<3	
MW2 10/19/93 194.85 36.00 158.85 No <50 <0.5 <0.5 <0.5 <0.5 MW2 02/23/94 194.85 33.92 160.93 No <50	W2	05/03/93		194.85	31.08	163.77	No	<50		<0.5	<0.5	<0.5	<0.5	3	
MW2 02/23/94 194.85 33.92 160.93 No <50 <0.5 <0.5 <0.5 <0.5 MW2 06/06/94 194.85 33.50 161.35 No <50	W2	07/30/93		194.85	34.34	160.51	No	<50		<0.5	<0.5	<0.5	<0.5	14	
MW2 06/06/94 194.85 33.50 161.35 No <50 <0.5 <0.5 <0.5 <0.5 MW2 08/18/94 194.85 35.38 159.47 No <50	W2	10/19/93		194.85	36.00	158.85	No	<50		<0.5	<0.5	<0.5	<0.5	<3	
MW2 08/18/94 194.85 35.38 159.47 No <50 <0.5 <0.5 <0.5 <0.5 MW2 11/15/94 194.85 35.93 158.92 No <50	W2	02/23/94		194.85	33.92	160.93	No	<50		<0.5	<0.5	<0.5	<0.5	<3	
MW2 11/15/94 194.85 35.93 158.92 No <50 <0.5 <0.5 <0.5 <0.5 MW2 02/06/95 194.85 30.38 164.47 No <50	W2	06/06/94		194.85	33.50	161.35	No	<50		<0.5	<0.5	<0.5	<0.5	<3	
MW2 02/06/95 194.85 30.38 164.47 No <50 <0.5 <0.5 <0.5 <0.5 MW2 05/10/95 194.85 30.77 164.08 No <50	V2	08/18/94		194.85	35.38	159.47	No	<50		< 0.5	< 0.5	< 0.5	< 0.5	<3.0	
MW2 05/10/95 194.85 30.77 164.08 No <50 <0.5 <0.5 <0.5 <0.5 MW2 09/20/99 194.85 35.15 159.70 No <50 <0.5 <0.5 <0.5 <0.5 <0.5	V2	11/15/94		194.85	35.93	158.92	No	<50		< 0.5	< 0.5	< 0.5	< 0.5	<3.0	<100
MW2 09/20/99 194.85 35.15 159.70 No <50 <0.5 <0.5 <0.5 <0.5	V2	02/06/95		194.85	30.38	164.47	No	<50		< 0.5	< 0.5	< 0.5	< 0.5		
	V2	05/10/95		194.85	30.77	164.08	No	<50		< 0.5	<0.5	< 0.5	< 0.5		
MW2 Well destroyed in June 2000.	V2	09/20/99		194.85	35.15	159.70	No	<50	<0.5	< 0.5	< 0.5	< 0.5	< 0.5	<75	<0.5
	W2	Well destroyed	d in June 2000.												
MW3 07/15/92 Well installed.	N3	07/15/92			Well installe	ed.									
MW3 07/17/92 196.90 37.24 159.66 No <50 <0.5 <0.5 <0.5	V3	07/17/92		196.90	37.24	159.66	No	<50		<0.5	<0.5	<0.5	<0.5	50	
MW3 10/22/92 196.90 35.95 160.95 No <50 <0.5 <0.5 <0.5	V3	10/22/92		196.90	35.95	160.95	No	<50		<0.5	<0.5	<0.5	<0.5	9	
MW3 02/04/93 196.90 29.85 167.05 No <50 <0.5 <0.5 <0.5	V3	02/04/93		196.90	29.85	167.05	No	<50		< 0.5	<0.5	<0.5	<0.5	<3	
MW3 05/03/93 196.90 29.87 167.03 No <50 <0.5 <0.5 <0.5	N3	05/03/93		196.90	29.87	167.03	No	<50		<0.5	<0.5	<0.5	<0.5	3	

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Well ID	Sampling Date	Depth (feet)	TOC Elev. (feet)	DTW (feet)	GW Elev. (feet)	NAPL (feet)	TPHg (µg/L)	MTBE (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	Χ (μg/L)	Total Pb (μg/L)	Organic Pb (mg/L)
MW3	07/30/93		196.90	33.85	163.05	No	<50		<0.5	<0.5	<0.5	<0.5	22	
MW3	10/19/93		196.90	35.89	161.01	No	<50		< 0.5	<0.5	< 0.5	< 0.5	12	
MW3	02/23/94		196.90	32.88	164.02	No	<50		< 0.5	< 0.5	<0.5	<0.5	25	
MW3	06/06/94		196.90	32.40	164.50	No	<50		< 0.5	<0.5	<0.5	<0.5	<3	
MW3	08/18/94		196.90	35.07	161.83	No	<50		< 0.5	< 0.5	<0.5	<0.5	<3.0	
MW3	11/15/94		196.90	35.97	160.93	No	<50		< 0.5	<0.5	<0.5	<0.5	<3.0	<100
MW3	02/06/95		196.90	28.39	168.51	No	<50		< 0.5	<0.5	<0.5	<0.5		
MW3	05/10/95		196.90	28.90	168.00	No	<50		< 0.5	< 0.5	<0.5	<0.5		
MW3	09/20/99		196.90	34.68	162.22	No	75.0	1.87	< 0.5	11.5	1.8	18.0	<75	<0.5
MW3	Well destroye	d in June 2000.												
MW4	03/02/09			Well installed	l.									
MW4	03/30/09		197.62	30.94	166.68	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50		
MW4	04/02/09		197.62	Well surveye	d.									
MW4	05/28/09		197.62	32.00	165.62	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50		
MW4	08/31/09		197.62	35.43	162.19	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50		
MW4	12/11/09		197.62	35.01	162.61	No	<50	< 0.50	< 0.50	0.83	< 0.50	1.1		
MW4	05/07/10		197.62	29.11	168.51	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW4	11/01/10		197.62	34.95	162.67	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW4	05/27/11 d		197.62	30.65	166.97	No								
MW4	11/23/11		197.62	33.49	164.13	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW4	05/24/12		197.62	30.02	167.60	No	58	< 0.50	0.84	4.4	0.64c	3.5		
MW4	10/31/12		197.62	35.14	162.48	No	110	<0.50	5.3	45	4.2	21		
MW5	03/06/09			Well installed	l.									
MW5	03/30/09		196.35	30.05	166.30	No	4,200	1,900	540	140	<12	310		
MW5	04/02/09		196.35	Well surveye	d.									
MW5	05/28/09		196.35	31.45	164.90	No	5,300	3,600	890	150	<25	140		
MW5	08/31/09		196.35	34.70	161.65	No	5,800	3,500	550	<100	<100	<100		
MW5	12/11/09		196.35	34.52	161.83	No	4,000b	3,800	230	<100	<100	<100		
MW5	05/07/10		196.35	30.84	165.51	No	2,700b	1,700	73	5.3	3.6	6.5		
MW5	11/01/10		196.35	33.93	162.42	No	2,400b	3,400	320	71	21	40		
MW5	05/27/11 d		196.35	31.65	164.70	No								
MW5	11/23/11		196.35	32.58	163.77	No	1,900b	3,200	72	2.7	3.1	8.1		
MW5	05/24/12		196.35	30.26	166.09	No	2,900b	1,700	54	31	5.2	17		
MW5	10/31/12		196.35	33.94	162.41	No	2,200b	2,700	220	72	8.7	47		
MW6	03/09/09			Well installed	l.									
MW6	03/30/09		192.41	26.94	165.47	No	2,800	4,800	0.91	< 0.50	< 0.50	< 0.50		
MW6	04/02/09		192.41	Well surveye	d.									

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Well ID	Sampling Date	Depth (feet)	TOC Elev. (feet)	DTW (feet)	GW Elev. (feet)	NAPL (feet)	TPHg (µg/L)	MTBE (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	Χ (μg/L)	Total Pb (μg/L)	Organic Pb (mg/L)
MW6	05/28/09		192.41	28.04	164.37	No	2,800	6,000	<100	<100	<100	<100		
MW6	08/31/09		192.41	30.57	161.84	No	4,900	6,600	<100	<100	<100	<100		
MW6	12/11/09		192.41	30.78	161.63	No	4,900b	6,200	<100	<100	<100	<100		
MW6	05/07/10		192.41	25.42	166.99	No	2,900b	3,700	2.7	< 0.50	0.74c	<1.0		
MW6	11/01/10		192.41	30.68	161.73	No	850b	6,100	2.1	< 0.50	< 0.50	<1.0		
MW6	05/27/11 d		192.41	27.07	165.34	No								
MW6	11/23/11		192.41	29.25	163.16	No	1,600b	6,400	< 0.50	< 0.50	< 0.50	<1.0		
MW6	05/24/12		192.41	26.36	166.05	No	2,000b	3,400	1.3c	9.7	0.97c	5.5		
MW6	10/31/12		192.41	30.74	161.67	No	1,400b	5,400	3.8	28	2.2	11		
MW7	03/09/09			Well installed.										
MW7	03/30/09		194.34	29.15	165.19	No	55	66	< 0.50	< 0.50	< 0.50	< 0.50		
MW7	04/02/09		194.34	Well surveyed	l.									
MW7	05/28/09		194.34	30.16	164.18	No	50	67	<1.0	<1.0	<1.0	<1.0		
MW7	08/31/09		194.34	33.31	161.03	No	<50	12	< 0.50	0.60	< 0.50	< 0.50		
MW7	12/11/09		194.34	32.71	161.63	No	<50	31	0.78	1.7	0.62	2.4		
MW7	05/07/10		194.34	27.54	166.80	No	510b	700	< 0.50	< 0.50	< 0.50	<1.0		
MW7	11/01/10		194.34	32.82	161.52	No	68b	140	< 0.50	< 0.50	< 0.50	<1.0		
MW7	05/27/11 d		194.34	28.85	165.49	No								
MW7	11/23/11		194.34	31.39	162.95	No	190b	300	< 0.50	< 0.50	< 0.50	<1.0		
MW7	05/24/12 d		194.34	28.31	166.03	No								
MW7	10/31/12		194.34	32.86	161.48	No	230b	290	2.9	21	1.8	9.2		
MW8	03/04/09			Well installed.										
8WM	03/30/09		192.96	27.35	165.61	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50		
MW8	04/02/09		192.96	Well surveyed	l.									
8WM	05/28/09		192.96	28.72	164.24	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50		
8WM	08/31/09		192.96	31.93	161.03	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50		
8WM	12/11/09		192.96	31.24	161.72	No	<50	< 0.50	0.74	1.6	0.59	2.3		
8WM	05/07/10		192.96	25.68	167.28	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
8WM	11/01/10		192.96	31.18	161.78	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
8WM	05/27/11		192.96	27.55	165.41	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW8	11/23/11		192.96	29.74	163.22	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW8	05/24/12		192.96	26.93	166.03	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
8WM	10/31/12		192.96	31.35	161.61	No	75	<0.50	2.5	19	1.7	8.7		
MW9	03/05/09			Well installed.										
MW9	03/30/09		195.16	28.31	166.85	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	< 0.50		
MW9	04/02/09		195.16	Well surveyed	l.									
MW9	05/28/09		195.16	29.69	165.47	No	<50	< 0.50	< 0.50	<0.50	< 0.50	< 0.50		

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Well ID	Sampling Date	Depth (feet)	TOC Elev. (feet)	DTW (feet)	GW Elev. (feet)	NAPL (feet)	TPHg (µg/L)	MTBE (µg/L)	B (µg/L)	Τ (μg/L)	E (µg/L)	X (μg/L)	Total Pb (µg/L)	Organic Pb (mg/L)
MW9	08/31/09		195.16	33.20	161.96	No	<50	<0.50	<0.50	<0.50	<0.50	<0.50		
MW9	12/11/09		195.16	32.62	162.54	No	<50	< 0.50	0.73	1.7	0.54	2.2		
MW9	05/07/10		195.16	26.59	168.57	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW9	11/01/10		195.16	32.45	162.71	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW9	05/27/11		195.16	29.62	165.54	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW9	11/23/11		195.16	30.56	164.60	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW9	05/24/12		195.16	27.94	167.22	No	<50	< 0.50	< 0.50	< 0.50	< 0.50	<1.0		
MW9	10/31/12		195.16	32.66	162.50	No	140	<0.50	6.9	38	2.7	13		
RW1	12/22/11			Well installe	ed.									
RW1	12/30/11		195.15	Well survey	ed.									
RW1	05/24/12		195.15	28.55	166.60	No	5,500b	2,500	920	5.9c	51	14		
RW1	10/31/12d		195.15											
Grab Grou	ndwater Samp	les												
Pit Water	06/14/02	11.5a					5,600	12,000	140	840	100	530		
UST Pit	06/19/02	13.5a					680	640	2.7	36	18	130		
W-38-B11	11/14/07	38					<50	<0.50	<0.50	<0.50	<0.50	<0.50		
W-15-B12	11/13/07	15					8,400	78	67	<5.0	140	150		
W-40-B13	11/12/07	40					<50	0.53	< 0.50	< 0.50	< 0.50	< 0.50		
W-15-B14	11/13/07	15					2,500	16	1.7	3.0	26	13		
W-38-B15	11/15/07	38					18,000	12,000	3,400	2,500	330	2,000		
W-40-B16	11/15/07	40					<50	7.7	< 0.50	< 0.50	< 0.50	< 0.50		
W-37-B17	11/13/07	37					630	2,200	1.8	< 0.50	4.1	1.4		
W-38-B18	11/12/07	38					4,300	1,400	52	<12	56	96		
W-35-B19	03/03/09	35					4,400	7,100	<0.50	<0.50	<0.50	<1.0		
W-35-B20	03/03/09	35					640	440	< 0.50	< 0.50	< 0.50	<1.0		
W-35-B21	03/03/09	35					<50	1.4	< 0.50	< 0.50	< 0.50	<1.0		

TABLE 1A CUMULATIVE GROUNDWATER MONITORING AND SAMPLING DATA

Former Exxon Service Station 70234 3450 35th Avenue Oakland, California

Notes: Data prior to 1999 provided by EA Environmental Science and Engineering in previously submitted reports.

TOC Elev. = Top of well casing elevation; datum is NAVD88.

DTW = Depth to water.

GW Elev. = Groundwater elevation; datum is NAVD88.

NAPL = Non-aqueous phase liquid.

TPHg = Total petroleum hydrocarbons as gasoline analyzed using EPA Method 8015B.

MTBE = Methyl tertiary butyl ether analyzed using EPA Method 8260B.

BTEX = Benzene, toluene, ethylbenzene, and total xylenes analyzed using EPA Method 8021B; from April 2009 to October 2010, analyzed using EPA Method 8260B.

Total Pb = Total lead analyzed using EPA Method 6010.

Organic Pb = Organic lead analyzed using CA DHS LUFT method.

EDB = 1,2-dibromoethane analyzed using EPA Method 8260B.

1,2-DCA = 1,2-dicloroethane analyzed using EPA Method 8260B.

TBA = Tertiary butyl alcohol analyzed using EPA Method 8260B.

TAME = Tertiary amyl methyl ether analyzed using EPA Method 8260B.

ETBE = Ethyl tertiary butyl ether analyzed using EPA Method 8260B.

DIPE = Di-isopropyl ether analyzed using EPA Method 8260B.

Ethanol = Ethanol analyzed using EPA Method 8260B.

 μ g/L = Micrograms per liter. mg/L = Milligrams per liter.

= Less than the stated laboratory reporting limit.

--- = Not sampled/Not analyzed/Not measured/Not applicable.

a = Approximate depth to groundwater surface at time of sampling.
 b = Hydrocarbon pattern does not match that of the specified standard.

c = Analyte presence was not confirmed by second column or GC/MS analysis.

d = Well inaccessible.

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Well ID	Sampling Date	Depth (feet)	EDB (µg/L)	1,2-DCA (μg/L)	TBA (μg/L)	TAME (μg/L)	ETBE (μg/L)	DIPE (μg/L)	Ethanol (μg/L)
Monitoring '	Well Samples								
MW1	07/17/92 - 09/20)/99	Not analyzed for t	hese analytes.					
MW1	Well destroyed	in June 2000.	,	•					
MW2	07/17/92 - 09/20)/99	Not analyzed for t	hese analytes.					
MW2	Well destroyed	in June 2000.							
MW3	07/17/92 - 09/20)/99	Not analyzed for t	hese analytes.					
MW3	Well destroyed	in June 2000.							
MW4	03/30/09		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW4	05/28/09		< 0.50	<0.50	<5.0	<0.50	< 0.50	< 0.50	
MW4	08/31/09		< 0.50	<0.50	<5.0	<0.50	<0.50	< 0.50	
MW4	12/11/09		<0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW4	05/07/10		<0.50	<0.50	<5.0	<0.50	<0.50	< 0.50	
MW4	11/01/10		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW4	05/27/11 d								
MW4	11/23/11		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW4	05/24/12		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW4	10/31/12		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW5	03/30/09		<12	17	450	<12	<12	<12	
MW5	05/28/09		<25	<25	530	<25	<25	<25	
MW5	08/31/09		<100	<100	<1,000	<100	<100	<100	
MW5	12/11/09		<100	<100	2,000	<100	<100	<100	
MW5	05/07/10		<25	<25	400	<25	<25	<25	
MW5	11/01/10		<50	<50	1,500	<50	<50	<50	
MW5	05/27/11 d								
MW5	11/23/11		<50	<50	<500	<50	<50	<50	
MW5	05/24/12		<50	<50	1,400	<50	<50	<50	
MW5	10/31/12		<50	<50	730	<50	<50	<50	
MW6	03/30/09		<0.50	<0.50	410	1.3	<0.50	0.82	
MW6	05/28/09		<100	<100	<1,000	<100	<100	<100	
MW6	08/31/09		<100	<100	1,100	<100	<100	<100	
MW6	12/11/09		<100	<100	2,600	<100	<100	<100	
MW6	05/07/10		<100	<100	<1,000	<100	<100	<100	
MW6	11/01/10			<50	2,400	<50	<50	<50	
INIAAQ	11/01/10		<50	<50	2,400	VC>	<50	VC>	

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Well ID	Sampling Date	Depth (feet)	EDB (µg/L)	1,2-DCA (μg/L)	TBA (μg/L)	TAME (µg/L)	ETBE (µg/L)	DIPE (µg/L)	Ethanol (µg/L)
MW6	05/27/11 d								
MW6	11/23/11		<100	<100	<1,000	<100	<100	<100	
MW6	05/24/12		<100	<100	2,700	<100	<100	<100	
MW6	10/31/12		<100	<100	<1,000	<100	<100	<100	
MW7	03/30/09		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW7	05/28/09		<1.0	<1.0	<10	<1.0	<1.0	<1.0	
MW7	08/31/09		< 0.50	< 0.50	<5.0	< 0.50	< 0.50	< 0.50	
MW7	12/11/09		< 0.50	<0.50	12	< 0.50	< 0.50	< 0.50	
MW7	05/07/10		< 0.50	< 0.50	130	< 0.50	< 0.50	< 0.50	
MW7	11/01/10		<2.5	<2.5	27	<2.5	<2.5	<2.5	
MW7	05/27/11 d								
MW7	11/23/11		<5.0	<5.0	<50	<5.0	<5.0	<5.0	
MW7	05/24/12 d								
MW7	10/31/12		<5.0	<5.0	<50	<5.0	<5.0	<5.0	
MW8	03/30/09		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW8	05/28/09		< 0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW8	08/31/09		<0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW8	12/11/09		<0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW8	05/07/10		< 0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW8	11/01/10		< 0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW8	05/27/11		< 0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW8	11/23/11		<0.50	<0.50	<5.0	<0.50	< 0.50	< 0.50	
MW8	05/24/12		<0.50	< 0.50	<5.0	<0.50	< 0.50	< 0.50	
MW8	10/31/12		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW9	03/30/09		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW9	05/28/09		<0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW9	08/31/09		< 0.50	<0.50	<5.0	<0.50	< 0.50	< 0.50	
MW9	12/11/09		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW9	05/07/10		< 0.50	<0.50	<5.0	<0.50	< 0.50	< 0.50	
MW9	11/01/10		< 0.50	<0.50	<5.0	<0.50	< 0.50	< 0.50	
MW9	05/27/11		<0.50	<0.50	<5.0	<0.50	< 0.50	<0.50	
MW9	11/23/11		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW9	05/24/12		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
MW9	10/31/12		<0.50	<0.50	<5.0	<0.50	<0.50	<0.50	
RW1	05/24/12		<50	<50	1,900	<50	<50	<50	
RW1	10/31/12 d								

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Well ID	Sampling Date	Depth (feet)	EDB (µg/L)	1,2-DCA (μg/L)	TBA (μg/L)	TAME (µg/L)	ETBE (μg/L)	DIPE (μg/L)	Ethanol (μg/L)
Grab Ground	dwater Samples								
Pit Water	06/14/02	11.5a							
UST Pit	06/19/02	13.5a							
W-38-B11	11/14/07	38	<0.50	<0.50	<10	<0.50	<0.50	<0.50	<50
W-15-B12	11/13/07	15	<5.0	<5.0	<100	<5.0	<5.0	<5.0	<500
W-40-B13	11/12/07	40	< 0.50	<0.50	<10	<0.50	<0.50	<0.50	<50
W-15-B14	11/13/07	15	<1.0	<1.0	<20	<1.0	<1.0	<1.0	<100
W-38-B15	11/15/07	38	<25	<25	1,900	<25	<25	<25	<2,500
W-40-B16	11/15/07	40	<0.50	<0.50	<10	<0.50	<0.50	<0.50	85
W-37-B17	11/13/07	37	<0.50	<0.50	58	<0.50	<0.50	<0.50	<50
W-38-B18	11/12/07	38	<12	<12	<250	<12	<12	<12	<1,200
W-35-B19	03/03/09	35	<50	<50	<500	<50	<50	<50	<5,000
W-35-B20	03/03/09	35	< 0.50	< 0.50	12	< 0.50	<0.50	<0.50	<50
W-35-B21	03/03/09	35	< 0.50	<0.50	<5.0	< 0.50	< 0.50	< 0.50	<50

TABLE 1B ADDITIONAL CUMULATIVE GROUNDWATER MONITORING AND SAMPLING DATA

Former Exxon Service Station 70234 3450 35th Avenue Oakland, California

Notes: Data prior to 1999 provided by EA Environmental Science and Engineering in previously submitted reports.

TOC Elev. = Top of well casing elevation; datum is NAVD88.

DTW = Depth to water.

GW Elev. = Groundwater elevation; datum is NAVD88.

NAPL = Non-aqueous phase liquid.

TPHg = Total petroleum hydrocarbons as gasoline analyzed using EPA Method 8015B.

MTBE = Methyl tertiary butyl ether analyzed using EPA Method 8260B.

BTEX = Benzene, toluene, ethylbenzene, and total xylenes analyzed using EPA Method 8021B; from April 2009 to October 2010, analyzed using EPA Method 8260B.

Total Pb = Total lead analyzed using EPA Method 6010.

Organic Pb = Organic lead analyzed using CA DHS LUFT method.

EDB = 1,2-dibromoethane analyzed using EPA Method 8260B.

1,2-DCA = 1,2-dicloroethane analyzed using EPA Method 8260B.

TBA = Tertiary butyl alcohol analyzed using EPA Method 8260B.

TAME = Tertiary amyl methyl ether analyzed using EPA Method 8260B.

ETBE = Ethyl tertiary butyl ether analyzed using EPA Method 8260B.

DIPE = Di-isopropyl ether analyzed using EPA Method 8260B.

Ethanol = Ethanol analyzed using EPA Method 8260B.

 μ g/L = Micrograms per liter. mg/L = Milligrams per liter.

= Less than the stated laboratory reporting limit.

--- = Not sampled/Not analyzed/Not measured/Not applicable.

a = Approximate depth to groundwater surface at time of sampling.
 b = Hydrocarbon pattern does not match that of the specified standard.

c = Analyte presence was not confirmed by second column or GC/MS analysis.

d = Well inaccessible.