



Nicole M. Arceneaux
Project Manager
Marketing Business Unit

**Chevron Environmental
Management Company**
6101 Bollinger Canyon Road
San Ramon, CA 94583
Tel (925) 790-6912
Nicole.arceneaux@chevron.com

April 11, 2016

Alameda County Health Care Services Agency
Environmental Health Services
Environmental Protection
1131 Harbor Bay Parkway, Suite 250
Alameda, California 94502-6577

RECEIVED

By Alameda County Environmental Health 11:15 am, Apr 13, 2016

**Re: Unocal No. 5781 (351640)
3535 Pierson Street, Oakland, California
Fuel Leak Case No. RO0000253
GeoTracker Global ID #T0600101467**

I have reviewed the attached report dated April 11, 2016.

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,

Nicole Arceneaux
Project Manager

Attachment: First Quarter 2016 Groundwater Monitoring Report by AECOM

April 6, 2016

Mr. Keith Nowell
Alameda County Health Care Services Agency
Environmental Health Services
Environmental Protection
1131 Harbor Bay Parkway, Suite 250
Alameda, California 94502-6577
(via internet upload)

**Subject: First Quarter 2016 Groundwater Monitoring Report
Unocal No. 5781 (351640)
3535 Pierson Street, Oakland, California
(Fuel Leak Case No. RO0000253)
(GeoTracker Global ID No. T0600101467)**

Dear Mr. Nowell:

On behalf of Chevron Environmental Management Company's (EMC's) affiliate, Union Oil Company of California ("Union Oil"), AECOM is pleased to present this first quarter 2016 groundwater monitoring report for the above-referenced site.

Future Work

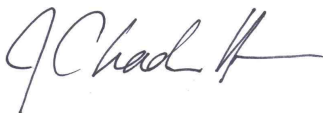
The next groundwater monitoring event is scheduled to be conducted during the second quarter of 2016. A workplan for offsite groundwater assessment is also planned.

Remarks/Signatures

The interpretations in this report represent AECOM's professional opinions and are based, in part, on the information supplied by the groundwater monitoring contractor and laboratory. 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 Chad Roper at (805) 764-4027.

Sincerely,



Chad Roper, PhD
Project Manager



Dana Files, PG No. 8410
Project Geologist
Stamped



ccs: Nicole M. Arceneaux, EMC (via electronic copy)
DeLong Liu, United Brothers Enterprise, Inc., property owner (via paper copy)

4/13/16

ATTACHMENT A

GROUNDWATER SUMMARY

GROUNDWATER MONITORING SUMMARY REPORT

Unocal No. 5781 (351640)
3535 Pierson Street, Oakland, California

CURRENT FIELD ACTIVITIES

Groundwater monitoring frequency:	Quarterly
Activity date:	3/15/2016
Groundwater monitoring subcontractor:	Gettler-Ryan Inc. (G-R)
Transporter/disposal facility:	Clean Harbors Environmental Services/Seaport Environmental
Number of groundwater wells total:	7
Number of groundwater wells off-site:	0
Number of wells sampled (this period):	7
Number of wells with LNAPL (this period):	0
Cumulative LNAPL recovered to date (gallons):	0
LNAPL recovered during this period (gallons):	0

SITE HYDROLOGY

Groundwater elevation range (feet above mean sea level) (this period):	136.52 to 143.29
Approximate groundwater flow direction (this period):	Southwest
Approximate hydraulic gradient (feet per foot) (this period):	0.05

GROUNDWATER CONDITIONS

Maximum detected benzene concentration (this period):	2.8 µg/L (MW-5)
Historical maximum detected benzene concentration:	580 µg/L (MW-5) on 6/16/2010
Maximum detected MTBE concentration (this period):	0.70 µg/L (MW-5)
Historical maximum detected MTBE concentration:	56 µg/L (MW-5) on 8/18/2011

GROUNDWATER TRENDS AND OBSERVATIONS

- Groundwater flow direction remains to the southwest.
- A benzene concentration was detected in the groundwater sample collected from one well sampled during this period, 2.8 µg/L (well MW-5).
- An MTBE concentration was detected in the groundwater sample collected from one well sampled during this period, 0.70 µg/L (well MW-5).

RECOMMENDATIONS AND PROPOSED FUTURE WORK

- G-R will continue quarterly groundwater monitoring.
- AECOM will continue quarterly groundwater reporting.

ATTACHMENT B

FIGURES



SITE LOCATION



0 2,050 4,100 Feet

© OpenStreetMap (and) contributors, CC-BY-SA



AECOM
 1220 AVENIDA ACASO
 CAMARILLO, CALIFORNIA 93012
 PHONE: 805.388.3775
 FAX: 805.388.3557
 WEB: HTTP://WWW.AECOM.COM

SITE LOCATION MAP

Unocal No. 5781 (351640)
 3535 Pierson Street
 Oakland, California

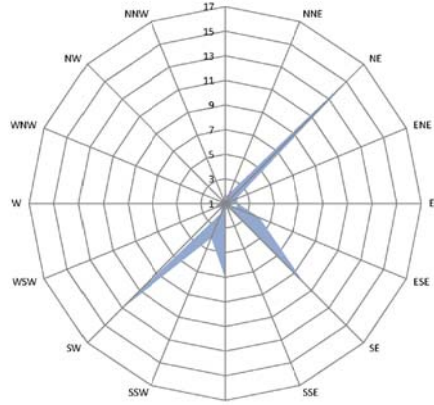
FIGURE NUMBER:

1

DRAWN BY:	DATE:	PROJECT NUMBER:	SHEET NUMBER:
T. Quiroz	09/30/2015	60338852	1 of 1

J:\CLIENT-PROJECTS\76_PRODUCTS\351640_5781_OAKLAND_3535_PIERSON_STY.0 DELIVERABLES\7.2_CADD\GWR\2016\1Q16\CADD\FIG 2 - GWE 1Q16.DWG

Unocal No. 5781 (351640) Rose Diagram



Note:
Concentric circles represent the frequency of groundwater flow direction conducted from second quarter 2010 through first quarter 2016. ■ Number of Occurrences

LEGEND

--- Subject Property Boundary

⊕ Monitoring Well

(#) Groundwater Elevation in Feet Above Mean Sea Level

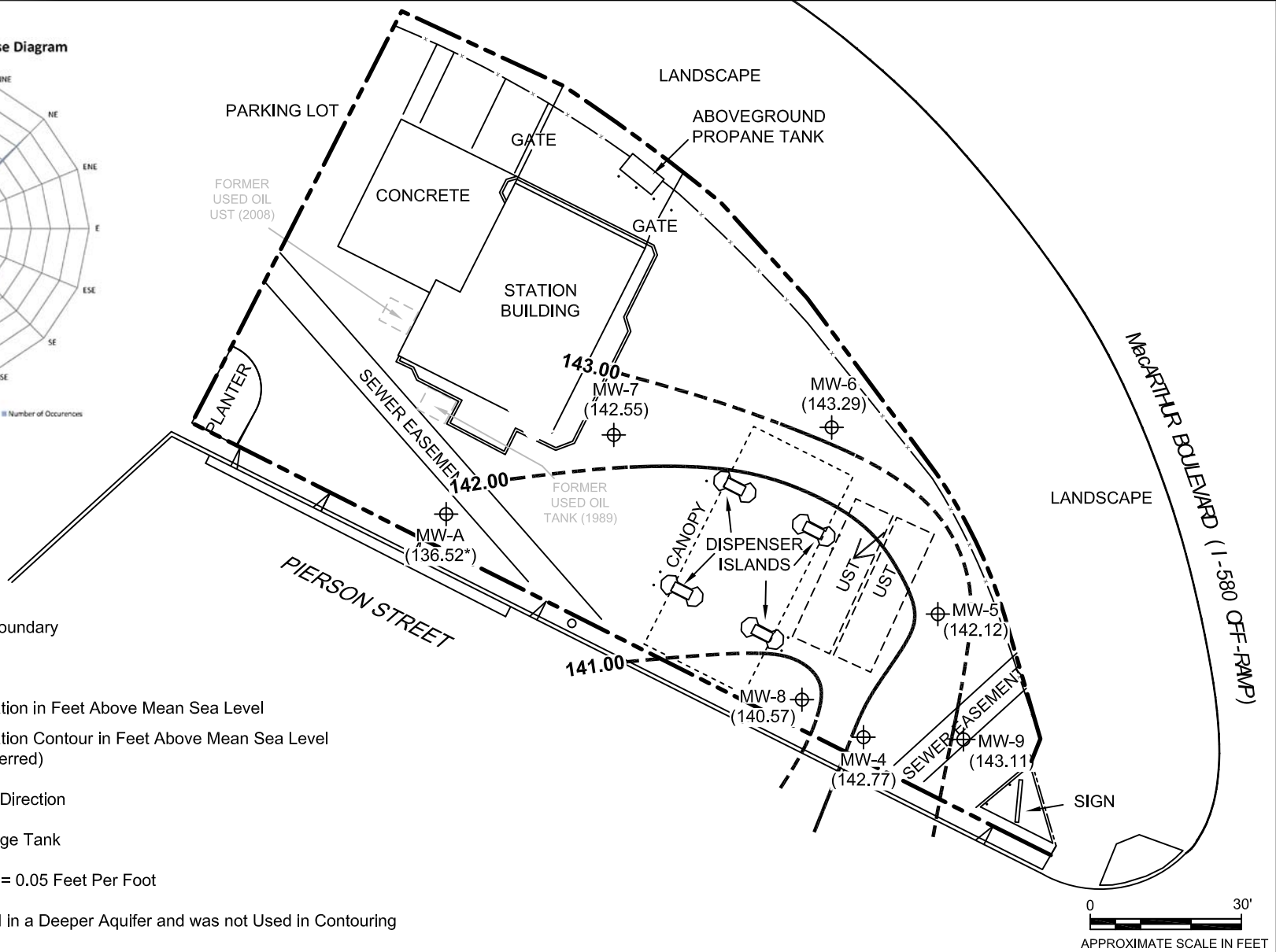
141.00 - - - Groundwater Elevation Contour in Feet Above Mean Sea Level (Dashed Where Inferred)

← Groundwater Flow Direction

UST Underground Storage Tank

Hydraulic Gradient = 0.05 Feet Per Foot

* MW-A is Screened in a Deeper Aquifer and was not Used in Contouring



FIRST QUARTER 2016 GROUNDWATER ELEVATION MAP

UNOCAL NO. 5781 (351640)
3535 PIERSON STREET, OAKLAND, CALIFORNIA

SCALE: 1" = 30'
DATE: 04/05/2016
PROJECT NUMBER: 60338852



AECOM
1220 AVENIDA ACASO
CAMARILLO, CALIFORNIA 93012
PHONE: 805.388.3775
FAX: 805.388.3557
WEB: HTTP://WWW.AECOM.COM

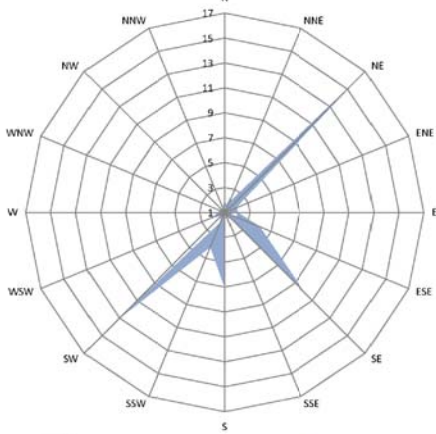
DESIGNED BY:	REVISIONS			
	NO.:	DESCRIPTION:	DATE:	BY:
DRAWN BY:				
TQ				
CHECKED BY:				
DF				
APPROVED BY:				
CR				

FIGURE NUMBER:

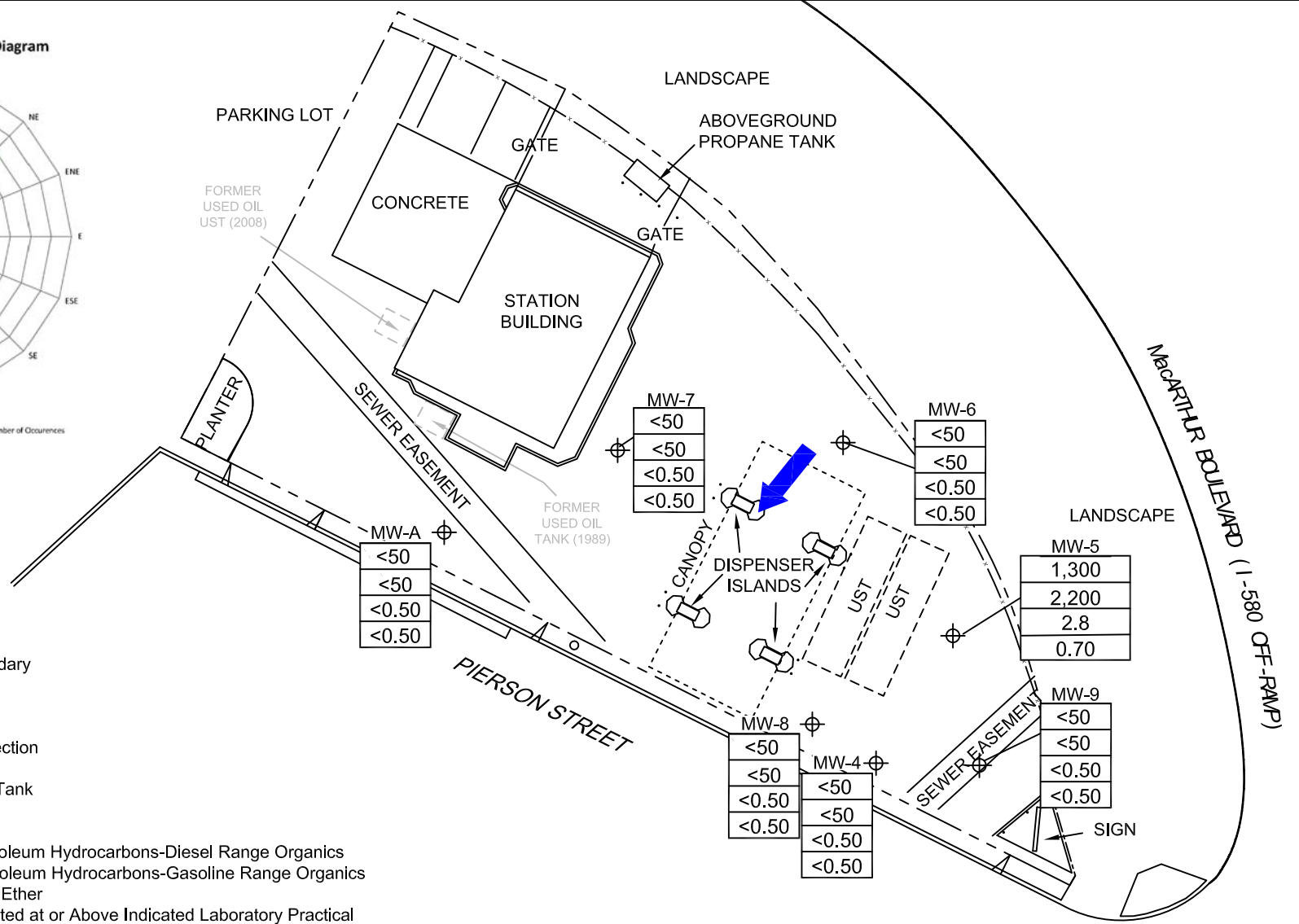
2

I:\CLIENT-PROJECTS\76_PRODUCT\5781_OAKLAND_3535_PIERSON_ST\7.0_DELIVERABLES\7.2_CADD\GWR\2016\1Q16\CADD\FIG 3 - GW DATA 1Q16.DWG

Unocal No. 5781 (351640) Rose Diagram



Note: Concentric circles represent the frequency of groundwater flow direction conducted from second quarter 2010 through first quarter 2016. || Number of Occurrences



Legend

- Subject Property Boundary
- ⊕ Monitoring Well
- Groundwater Flow Direction
- UST Underground Storage Tank

WELL ID	ID = Identification
TPH-DRO	TPH-DRO = Total Petroleum Hydrocarbons-Diesel Range Organics
TPH-GRO	TPH-GRO = Total Petroleum Hydrocarbons-Gasoline Range Organics
BENZENE	MTBE = Methyl t-Butyl Ether
MTBE	<# = Analyte not Detected at or Above Indicated Laboratory Practical Quantitation Limit

Analyte Results Expressed in Micrograms per Liter



Base map created by Delta Consultants, Inc.

FIRST QUARTER 2016 GROUNDWATER ANALYTICAL DATA MAP

UNOCAL NO. 5781 (351640)
3535 PIERSON STREET, OAKLAND, CALIFORNIA

SCALE: 1" = 30'	DATE: 01/26/2016	PROJECT NUMBER: 60338852
--------------------	---------------------	-----------------------------

AECOM
1220 AVENIDA ACASO
CAMARILLO, CALIFORNIA 93012
PHONE: 805.388.3775
FAX: 805.388.3557
WEB: HTTP://WWW.AECOM.COM



DESIGNED BY:	REVISIONS			
	NO.:	DESCRIPTION:	DATE:	BY:
DRAWN BY: TQ				
CHECKED BY: DF				
APPROVED BY: CR				

FIGURE NUMBER:

3

ATTACHMENT C

TABLES

Table 1
Current Groundwater Monitoring Data and Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	TOC* (ft)	DATE	DTW (ft)	GWE* (ft)	LNAPL THICKNESS (ft)	TPH-DRO (µg/L)	TPH-GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	COMMENTS
MW-A	154.79	3/15/2016	18.27	136.52	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-4	153.48	3/15/2016	10.71	142.77	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-5	153.66	3/15/2016	11.54	142.12	0	1,300	2,200	2.8	1.0	13	9.4	
MW-6	154.62	3/15/2016	11.33	143.29	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-7	155.38	3/15/2016	12.83	142.55	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-8	153.71	3/15/2016	13.14	140.57	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-9	153.37	3/15/2016	10.26	143.11	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
QA	--	3/15/2016	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	

NOTES:

* TOC and GWE are in feet above mean sea level

BTEX compounds analyzed by Environmental Protection Agency Method (EPA) 8260B

TPH-DRO analyzed by Leaking Underground Fuel Tank (Luft)/TPHd Method with silica gel cleanup

TPH-GRO analyzed by EPA Method 8015B

µg/L = Micrograms per liter

<# = Analyte not detected at or above indicated laboratory practical quantitation limit

-- = Not analyzed/applicable

B = Benzene

DTW = Depth to water below TOC

E = Ethylbenzene

ft = Feet

GWE = Groundwater elevation

ID = Identification

LNAPL = Light non-aqueous phase liquid

QA = Quality assurance/trip blank

T = Toluene

TOC = Top of casing

TPH-DRO = Total petroleum hydrocarbons as diesel/diesel range organics

TPH-GRO = Total petroleum hydrocarbons as gasoline/gasoline range organics

X = Total xylenes

Table 2
Current Groundwater Analytical Results - Oxygenate Compounds
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	MTBE (µg/L)	TBA (µg/L)	ETHANOL (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	EDB (µg/L)	EDC (µg/L)
MW-A	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50
MW-4	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50
MW-5	3/15/2016	0.70	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50
MW-6	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50
MW-7	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50
MW-8	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50
MW-9	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50
QA	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50

NOTES:

Oxygenate compounds analyzed by Environmental Protection Agency Method 8260B

µg/L = Micrograms per liter

<# = Analyte not detected at or above indicated laboratory practical quantitation limit

DIPE = Diisopropyl ether

EDB = 1,2-Dibromoethane

EDC = 1,2-Dichloroethane

ETBE = Ethyl t-butyl ether

ID = Identification

MTBE = Methyl t-butyl ether

QA = Quality assurance/trip blank

TAME = t-amyl methyl ether

TBA = t-butyl alcohol

Table 3
Historical Groundwater Monitoring Data and Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	TOC* (ft)	DATE	DTW (ft)	GWE* (ft)	LNAPL							COMMENTS	
					THICKNESS (ft)	TPH-DRO (µg/L)	TPH-GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)		
MW-A	--	12/18/1990	--	--	--	73	ND	ND	ND	ND	ND	ND	
	--	5/3/1991	--	--	--	ND	ND	ND	ND	ND	ND	ND	
	--	8/7/1991	--	--	--	ND	ND	ND	ND	ND	ND	ND	
	--	11/8/1991	--	--	--	ND	ND	ND	ND	ND	ND	ND	
	151.80	2/6/1992	19.88	131.92	0	ND	ND	ND	ND	ND	ND	ND	
	151.80	8/4/1992	18.95	132.85	0	ND	ND	ND	ND	ND	ND	0.51	
	151.80	2/10/1993	17.71	134.09	0	ND	ND	ND	ND	ND	ND	ND	
	151.80	2/10/1994	15.25	136.55	0	ND	ND	ND	0.52	ND	ND	0.92	
	151.80	2/9/1995	15.68	136.12	0	ND	ND	ND	ND	ND	ND	ND	
	151.80	2/6/1996	12.52	139.28	0	120	ND	ND	ND	ND	ND	2.1	
	151.80	2/5/1997	13.01	138.79	0	61	ND	ND	ND	ND	ND	ND	
	151.80	2/2/1998	11.91	139.89	0	ND	ND	ND	ND	ND	ND	ND	
	151.80	2/22/1999	11.24	140.56	0	ND	ND	ND	ND	ND	ND	ND	
	151.80	2/26/2000	12.16	139.64	0	ND	ND	ND	1.01	ND	ND	ND	
	151.80	3/7/2001	11.91	139.89	0	131	ND	ND	ND	ND	ND	ND	
	151.80	2/22/2002	14.08	137.72	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<0.50	
	151.80	2/22/2003	14.41	137.39	0	93	<50	<0.50	<0.50	<0.50	<0.50	<0.50	
	151.80	2/3/2004	14.32	137.48	0	60	<50	<0.50	<0.50	<0.50	<0.50	<0.50	
	151.80	2/18/2005	14.21	137.59	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<0.50	
	151.80	3/29/2006	12.72	139.08	0	<200	<50	<0.30	<0.30	<0.30	<0.30	<0.60	
	151.80	3/28/2007	13.98	137.82	0	92	<50	<0.30	<0.30	<0.30	<0.30	<0.60	
	151.80	3/22/2008	12.68	139.12	0	<50	<50	<0.30	<0.30	<0.30	<0.30	<0.60	
	151.80	3/27/2009	14.35	137.45	0	53	<50	<0.30	<0.30	<0.30	<0.30	<0.60	
	151.80	3/23/2010	19.55	132.25	0	<58	--	--	--	--	--	--	
	154.79	6/16/2010	17.85	136.94	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	9/29/2010	15.50	139.29	0	<1200	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	12/21/2010	14.43	140.36	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	3/10/2011	17.70	137.09	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	06/07/2011	13.92	140.87	0	<40	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	08/18/2011	18.83	135.96	0	<40	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	10/04/2011	14.67	140.12	0	<40	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	01/24/2012	16.75	138.04	0	<40	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	04/06/2012	17.14	137.65	0	<40	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	07/02/2012	14.79	140.00	0	<40	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	10/4/2012	17.52	137.27	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	1/23/2013	15.08	139.71	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	4/22/2013	15.60	139.19	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	7/31/2013	16.42	138.37	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	
	154.79	10/17/2013	16.57	138.22	0	<50	<50	<0.50	<0.50	<0.50	<0.50	<1.0	

Table 3
Historical Groundwater Monitoring Data and Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	TOC* (ft)	DATE	DTW (ft)	GWE* (ft)	LNAPL THICKNESS (ft)	TPH-DRO (µg/L)	TPH-GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	COMMENTS
	154.79	2/24/2014	17.33	137.46	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.79	4/17/2014	16.65	138.14	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.79	7/18/2014	18.02	136.77	0	--	<50	<0.50	<0.50	<0.50	<1.0	
	154.79	10/21/2014	18.41	136.38	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.79	1/20/2015	17.95	136.84	0	<50	<50	<0.50	<0.50	<0.50	<1.0	pre-purge
	154.79	1/20/2015	--	--	--	<50	<50	<0.50	<0.50	<0.50	<1.0	post-purge
	154.79	6/3/2015	18.70	136.09	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.79	9/7/2015	18.18	136.61	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.79	12/22/2015	18.50	136.29	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.79	3/15/2016	18.27	136.52	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-4	153.48	6/16/2010	11.13	142.35	0	<50	58	<0.50	9.7	1.3	16	
	153.48	9/29/2010	12.62	140.86	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	12/21/2010	11.17	142.31	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	3/10/2011	10.57	142.91	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	06/07/2011	10.94	142.54	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	08/18/2011	12.07	141.41	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	10/04/2011	12.70	140.78	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	01/24/2012	12.40	141.08	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	04/06/2012	11.10	142.38	0	<40	390	<0.50	3.8	11	150	
	153.48	07/02/2012	12.14	141.34	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	10/4/2012	13.43	140.05	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	1/23/2013	11.64	141.84	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	4/22/2013	12.22	141.26	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	7/31/2013	13.24	140.24	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	10/17/2013	13.85	139.63	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	2/24/2014	13.06	140.42	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	4/17/2014	11.96	141.52	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	7/18/2014	12.90	140.58	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	10/21/2014	13.68	139.80	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	1/20/2015	11.98	141.50	0	<50	<50	<0.50	<0.50	<0.50	<1.0	pre-purge
	153.48	1/20/2015	--	--	--	<50	<50	<0.50	<0.50	<0.50	<1.0	post-purge
	153.48	6/3/2015	12.42	141.06	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	9/7/2015	13.18	140.30	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	12/22/2015	12.38	141.10	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.48	3/15/2016	10.71	142.77	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-5	153.66	6/16/2010	11.95	141.71	0	3,000	29,000	580	6,800	850	7,200	
	153.66	9/29/2010	13.67	139.99	0	64,000	29,000	220	4,100	2,500	23,000	

**Table 3
Historical Groundwater Monitoring Data and Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California**

WELL ID	TOC* (ft)	DATE	DTW (ft)	GWE* (ft)	LNAPL							COMMENTS
					THICKNESS (ft)	TPH-DRO (µg/L)	TPH-GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	
	153.66	12/21/2010	11.17	142.49	0	11,000	50,000	81	4,800	2,200	22,000	
	153.66	3/10/2011	11.35	142.31	0	4,900	48,000	69	3,600	1,700	20,000	
	153.66	06/07/2011	11.45	142.21	0	3,700	40,000	32	2,300	1,500	16,000	
	153.66	08/18/2011	12.30	141.36	0	5,400	30,000	29	1,000	980	7,200	
	153.66	10/04/2011	13.72	139.94	0	20,000	42,000	21	2,400	2,400	20,000	
	153.66	01/24/2012	12.20	141.46	0	46,000	71,000	<25	1,100	1,400	10,000	
	153.66	04/06/2012	11.88	141.78	0	21,000	58,000	9.9	880	660	9,800	
	153.66	07/02/2012	12.75	140.91	0	30,000	53,000	89	590	1,000	12,000	
	153.66	10/4/2012	16.03	137.34	0.39	No Sample Collected - Free Product in Well						
	153.66	1/23/2013	12.02	141.64	0	22,000	54,000	<25	160	1,100	13,000	
	153.66	4/22/2013	12.37	141.29	0	7,600	39,000	0.70	65	330	4,500	
	153.66	7/31/2013	15.62	138.04	0	11,000	35,000	1.0	59	470	3,500	
	153.66	10/17/2013	16.41	137.25	0	<50	86,000	<10	66	770	9,300	
	153.66	2/24/2014	15.27	138.39	0	1,700	3,900	<0.50	4.5	240	1,800	
	153.66	4/17/2014	12.02	141.64	0	960	27,000	<0.50	2.5	160	1,100	
	153.66	7/18/2014	15.28	138.38	0	2,100	6,600	<0.50	0.97	84	330	
	153.66	10/21/2014	17.03	136.63	0	3,000	27,000	<0.50	40	370	2,900	
	153.66	1/20/2015	12.24	141.42	0	880	9,100	<0.50	0.65	85	400	pre-purge
	153.66	1/20/2015	--	--	--	1,800	10,000	<0.50	0.54	85	370	post-purge
	153.66	6/3/2015	14.70	138.96	0	760	5,100	<0.50	<0.50	39	120	
	153.66	9/7/2015	16.63	137.03	0	3,800	4,100	<5.0	<5.0	130	540	
	153.66	12/22/2015	11.82	141.84	0	1,700	5,600	16	63	53	320	
	153.66	3/15/2016	11.54	142.12	0	1,300	2,200	2.8	1.0	13	9.4	
MW-6	154.62	12/21/2010	12.10	142.52	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	3/10/2011	11.36	143.26	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	06/07/2011	11.33	143.29	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	08/18/2011	13.00	141.62	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	10/04/2011	14.02	140.60	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	01/24/2012	11.94	142.68	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	04/06/2012	11.39	143.23	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	07/02/2012	11.49	143.13	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	10/4/2012	16.09	138.53	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	1/23/2013	11.41	143.21	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	4/22/2013	11.43	143.19	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	7/31/2013	15.71	138.91	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	10/17/2013	16.83	137.79	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	2/24/2014	15.22	139.40	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	4/17/2014	11.43	143.19	0	<50	<50	<0.50	<0.50	<0.50	<1.0	

Table 3
Historical Groundwater Monitoring Data and Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	TOC* (ft)	DATE	DTW (ft)	GWE* (ft)	LNAPL THICKNESS (ft)	TPH-DRO (µg/L)	TPH-GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	COMMENTS
	154.62	7/18/2014	14.96	139.66	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	10/21/2014	16.70	137.92	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	1/20/2015	11.61	143.01	0	<50	<50	<0.50	<0.50	<0.50	<1.0	pre-purge
	154.62	1/20/2015	--	--	--	<50	<50	<0.50	<0.50	<0.50	<1.0	post-purge
	154.62	6/3/2015	11.76	142.86	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	9/7/2015	16.08	138.54	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	12/22/2015	15.55	139.07	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	154.62	3/15/2016	11.33	143.29	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-7	155.38	12/21/2010	13.46	141.92	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	3/10/2011	12.07	143.31	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	06/07/2011	12.59	142.79	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	08/18/2011	14.37	141.01	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	10/04/2011	15.22	140.16	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	01/24/2012	15.32	140.06	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	04/06/2012	13.09	142.29	0	<49	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	07/02/2012	14.42	140.96	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	10/4/2012	16.20	139.18	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	1/23/2013	13.27	142.11	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	4/22/2013	14.30	141.08	0	<50	52	<0.50	<0.50	<0.50	<1.0	
	155.38	7/31/2013	16.30	139.08	0	Insufficient Water to Sample						
	155.38	10/17/2013	16.77	138.61	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	2/24/2014	15.33	140.05	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	4/17/2014	13.82	141.56	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	7/18/2014	15.70	139.68	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	10/21/2014	16.67	138.71	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	1/20/2015	14.13	141.25	0	<50	<50	<0.50	<0.50	<0.50	<1.0	pre-purge
	155.38	1/20/2015	--	--	--	<50	<50	<0.50	<0.50	<0.50	<1.0	post-purge
	155.38	6/3/2015	15.13	140.25	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	9/7/2015	16.17	139.21	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	12/22/2015	15.58	139.80	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	155.38	3/15/2016	12.83	142.55	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-8	153.71	12/21/2010	11.63	142.08	0	81	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	3/10/2011	11.38	142.33	0	61	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	06/07/2011	11.54	142.17	0	71	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	08/18/2011	12.47	141.24	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	10/04/2011	12.90	140.81	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	01/24/2012	12.52	141.19	0	<40	<50	<0.50	<0.50	<0.50	<1.0	

Table 3
Historical Groundwater Monitoring Data and Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	TOC* (ft)	DATE	DTW (ft)	GWE* (ft)	LNAPL							COMMENTS
					THICKNESS (ft)	TPH-DRO (µg/L)	TPH-GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	
	153.71	04/06/2012	11.35	142.36	0	160	270	<0.50	3.7	7.8	91	
	153.71	07/02/2012	12.50	141.21	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	10/4/2012	13.89	139.82	0	<50	<50	<0.50	<0.50	<0.50	2.4	
	153.71	1/23/2013	13.06	140.65	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	4/22/2013	12.82	140.89	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	7/31/2013	13.63	140.08	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	10/17/2013	14.48	139.23	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	2/24/2014	13.56	140.15	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	4/17/2014	11.90	141.81	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	7/18/2014	13.78	139.93	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	10/21/2014	14.38	139.33	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	1/20/2015	13.28	140.43	0	<50	<50	<0.50	<0.50	<0.50	<1.0	pre-purge
	153.71	1/20/2015	--	--	--	<50	<50	<0.50	<0.50	<0.50	<1.0	post-purge
	153.71	6/3/2015	12.88	140.83	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	9/7/2015	14.19	139.52	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	12/22/2015	12.90	140.81	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.71	3/15/2016	13.14	140.57	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
MW-9	153.37	12/21/2010	10.53	142.84	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	3/10/2011	10.86	142.51	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	06/07/2011	11.36	142.01	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	08/18/2011	12.52	140.85	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	10/04/2011	13.32	140.05	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	01/24/2012	11.23	142.14	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	04/06/2012	10.98	142.39	0	<40	340	<0.50	4.4	9	120	
	153.37	07/02/2012	12.58	140.79	0	<40	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	10/4/2012	14.31	139.06	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	1/23/2013	11.11	142.26	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	4/22/2013	12.22	141.15	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	7/31/2013	14.10	139.27	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	10/17/2013	14.56	138.81	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	2/24/2014	12.85	140.52	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	4/17/2014	11.73	141.64	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	7/18/2014	13.69	139.68	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	10/21/2014	14.32	139.05	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	1/20/2015	11.80	141.57	0	<50	<50	<0.50	<0.50	<0.50	<1.0	pre-purge
	153.37	1/20/2015	--	--	--	<50	<50	<0.50	<0.50	<0.50	<1.0	post-purge
	153.37	6/3/2015	13.30	140.07	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	9/7/2015	14.05	139.32	0	<50	<50	<0.50	<0.50	<0.50	<1.0	

Table 3
Historical Groundwater Monitoring Data and Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	TOC* (ft)	DATE	DTW (ft)	GWE* (ft)	LNAPL THICKNESS (ft)	TPH-DRO (µg/L)	TPH-GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	COMMENTS
	153.37	12/22/2015	10.50	139.32	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
	153.37	3/15/2016	10.26	143.11	0	<50	<50	<0.50	<0.50	<0.50	<1.0	
QA	--	1/23/2013	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	4/22/2013	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	7/31/2013	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	10/17/2013	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	2/24/2014	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	4/17/2014	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	7/18/2014	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	10/21/2014	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	9/7/2015	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	12/22/2015	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	
	--	3/15/2016	--	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	

NOTES:

* TOC and GWE are in feet above mean sea level.

Free product correlates to light non-aqueous phase liquid

µg/L = Micrograms per liter

-- = Not analyzed/applicable

<# = Analyte not detected at or above indicated laboratory practical quantitation limit

B = Benzene

DTW = Depth to water below TOC

E = Ethylbenzene

ft = Feet

GWE = Groundwater elevation

ID = Identification

LNAPL = Light non-aqueous phase liquid

ND = Non-detect

QA = Quality assurance/trip blank

T = Toluene

TOC = Top of casing

TPH-DRO = Total petroleum hydrocarbons as diesel/diesel range organics

TPH-GRO = Total petroleum hydrocarbons as gasoline/gasoline range organics

X = Total xylenes

Table 4
Historical Groundwater Analytical Results - Oxygenate Compounds
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	MTBE (µg/L)	TBA (µg/L)	ETHANOL (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	EDB (µg/L)	EDC (µg/L)	METHANOL (µg/L)	METHANE (mg/L)	FERROUS	NITRATE	SULFATE (mg/L)
												IRON (mg/L)	(AS N) (mg/L)	
MW-A	12/18/1990	--	--	--	--	--	--	--	--	--	--	--	--	--
	5/3/1991	--	--	--	--	--	--	--	--	--	--	--	--	--
	8/7/1991	--	--	--	--	--	--	--	--	--	--	--	--	--
	11/8/1991	--	--	--	--	--	--	--	--	--	--	--	--	--
	2/6/1992	--	--	--	--	--	--	--	--	--	--	--	--	--
	8/4/1992	--	--	--	--	--	--	--	--	--	--	--	--	--
	2/10/1993	--	--	--	--	--	--	--	--	--	--	--	--	--
	2/10/1994	--	--	--	--	--	--	--	--	--	--	--	--	--
	2/9/1995	--	--	--	--	--	--	--	--	--	--	--	--	--
	2/6/1996	--	--	--	--	--	--	--	--	--	--	--	--	--
	2/5/1997	ND	--	--	--	--	--	--	--	--	--	--	--	--
	2/2/1998	ND	--	--	--	--	--	--	--	--	--	--	--	--
	2/22/1999	ND	--	--	--	--	--	--	--	--	--	--	--	--
	2/26/2000	ND	--	--	--	--	--	--	--	--	--	--	--	--
	3/7/2001	ND	ND	ND	ND	ND	ND	ND	ND	--	--	--	--	--
	2/22/2002	<0.50	--	--	--	--	--	--	--	--	--	--	--	--
	2/22/2003	<2.0	<100	<500	<2.0	<2.0	<2.0	<2.0	<0.50	--	--	--	--	--
	2/3/2004	<2.0	<5.0	<50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	2/18/2005	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/29/2006	0.54	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/28/2007	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/22/2008	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/27/2009	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	3/23/2010	--	--	--	--	--	--	--	--	--	--	--	--	--
	6/16/2010	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	9/29/2010	0.63	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	12/21/2010	0.65	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	3/10/2011	0.56	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	06/07/2011	0.57	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	08/18/2011	0.61	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	<0.0010	140	11	69
	10/04/2011	0.72	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	<0.0010	<100	13	69
	01/24/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	04/06/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	07/02/2012	0.56	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/4/2012	0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/23/2013	0.55	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/22/2013	0.59	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/31/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/17/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	2/24/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/17/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--

Table 4
Historical Groundwater Analytical Results - Oxygenate Compounds
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	MTBE (µg/L)	TBA (µg/L)	ETHANOL (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	EDB (µg/L)	EDC (µg/L)	METHANOL (µg/L)	METHANE (mg/L)	FERROUS	NITRATE	SULFATE (mg/L)	
												IRON (mg/L)	(AS N) (mg/L)		
	7/18/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/21/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	6/3/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	9/7/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	12/22/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
MW-4	6/16/2010	5.4	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--	--
	9/29/2010	7.3	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--	--
	12/21/2010	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--	--
	3/10/2011	2.2	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--	--
	06/07/2011	1.6	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--	--
	08/18/2011	4	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	0.04	<100	4.6	52	52
	10/04/2011	3.8	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	0.03	100	4.3	50	50
	01/24/2012	1.5	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	04/06/2012	2.2	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	07/02/2012	2.4	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	10/4/2012	1.3	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	1/23/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	4/22/2013	2.5	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	7/31/2013	0.95	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	10/17/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	2/24/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	4/17/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	7/18/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	10/21/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	6/3/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	9/7/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	12/22/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	--
	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
MW-5	6/16/2010	<50	<1000	<25000	<50	<50	<50	<50	<50	<100	--	--	--	--	--
	9/29/2010	52	<1000	<25000	<50	<50	<50	<50	<50	<1000	--	--	--	--	--
	12/21/2010	<50	<1000	<25000	<50	<50	<50	<50	<50	<100	--	--	--	--	--
	3/10/2011	<50	<1000	<25000	<50	<50	<50	<50	<50	<100	--	--	--	--	--
	06/07/2011	24	150	330	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--	--
	08/18/2011	56	44	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	9.7	15,000	<0.44	<1.0	<1.0

Table 4
Historical Groundwater Analytical Results - Oxygenate Compounds
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	MTBE (µg/L)	TBA (µg/L)	ETHANOL (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	EDB (µg/L)	EDC (µg/L)	METHANOL (µg/L)	METHANE (mg/L)	FERROUS	NITRATE	SULFATE (mg/L)
												IRON (mg/L)	(AS N) (mg/L)	
	10/04/2011	42	<250	<6,200	<12	<12	<12	<12	<12	<100	1.9	17,000	<0.44	1.3
	01/24/2012	<25	<500	<12,000	<25	<25	<25	<25	<25	--	--	--	--	--
	04/06/2012	12	<120	<3,100	<6.2	<6.2	<6.2	<6.2	<6.2	--	--	--	--	--
	07/02/2012	26	<500	<12,000	<25	<25	<25	<25	<25	--	--	--	--	--
	10/4/2012	No Sample Collected - Free Product in Well												
	1/23/2013	<25	<500	<12,000	<25	<25	<25	<25	<25	--	--	--	--	--
	4/22/2013	2.9	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/31/2013	9.8	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/17/2013	<10	<200	<5,000	<10	<10	<10	<10	<10	--	--	--	--	--
	2/24/2014	1.7	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/17/2014	1.4	310	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/18/2014	3.6	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/21/2014	7.7	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	2.2	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	2.0	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	6/3/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	9/7/2015	<5.0	<100	<2,500	<5.0	<5.0	<5.0	<5.0	<5.0	--	--	--	--	--
	12/22/2015	<5.0	<100	<2,500	<5.0	<5.0	<5.0	<5.0	<5.0	--	--	--	--	--
	3/15/2016	0.70	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
MW-6	12/21/2010	32	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	3/10/2011	4.6	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	06/07/2011	4.3	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	08/18/2011	2.4	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	0.0027	<200	18	66
	10/04/2011	3.1	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	<0.0010	100	24	78
	01/24/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	04/06/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	07/02/2012	0.56	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/4/2012	0.75	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/23/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/22/2013	0.53	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/31/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/17/2013	16	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	2/24/2014	47	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/17/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/18/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/21/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	0.83	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	6/3/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	9/7/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--

Table 4
Historical Groundwater Analytical Results - Oxygenate Compounds
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	MTBE (µg/L)	TBA (µg/L)	ETHANOL (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	EDB (µg/L)	EDC (µg/L)	METHANOL (µg/L)	METHANE (mg/L)	FERROUS	NITRATE	SULFATE (mg/L)
												IRON (mg/L)	(AS N) (mg/L)	
	12/22/2015	4.7	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
MW-7	12/21/2010	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	3/10/2011	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	06/07/2011	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	08/18/2011	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	0.0012	<500	3.8	100
	10/04/2011	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	<0.0010	<500	4.2	100
	01/24/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	04/06/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	07/02/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/4/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/23/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/22/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/30/2013	--	--	--	--	--	--	--	--	--	--	--	--	--
	10/17/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	2/24/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/17/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/18/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/21/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	6/3/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
9/7/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	
12/22/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--	
	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
MW-8	12/21/2010	3.9	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	3/10/2011	2.3	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	06/07/2011	3.6	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	08/18/2011	2.1	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	<0.0010	140	1.5	65
	10/04/2011	1.5	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	<0.0010	190	2.8	67
	01/24/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	04/06/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	07/02/2012	1.5	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/4/2012	0.69	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/23/2013	1.0	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/22/2013	0.88	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/31/2013	0.79	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/17/2013	0.78	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	2/24/2014	1.1	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--

Table 4
Historical Groundwater Analytical Results - Oxygenate Compounds
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	MTBE (µg/L)	TBA (µg/L)	ETHANOL (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	EDB (µg/L)	EDC (µg/L)	METHANOL (µg/L)	METHANE (mg/L)	FERROUS	NITRATE	SULFATE (mg/L)
												IRON (mg/L)	(AS N) (mg/L)	
	4/17/2014	1.1	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	7/18/2014	0.94	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	10/21/2014	2.0	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	1/20/2015	1.4	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	1/20/2015	1.1	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	6/3/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	9/7/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	12/22/2015	1.1	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
MW-9	12/21/2010	1.2	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	3/10/2011	0.90	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	06/07/2011	1.4	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	--	--	--	--
	08/18/2011	2.1	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	0.001	<500	2.7	47
	10/04/2011	2.4	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<100	<0.0010	<200	3.2	47
	01/24/2012	1.3	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	04/06/2012	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	07/02/2012	2.0	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/4/2012	1.3	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	1/23/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/22/2013	0.83	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/31/2013	1.8	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/17/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	2/24/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	4/17/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	7/18/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/21/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
pre-purge	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
post-purge	1/20/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	6/3/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	9/7/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	12/22/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--
QA	01/23/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	04/22/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	07/31/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	10/17/2013	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	02/24/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	04/17/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	07/18/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--

Table 4
Historical Groundwater Analytical Results - Oxygenate Compounds
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	MTBE (µg/L)	TBA (µg/L)	ETHANOL (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	EDB (µg/L)	EDC (µg/L)	METHANOL (µg/L)	METHANE (mg/L)	FERROUS	NITRATE	SULFATE (mg/L)
												IRON (mg/L)	(AS N) (mg/L)	
	10/21/2014	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	09/07/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	12/22/2015	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--
	3/15/2016	<0.50	<10	<250	<0.50	<0.50	<0.50	<0.50	<0.50	--	--	--	--	--

NOTES:

Free product correlates to light non-aqueous phase liquid

µg/L = Micrograms per liter

<# = Analyte not detected at or above indicated laboratory practical quantitation limit

-- = Not analyzed/applicable

DIPE = Diisopropyl ether

EDB = 1,2-Dibromoethane

EDC = 1,2-Dichloroethane

ETBE = Ethyl t-butyl ether

ID = Identification

mg/L = Milograms per liter

MTBE = Methyl t-butyl ether

ND = Non-detect

QA = Quality assurance/trip blank

TAME = t-amyl methyl ether

TBA = t-butyl alcohol

Table 5
Additional Historical Analytical Results
Unocal No. 5781 (351640)
3535 Pierson Street
Oakland, California

WELL ID	DATE	DICHLORO- dIFLUORO- METHANE (µg/L)	1,1-DCA (µg/L)	1,1-DCE (µg/L)	cis- 1,2-DCE (µg/L)	trans- 1,2-DCE (µg/L)	1,2- DICHLORO- PROPANE (µg/L)	cis-1,3- DICHLORO- PROPANE (µg/L)
MW-A	2/3/2004	ND<1.0	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	2/18/2005	ND<1.0	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	3/29/2006	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	3/28/2007	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	3/22/2008	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	3/27/2009	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50

WELL ID	DATE	1,1,2,2- TETRACHLORO- ETHANE (µg/L)	TETRACHLORO- ETHENE (µg/L)	TRICHLORO- TRIFLUORO- ETHANE (µg/L)	1,1,1- TRICHLORO- ETHANE (µg/L)	1,1,2- TRICHLORO- ETHANE (µg/L)	TRICHLORO- ETHENE (µg/L)	TRICHLORO- FLUORO- METHANE (µg/L)	VINYL CHLORIDE (µg/L)
MW-A	2/3/2004	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<1.0	ND<0.50
	2/18/2005	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<1.0	ND<0.50
	3/29/2006	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	3/28/2007	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	3/22/2008	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50
	3/27/2009	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50

NOTES:

µg/L = Micrograms per liter

ID = Identification

ND<# = Analyte not detected at or above indicated laboratory practical quantitation limit

ATTACHMENT D

HYDROGRAPHS

Chart 1 - Hydrograph for Well MW-A

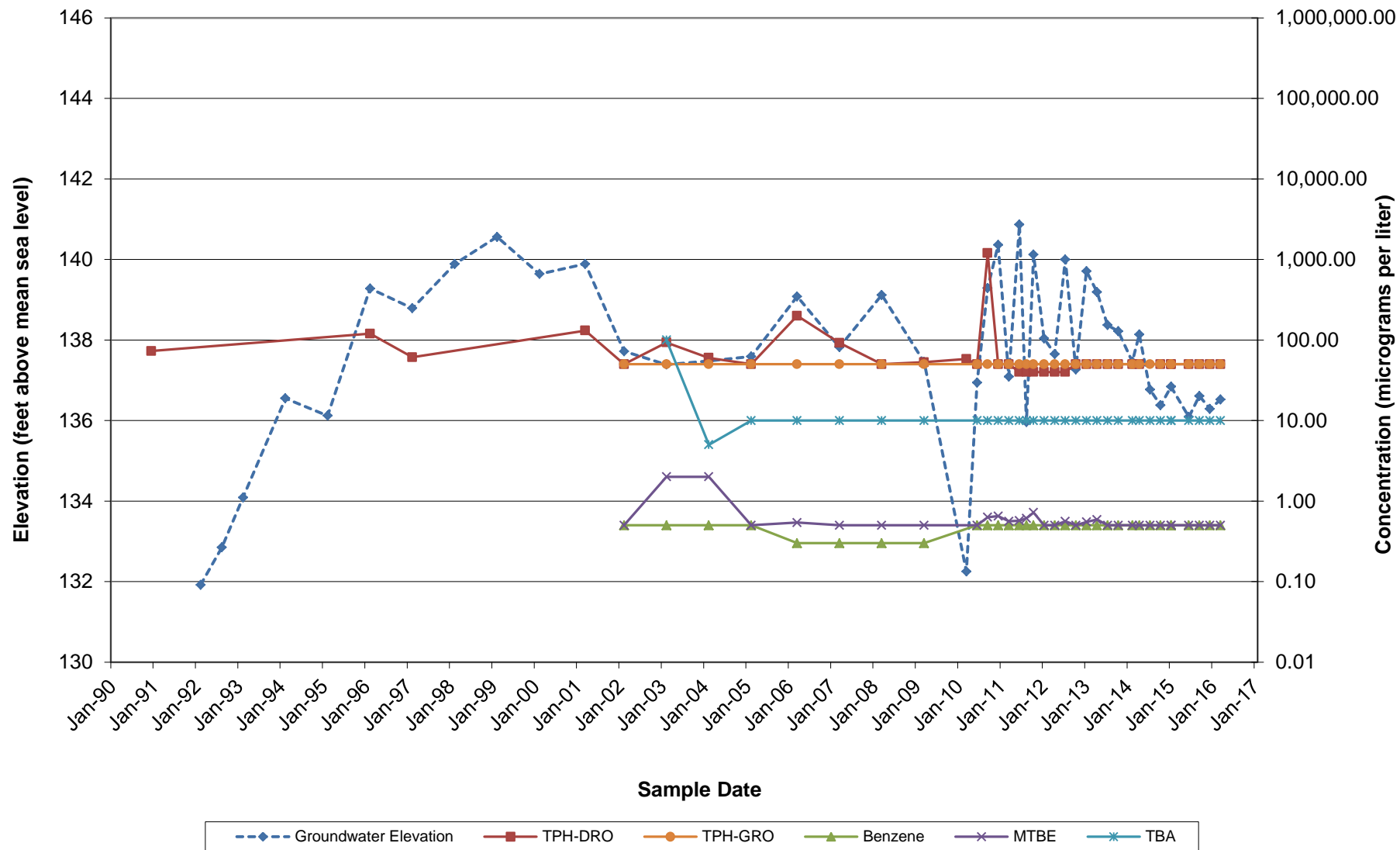


Chart 2 - Hydrograph for Well MW-4

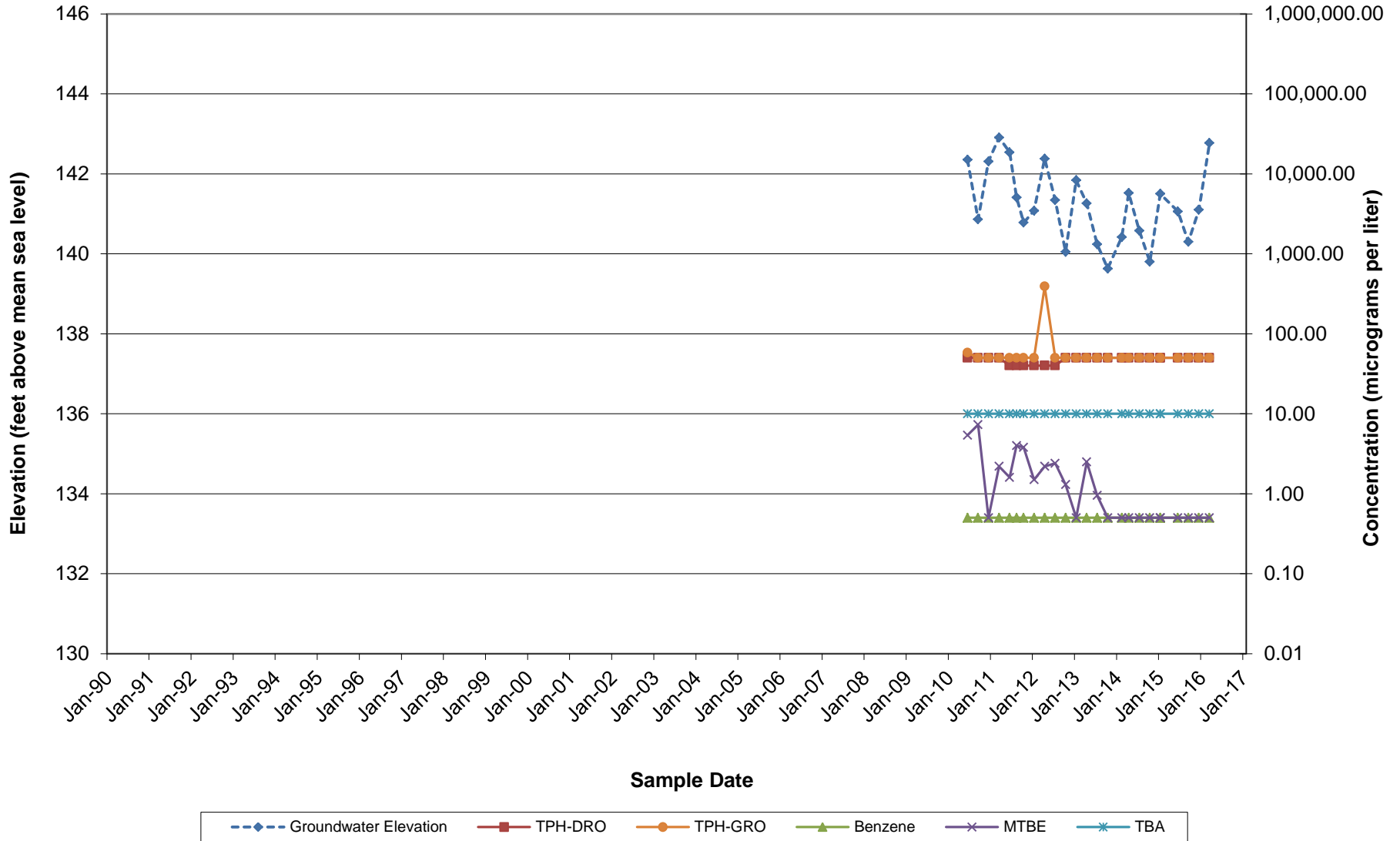


Chart 3 - Hydrograph for Well MW-5

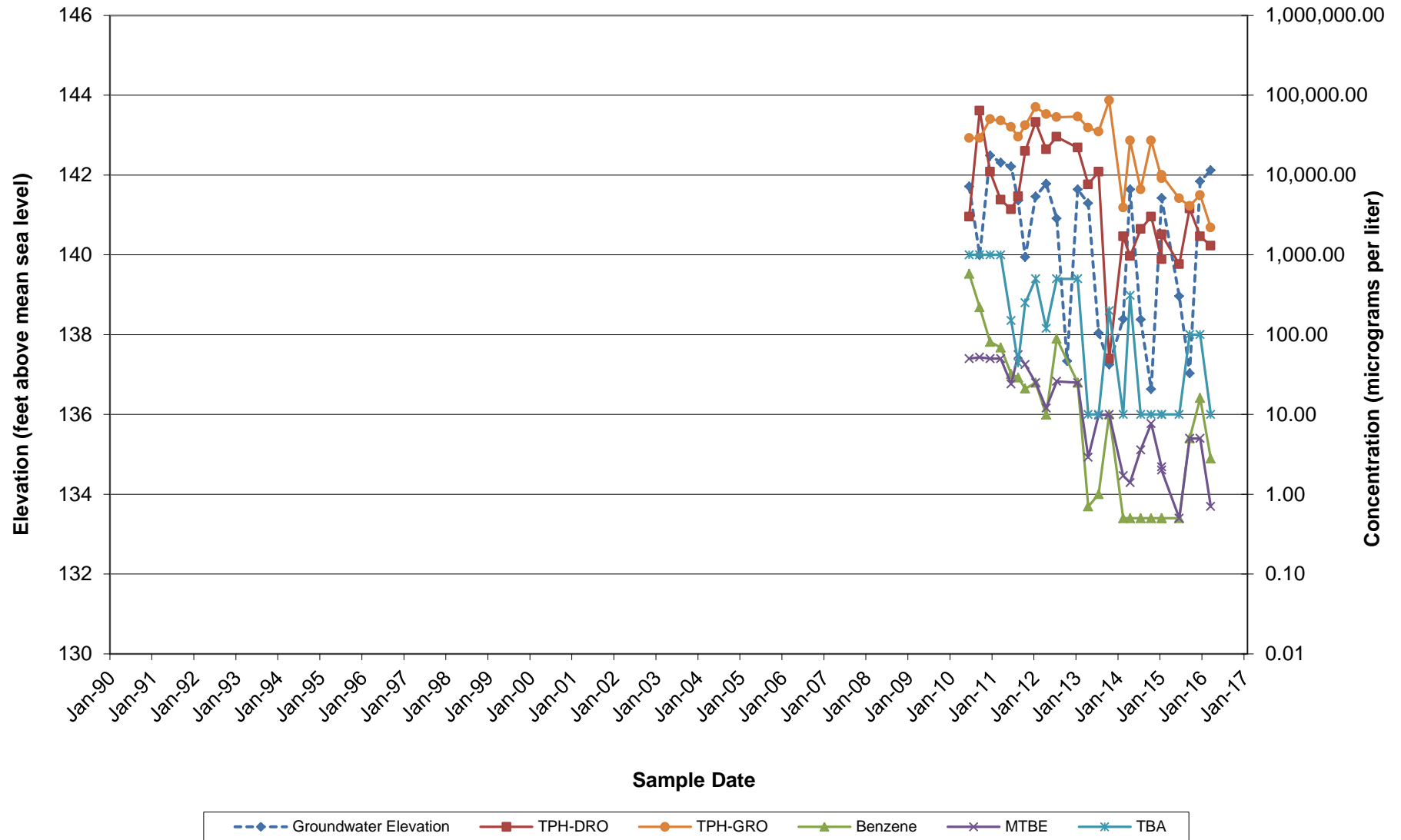


Chart 4 - Hydrograph for Well MW-6

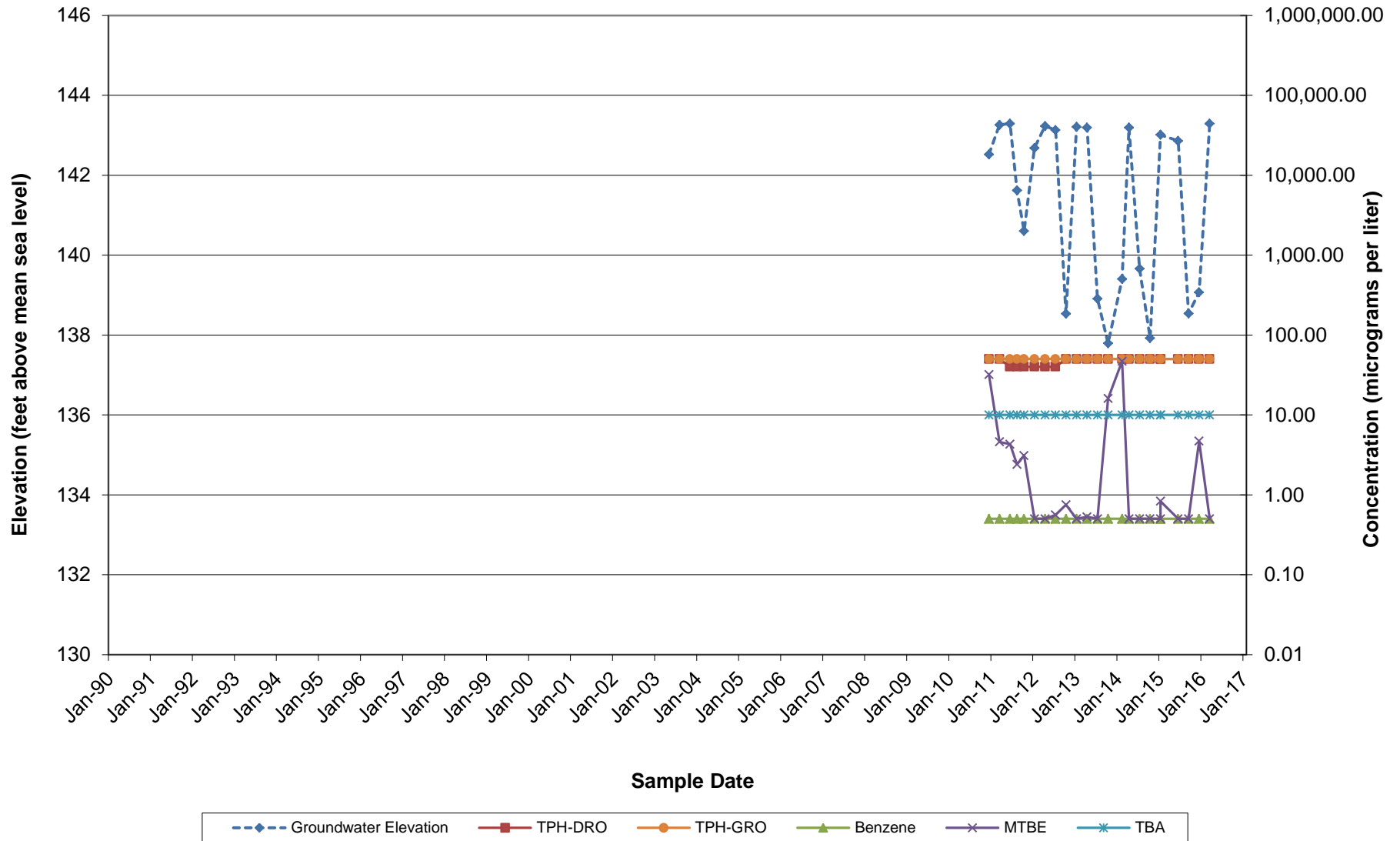


Chart 5 - Hydrograph for Well MW-7

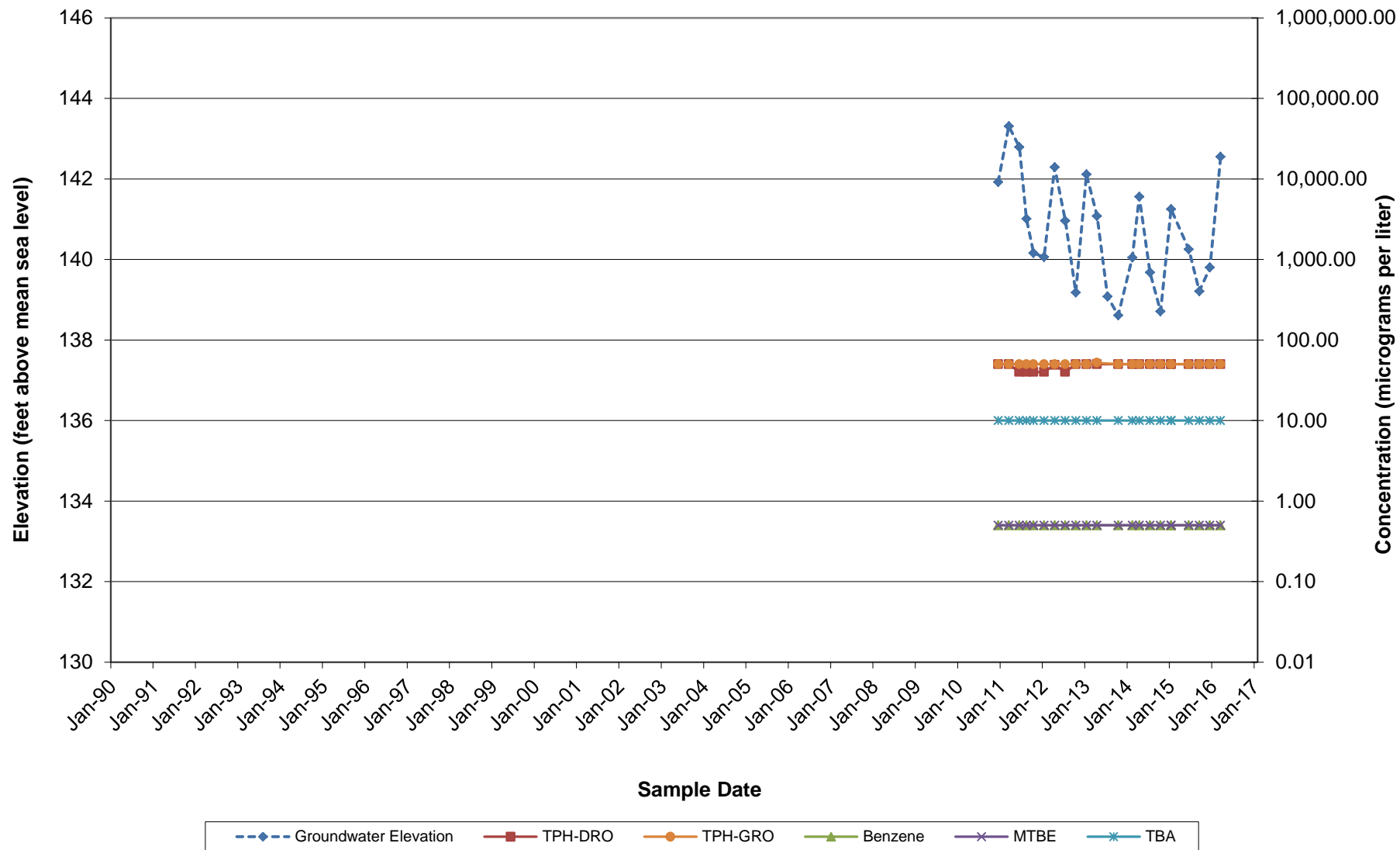


Chart 6 - Hydrograph for Well MW-8

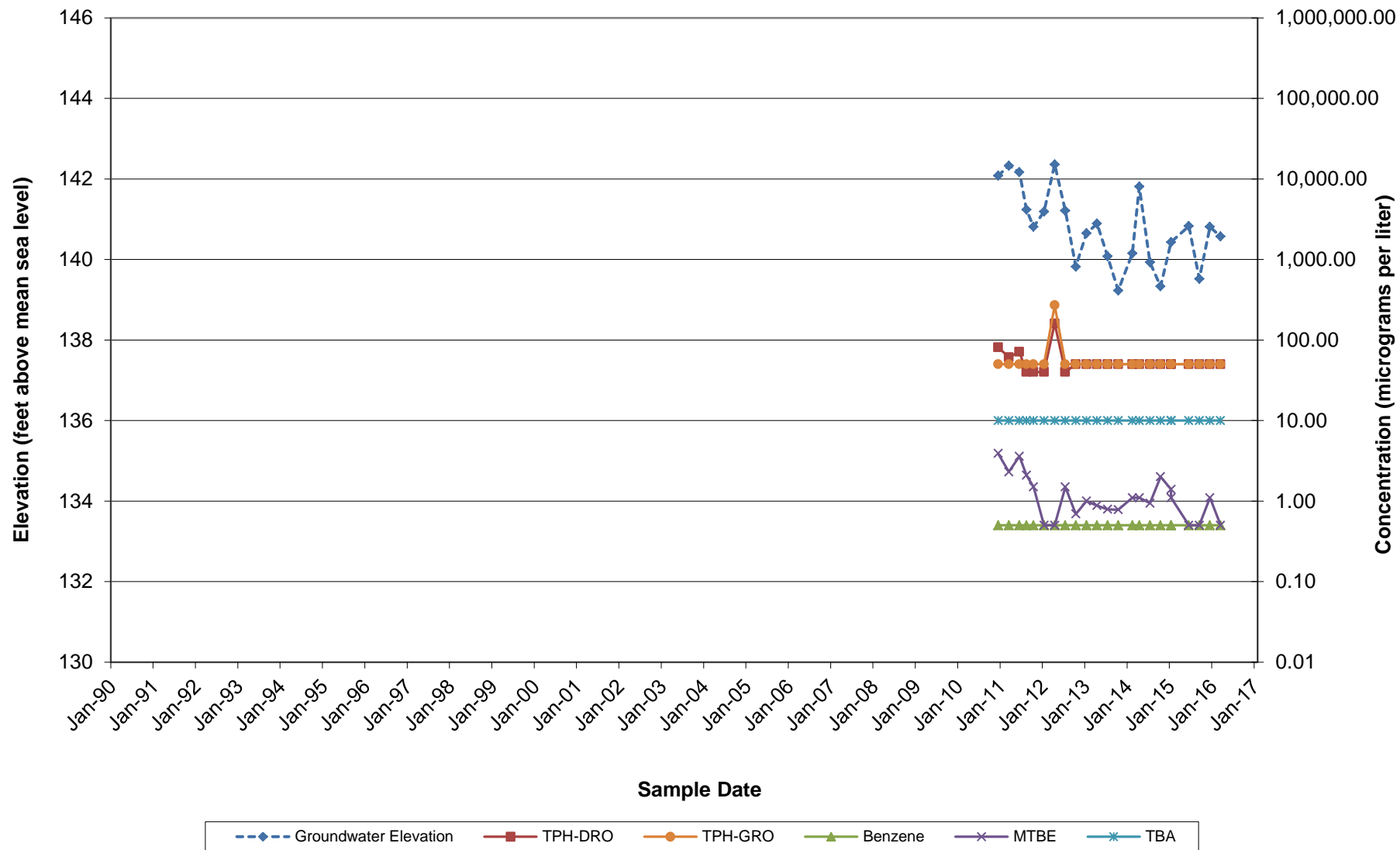
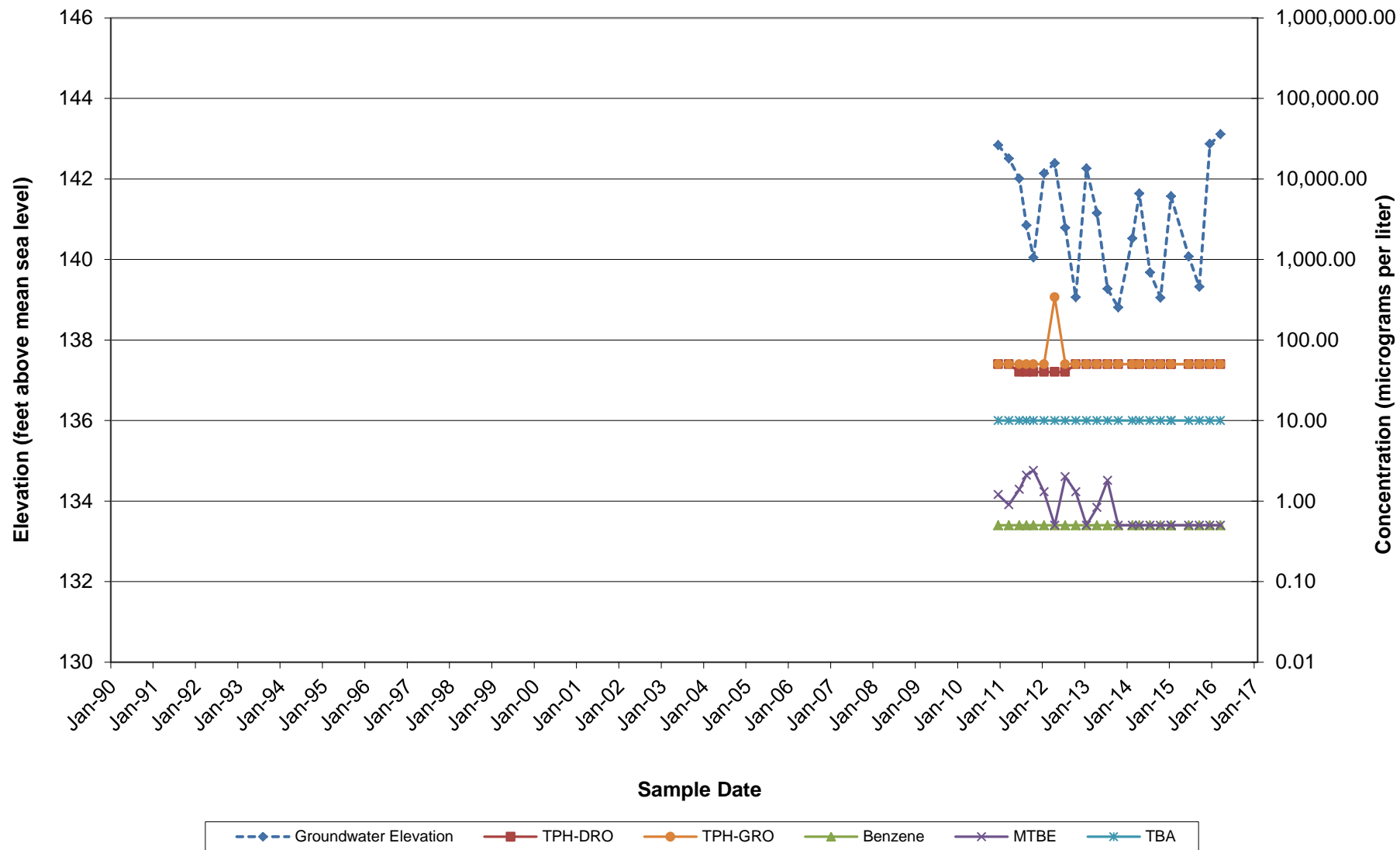


Chart 7 - Hydrograph for Well MW-9



ATTACHMENT E

**FIELD PROCEDURES AND
FIELD LOGS**



GETTLER-RYAN INC.



TRANSMITTAL

March 22, 2016

G-R #385641

TO: Mr. Chap Roper
AECOM
1220 Avenida Acaso
Camarillo, California 93012

FROM: Deanna L. Harding
Project Coordinator
Gettler-Ryan Inc.
6805 Sierra Court, Suite G
Dublin, California 94568

RE: **Chevron Facility**
#351640/5781
3535 Pierson Street
Oakland, California

WE HAVE ENCLOSED THE FOLLOWING:

COPIES	DESCRIPTION
VIA PDF	Groundwater Monitoring and Sampling Data Package First Quarter Event of March 15, 2016

COMMENTS:

Pursuant to your request, we are providing you with copies of the above referenced data for your use.

Please provide us the updated historical data prior to the next monitoring and sampling event for our field use.

Please feel free to contact me if you have any comments/questions.

trans/351640 5781

WELL CONDITION STATUS SHEET

Client/
 Facility #: **Chevron #351640 / 5781**
 Site Address: **3535 Pierson Street**
 City: **Oakland, CA**

Job #: **385641**
 Event Date: **3/15/16**
 Sampler: **JD**

WELL ID	Vault Frame Condition	Gasket/O-Ring <small>(M) Missing (R) Replaced</small>	Bolts <small>(M) Missing (R) Replaced</small>	Bolt Flanges <small>B=Broken S=Stripped R=Retaped</small>	Apron Condition <small>C=Cracked B=Broken G=Gone</small>	Grout Seal <small>(Deficient) Inches from TOC</small>	Casing <small>(Condition prevents tight cap seal)</small>	REPLACE LOCK Y/N	REPLACE CAP Y/N	WELL VAULT <small>Manufacture/Size/ # of Bolts</small>	Pictures Taken Y/N
MW-1	OK	—	—	—	—	—	—	N	N	8" emco	N
MW-4	OK	—	—	—	—	—	—	↓	↓	12" emco	↓
MW-5	OK	—	—	—	—	—	—	↓	↓		↓
MW-6	OK	—	—	A	C	OK	↓	↓	↓		↓
MW-7	OK	—	—	—	—	—	—	↓	↓		↓
MW-8	OK	—	—	—	—	—	—	↓	↓		↓
MW-9	OK	—	—	—	C	OK	↓	↓	↓		↓

Comments _____

STANDARD OPERATING PROCEDURE - GROUNDWATER SAMPLING

Gettler-Ryan Inc. (GR) field personnel adhere to the following procedures for the collection and handling of groundwater samples prior to analysis by the analytical laboratory. All work is performed in accordance with the GR Health & Safety Plan and all client-specific programs. The scope of work and type of analysis to be performed is determined prior to commencing field work.

Prior to sampling, the presence or absence of free-phase hydrocarbons is determined using an interface probe. Product thickness, if present, is measured to the nearest 0.01 foot and is noted in the field notes. In addition, all depth to water level measurements are collected with a static water level indicator and are also recorded in the field notes, prior to purging and sampling any wells.

After water levels are collected and prior to sampling, if purging is to occur, each well is purged a minimum of three well casing volumes of water using pre-cleaned pumps (stack, peristaltic or Grundfos), or disposable bailers. Temperature, pH and electrical conductivity are measured a minimum of three times during the purging (additional parameters such as dissolved oxygen, oxidation reduction potential, turbidity may also be measured, depending on specific scope of work.). Purging continues until these parameters stabilize.

Groundwater samples are collected using disposable bailers. The water samples are transferred from the bailer into appropriate containers. Pre-preserved containers, supplied by analytical laboratories, are used. When pre-preserved containers are not available, the laboratory is instructed to preserve the sample as appropriate. Duplicate samples are collected for the laboratory to use in maintaining quality assurance/quality control standards, as directed by the scope of work. The samples are labeled to include the job number, sample identification, collection date and time, analysis, preservation (if any), and the sample collector's initials. The water samples are placed in a cooler, maintained at 4°C for transport to the laboratory. Once collected in the field, all samples are maintained under chain of custody until delivered to the laboratory.

The chain of custody document includes the job number, type of preservation, if any, analysis requested, sample identification, date and time collected, and the sample collector's name. The chain of custody is signed and dated (including time of transfer) by each person who receives or surrenders the samples, beginning with the field personnel and ending with the laboratory personnel.

A laboratory supplied trip blank accompanies each sampling set. The trip blank is analyzed for some or all of the same compounds as the groundwater samples.

As requested by Chevron Environmental Management Company, the purge water and decontamination water generated during sampling activities is transported by Clean Harbors Environmental Services to Seaport Environmental located in Redwood City, California.



GETTLER - RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #351640 / 5781
 Site Address: 3535 Pierson Street
 City: Oakland, CA

Job Number: 385641
 Event Date: 3/15/16 (inclusive)
 Sampler: JH

Well ID: MW-A
 Well Diameter: 214 in.
 Total Depth: 45.01 ft.
 Depth to Water: 18.27 ft.
26.74 xVF = .17 = 4.54

Date Monitored: 3/15/16

Volume	3/4"= 0.02	1"= 0.04	2"= 0.17	3"= 0.38
Factor (VF)	4"= 0.66	5"= 1.02	6"= 1.50	12"= 5.80

Check if water column is less than 0.50 ft.

x3 case volume = Estimated Purge Volume: 13.63 gal.

Depth to Water w/ 80% Recharge ((Height of Water Column x 0.20) + DTW): 23.61

Purge Equipment:

Disposable Bailer _____
 Stainless Steel Bailer _____
 Stack Pump X
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Sampling Equipment:

Disposable Bailer X
 Pressure Bailer _____
 Metal Filters _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Time Started: _____ (2400 hrs)
 Time Completed: _____ (2400 hrs)
 Depth to Product: _____ ft
 Depth to Water: _____ ft
 Hydrocarbon Thickness: _____ ft
 Visual Confirmation/Description: _____
 Skimmer / Absorbant Sock (circle one)
 Amt Removed from Skimmer: _____ ltr
 Amt Removed from Well: _____ ltr
 Water Removed: _____ ltr

Start Time (purge): 0900
 Sample Time/Date: 0945 13/15/16
 Approx. Flow Rate: 1 gpm.
 Did well de-water? No If yes, Time: _____ Volume: _____ gal.

Weather Conditions: Clear
 Water Color: Clear Odor: Y / 10
 Sediment Description: None
 DTW @ Sampling: 21.77

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µS / mS / cm)	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>0905</u>	<u>5</u>	<u>7.68</u>	<u>809</u>	<u>16.6</u>	/	/
<u>0910</u>	<u>10</u>	<u>7.61</u>	<u>792</u>	<u>16.5</u>	/	/
<u>0914</u>	<u>14</u>	<u>7.45</u>	<u>774</u>	<u>16.3</u>	/	/

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
<u>MW-A</u>	<u>6</u> x voa vial	YES	HCL	BC LABS	TPH-GRO(8015)/BTEX+MTBE(8260)/8 OXYS(8260)
	<u>2</u> x 1 liter ambers	YES	NP	BC LABS	TPH-DRO w/sgc(8015M)

COMMENTS: _____

WERE PRE PURGE SAMPLES SUBMITTED TO THE LAB? Y / (N) DTW READING: _____ TIME: _____

Add/Replaced Gasket: _____ Add/Replaced Bolt: _____ Add/Replaced Lock: _____ Add/Replaced Plug: _____



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #351640 / 5781
 Site Address: 3535 Pierson Street
 City: Oakland, CA

Job Number: 385641
 Event Date: 3/15/16 (inclusive)
 Sampler: JH

Well ID: MW-4
 Well Diameter: 2 1/4 in.
 Total Depth: 24.74 ft.
 Depth to Water: 10.71 ft.
14.03 xVF .66 = 9.25

Date Monitored: 3/15/16

Volume	3/4"= 0.02	1"= 0.04	2"= 0.17	3"= 0.38
Factor (VF)	4"= 0.66	5"= 1.02	6"= 1.50	12"= 5.80

Check if water column is less than 0.50 ft.

x3 case volume = Estimated Purge Volume: 27.77 gal.

Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 13.51

Purge Equipment:

Disposable Bailer _____
 Stainless Steel Bailer _____
 Stack Pump X _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Sampling Equipment:

Disposable Bailer X _____
 Pressure Bailer _____
 Metal Filters _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Time Started: _____ (2400 hrs)
Time Completed: _____ (2400 hrs)
Depth to Product: _____ ft
Depth to Water: _____ ft
Hydrocarbon Thickness: _____ ft
Visual Confirmation/Description: _____
Skimmer / Absorbant Sock (circle one)
Amt Removed from Skimmer: _____ ltr
Amt Removed from Well: _____ ltr
Water Removed: _____ ltr

Start Time (purge): 0710
 Sample Time/Date: 1205 / 3/15/16
 Approx. Flow Rate: 1 gpm.
 Did well de-water? yes If yes, Time: 0720

Weather Conditions: Clear
 Water Color: clear Odor: Y 10
 Sediment Description: none
 Volume: 10 gal. DTW @ Sampling: 13.10

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µS / mS µmhos/cm)	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>0719</u>	<u>9</u>	<u>7.65</u>	<u>935</u>	<u>16.8</u>	/	/

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-4	6 x voa vial	YES	HCL	BC LABS	TPH-GRO(8015)/BTEX+MTBE(8260)/8 OXYS(8260)
	2 x 1 liter ambers	YES	NP	BC LABS	TPH-DRO w/sgc(8015M)

COMMENTS: _____

WERE PRE PURGE SAMPLES SUBMITTED TO THE LAB? Y (N) DTW READING: _____ TIME: _____

Add/Replaced Gasket: _____ Add/Replaced Bolt: _____ Add/Replaced Lock: _____ Add/Replaced Plug: _____



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #351640 / 5781 Job Number: 385641
 Site Address: 3535 Pierson Street Event Date: 3/15/16 (inclusive)
 City: Oakland, CA Sampler: JH

Well ID: MW-5 Date Monitored: 3/15/16
 Well Diameter: 6(4) in.
 Total Depth: 19.90 ft.
 Depth to Water: 11.54 ft. Check if water column is less than 0.50 ft.
8.36 xVF .66 = 5.51 x3 case volume = Estimated Purge Volume: 16.55 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 13.21

Volume	3/4"= 0.02	1"= 0.04	2"= 0.17	3"= 0.38
Factor (VF)	4"= 0.66	5"= 1.02	6"= 1.50	12"= 5.80

Purge Equipment:
 Disposable Bailer X
 Stainless Steel Bailer _____
 Stack Pump _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Sampling Equipment:
 Disposable Bailer X
 Pressure Bailer _____
 Metal Filters _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Time Started: _____ (2400 hrs)
 Time Completed: _____ (2400 hrs)
 Depth to Product: _____ ft
 Depth to Water: _____ ft
 Hydrocarbon Thickness: 0 ft
 Visual Confirmation/Description: _____
 Skimmer / Absorbant Sock (circle one)
 Amt Removed from Skimmer: _____ ltr
 Amt Removed from Well: _____ ltr
 Water Removed: _____ ltr

Start Time (purge): 0640 Weather Conditions: Clear
 Sample Time/Date: 1140 / 3/15/16 Water Color: Clear Odor: 0 / N Strong
 Approx. Flow Rate: 1 gpm. Sediment Description: Low
 Did well de-water? Yes If yes, Time: 0645 Volume: 5 gal. DTW @ Sampling: 12.88

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µS / mS / µmhos/cm)	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>0645</u>	<u>5</u>	<u>7.59</u>	<u>1594</u>	<u>16.5</u>	_____	_____
_____	_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____	_____

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-5	6 x voa vial	YES	HCL	BC LABS	TPH-GRO(8015)/BTEX+MTBE(8260)/8 OXYS(8260)
	2 x 1 liter ambers	YES	NP	BC LABS	TPH-DRO w/sgc(8015M)

COMMENTS: _____

WERE PRE PURGE SAMPLES SUBMITTED TO THE LAB? Y/N DTW READING: _____ TIME: _____

Add/Replaced Gasket: _____ Add/Replaced Bolt: _____ Add/Replaced Lock: _____ Add/Replaced Plug: _____



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #351640 / 5781
 Site Address: 3535 Pierson Street
 City: Oakland, CA

Job Number: 385641
 Event Date: 3/15/16 (inclusive)
 Sampler: JH

Well ID: MW-6
 Well Diameter: 214 in.
 Total Depth: 19.95 ft.
 Depth to Water: 11.33 ft.
8.62 xVF .17 = 1.46

Date Monitored: 3/15/16

Volume	3/4"= 0.02	1"= 0.04	2"= 0.17	3"= 0.38
Factor (VF)	4"= 0.66	5"= 1.02	6"= 1.50	12"= 5.80

Check if water column is less than 0.50 ft.
 x3 case volume = Estimated Purge Volume: 4.39 gal.

Depth to Water w/ 80% Recharge ((Height of Water Column x 0.20) + DTW): 13.05

Purge Equipment:
 Disposable Bailer: X
 Stainless Steel Bailer: _____
 Stack Pump: _____
 Peristaltic Pump: _____
 QED Bladder Pump: _____
 Other: _____

Sampling Equipment:
 Disposable Bailer: X
 Pressure Bailer: _____
 Metal Filters: _____
 Peristaltic Pump: _____
 QED Bladder Pump: _____
 Other: _____

Time Started: _____ (2400 hrs)
 Time Completed: _____ (2400 hrs)
 Depth to Product: _____ ft
 Depth to Water: _____ ft
 Hydrocarbon Thickness: _____ ft
 Visual Confirmation/Description: _____
 Skimmer / Absorbant Sock (circle one)
 Amt Removed from Skimmer: _____ ltr
 Amt Removed from Well: _____ ltr
 Water Removed: _____ ltr

Start Time (purge): 1030
 Sample Time/Date: 1400 13/15/16
 Approx. Flow Rate: _____ gpm.
 Did well de-water? yes If yes, Time: 1038

Weather Conditions: Clear
 Water Color: Clear Odor: Y10
 Sediment Description: Lub
 Volume: 3 gal. DTW @ Sampling: 12-80

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µS / mS / cmhos/cm)	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>1034</u>	<u>1.5</u>	<u>7.60</u>	<u>879</u>	<u>16.8</u>	/	/
<u>1038</u>	<u>3.0</u>	<u>7.82</u>	<u>862</u>	<u>16.7</u>	/	/
_____	_____	_____	_____	_____	_____	_____

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
<u>MW-6</u>	<u>6</u> x voa vial	<u>YES</u>	<u>HCL</u>	<u>BC LABS</u>	<u>TPH-GRO(8015)/BTEX+MTBE(8260)/8 OXYS(8260)</u>
	<u>2</u> x 1 liter ambers	<u>YES</u>	<u>NP</u>	<u>BC LABS</u>	<u>TPH-DRO w/sgc(8015M)</u>
_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____

COMMENTS: _____

WERE PRE PURGE SAMPLES SUBMITTED TO THE LAB? Y/(N) DTW READING: _____ TIME: _____

Add/Replaced Gasket: _____ Add/Replaced Bolt: _____ Add/Replaced Lock: _____ Add/Replaced Plug: _____



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #351640 / 5781 Job Number: 385641
 Site Address: 3535 Pierson Street Event Date: 3/15/16 (inclusive)
 City: Oakland, CA Sampler: JH

Well ID: MW-7 Date Monitored: 3/15/16
 Well Diameter: 2 1/4 in.
 Total Depth: 19.70 ft.
 Depth to Water: 12.83 ft. Check if water column is less than 0.50 ft.
6.87 xVF .17 = 1.16 x3 case volume = Estimated Purge Volume: 3.50 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 14.20

Volume	3/4"= 0.02	1"= 0.04	2"= 0.17	3"= 0.38
Factor (VF)	4"= 0.66	5"= 1.02	6"= 1.50	12"= 5.80

Purge Equipment:
 Disposable Bailer: X
 Stainless Steel Bailer: _____
 Stack Pump: _____
 Peristaltic Pump: _____
 QED Bladder Pump: _____
 Other: _____

Sampling Equipment:
 Disposable Bailer: X
 Pressure Bailer: _____
 Metal Filters: _____
 Peristaltic Pump: _____
 QED Bladder Pump: _____
 Other: _____

Time Started: _____ (2400 hrs)
 Time Completed: _____ (2400 hrs)
 Depth to Product: _____ ft
 Depth to Water: _____ ft
 Hydrocarbon Thickness: _____ ft
 Visual Confirmation/Description: _____
 Skimmer / Absorbant Sock (circle one)
 Amt Removed from Skimmer: _____ ltr
 Amt Removed from Well: _____ ltr
 Water Removed: _____ ltr

Start Time (purge): 1010 Weather Conditions: Clean
 Sample Time/Date: 1315 / 3/15/16 Water Color: Clean Odor: Y 10
 Approx. Flow Rate: — gpm. Sediment Description: None
 Did well de-water? Yes If yes, Time: 1014 Volume: 1.5 gal. DTW @ Sampling: 14.08

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µS / mS / µmhos/cm)	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>1014</u>	<u>15</u>	<u>7.60</u>	<u>738</u>	<u>16.6</u>	/	/
_____	_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____	_____

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
<u>MW-7</u>	<u>6</u> x voa vial	<u>YES</u>	<u>HCL</u>	<u>BC LABS</u>	<u>TPH-GRO(8015)/BTEX+MTBE(8260)/8 OXYS(8260)</u>
	<u>2</u> x 1 liter ambers	<u>YES</u>	<u>NP</u>	<u>BC LABS</u>	<u>TPH-DRO w/sgc(8015M)</u>
_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____
_____	_____	_____	_____	_____	_____

COMMENTS: _____

WERE PRE PURGE SAMPLES SUBMITTED TO THE LAB? Y / N DTW READING: 14.08 TIME: _____

Add/Replaced Gasket: _____ Add/Replaced Bolt: _____ Add/Replaced Lock: _____ Add/Replaced Plug: _____



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #351640 / 5781 Job Number: 385641
 Site Address: 3535 Pierson Street Event Date: 3/15/16 (inclusive)
 City: Oakland, CA Sampler: JH

Well ID: MW-8 Date Monitored: 3/15/16
 Well Diameter: 2 1/4 in.
 Total Depth: 19.93 ft.
 Depth to Water: 13.14 ft. Check if water column is less than 0.50 ft.
6.79 xVF .17 = 1.15 x3 case volume = Estimated Purge Volume: 3.46 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 14.49

Volume	3/4"= 0.02	1"= 0.04	2"= 0.17	3"= 0.38
Factor (VF)	4"= 0.66	5"= 1.02	6"= 1.50	12"= 5.80

Purge Equipment:
 Disposable Bailer X
 Stainless Steel Bailer _____
 Stack Pump _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Sampling Equipment:
 Disposable Bailer X
 Pressure Bailer _____
 Metal Filters _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Time Started: _____ (2400 hrs)
 Time Completed: _____ (2400 hrs)
 Depth to Product: _____ ft
 Depth to Water: _____ ft
 Hydrocarbon Thickness: _____ ft
 Visual Confirmation/Description: _____
 Skimmer / Absorbant Sock (circle one)
 Amt Removed from Skimmer: _____ ltr
 Amt Removed from Well: _____ ltr
 Water Removed: _____ ltr

Start Time (purge): 0745 Weather Conditions: Clean
 Sample Time/Date: 0830 / 3/15/16 Water Color: Clean Odor: Y / N
 Approx. Flow Rate: _____ gpm. Sediment Description: None
 Did well de-water? no If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 14.20

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µS / mS µmhos/cm)	Temperature (°C / F)	D.O. (mg/L)	ORP (mV)
<u>0745</u>	<u>1</u>	<u>7.64</u>	<u>905</u>	<u>16.7</u>	_____	_____
<u>0754</u>	<u>2</u>	<u>7.60</u>	<u>892</u>	<u>16.5</u>	_____	_____
<u>0800</u>	<u>3.5</u>	<u>7.38</u>	<u>881</u>	<u>16.4</u>	_____	_____

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
<u>MW-8</u>	<u>6</u> x voa vial	YES	HCL	BC LABS	TPH-GRO(8015)/BTEX+MTBE(8260)/8 OXYS(8260)
	<u>2</u> x 1 liter ambers	YES	NP	BC LABS	TPH-DRO w/sgc(8015M)

COMMENTS: _____

WERE PRE PURGE SAMPLES SUBMITTED TO THE LAB? Y / N DTW READING: _____ TIME: _____

Add/Replaced Gasket: _____ Add/Replaced Bolt: _____ Add/Replaced Lock: _____ Add/Replaced Plug: _____



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #351640 / 5781
 Site Address: 3535 Pierson Street
 City: Oakland, CA

Job Number: 385641
 Event Date: 3/15/16 (inclusive)
 Sampler: JH

Well ID: MW-9
 Well Diameter: 2.4 in.
 Total Depth: 19.66 ft.
 Depth to Water: 10.26 ft.
9.40 xVF = .17 = 1.59

Date Monitored: 3/15/16

Volume	3/4"= 0.02	1"= 0.04	2"= 0.17	3"= 0.38
Factor (VF)	4"= 0.66	5"= 1.02	6"= 1.50	12"= 5.80

Check if water column is less than 0.50 ft.

x3 case volume = Estimated Purge Volume: 4.79 gal.

Depth to Water w/ 80% Recharge ((Height of Water Column x 0.20) + DTW): 12.14

Purge Equipment:

Disposable Bailer: X
 Stainless Steel Bailer: _____
 Stack Pump: _____
 Peristaltic Pump: _____
 QED Bladder Pump: _____
 Other: _____

Sampling Equipment:

Disposable Bailer: X
 Pressure Bailer: _____
 Metal Filters: _____
 Peristaltic Pump: _____
 QED Bladder Pump: _____
 Other: _____

Time Started:	_____ (2400 hrs)
Time Completed:	_____ (2400 hrs)
Depth to Product:	_____ ft
Depth to Water:	_____ ft
Hydrocarbon Thickness:	_____ ft
Visual Confirmation/Description:	_____
Skimmer / Absorbant Sock (circle one)	_____
Amt Removed from Skimmer:	_____ ltr
Amt Removed from Well:	_____ ltr
Water Removed:	_____ ltr

Start Time (purge): 0610
 Sample Time/Date: 0615 / 3/15/16
 Approx. Flow Rate: — gpm.
 Did well de-water? NO If yes, Time: _____ Volume: _____ gal.

Weather Conditions: Clean
 Water Color: Clean Odor: Y / N
 Sediment Description: None
 DTW @ Sampling: 11.98

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µS/mS / µmhos/cm)	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>0614</u>	<u>1.5</u>	<u>8.39</u>	<u>937</u>	<u>16.8</u>	/	/
<u>0618</u>	<u>3.0</u>	<u>8.20</u>	<u>920</u>	<u>16.7</u>	/	/
<u>0623</u>	<u>5.0</u>	<u>8.13</u>	<u>904</u>	<u>16.6</u>	/	/

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-9	6 x voa vial	YES	HCL	BC LABS	TPH-GRO(8015)/BTEX+MTBE(8260)/8 OXYS(8260)
	2 x 1 liter ambers	YES	NP	BC LABS	TPH-DRO w/sgc(8015M)

COMMENTS: Slow Recovery


WERE PRE PURGE SAMPLES SUBMITTED TO THE LAB? Y / N DTW READING: _____ TIME: _____

Add/Replaced Gasket: _____ Add/Replaced Bolt: _____ Add/Replaced Lock: _____ Add/Replaced Plug: _____


CHAIN OF CUSTODY FORM

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

COC _____ of _____

Union Oil Site ID: 5781	Union Oil Consultant: AECOM	ANALYSES REQUIRED Turnaround Time (TAT): Standard <input checked="" type="checkbox"/> 24 Hours <input type="checkbox"/> 48 Hours <input type="checkbox"/> 72 Hours <input type="checkbox"/> Special Instructions Notes / Comments
Site Global ID: T0600101467	Consultant Contact: Chad Rosen	
Site Address: 3535 Paerisun St Oakland CA	Consultant Phone No.: 925-764-4027	
Union Oil PM: N. ARCEVENOX	Sampling Company: Letten Petroleum	
Union Oil PM Phone No.: 925-790-6912	Sampled By (PRINT): Jim Heenan	
Charge Code: NWRTB-0 351640 -0-LAB	Sampler Signature: 	
This is a LEGAL document. ALL fields must be filled out CORRECTLY and COMPLETELY. BC Laboratories, Inc. Project Manager: Molly Meyers 4100 Atlas Court, Bakersfield, CA 93308 Phone No. 661-327-4911		

SAMPLE ID				Sample Time	# of Containers	TPH - Diesel by EPA 8015 (5/12/15) (5/21/15)	TPH - G by GC/MS (5/21/15)	BTEX/MTBE/OPPB by EPA 8260B	Ethanol by EPA 8260B	EPA 8260B Full List with OXYS	80212 (5260B)									
Field Point Name	Matrix	Depth	Date (yymmdd)																	
QA	W-S-A		160215		2	Y	Y													
MW-A	W-S-A			0945	8	Y					X									
MW-4	W-S-A			1205																
MW-5	W-S-A			1140																
MW-6	W-S-A			1400																
MW-7	W-S-A			1315																
MW-8	W-S-A			0830																
MW-9	W-S-A			1115																
	W-S-A																			
	W-S-A																			
	W-S-A																			
	W-S-A																			

Relinquished By:  Company: L. King Date / Time: 3/15/16 7:00	Relinquished By: _____ Company: _____ Date / Time: _____	Relinquished By: _____ Company: _____ Date / Time: _____
Received By: Harry Bryan Company: Br Lab Date / Time: 3-16-16 1510	Received By: _____ Company: _____ Date / Time: _____	Received By: _____ Company: _____ Date / Time: _____

ATTACHMENT F

**LABORATORY ANALYTICAL
REPORT AND CHAIN-OF-
CUSTODY DOCUMENTATION**



Date of Report: 03/30/2016

Chad Roper

AECOM

1220 Avenida Acaso
Camarillo, CA 93012

Client Project: 351640
BCL Project: 5781
BCL Work Order: 1608078
Invoice ID: B231133

Enclosed are the results of analyses for samples received by the laboratory on 3/16/2016. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Contact Person: Molly Meyers
Client Service Rep

Authorized Signature

Certifications: CA ELAP #1186; NV #CA00014; OR ELAP #4032-001; AK UST101

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



Table of Contents

Sample Information

Chain of Custody and Cooler Receipt form.....	3
Laboratory / Client Sample Cross Reference.....	5

Sample Results

1608078-01 - QA-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	8
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	9
1608078-02 - MW-A-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	10
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	11
Total Petroleum Hydrocarbons (Silica Gel Treated).....	12
1608078-03 - MW-4-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	13
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	14
Total Petroleum Hydrocarbons (Silica Gel Treated).....	15
1608078-04 - MW-5-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	16
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	17
Total Petroleum Hydrocarbons (Silica Gel Treated).....	18
1608078-05 - MW-6-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	19
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	20
Total Petroleum Hydrocarbons (Silica Gel Treated).....	21
1608078-06 - MW-7-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	22
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	23
Total Petroleum Hydrocarbons (Silica Gel Treated).....	24
1608078-07 - MW-8-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	25
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	26
Total Petroleum Hydrocarbons (Silica Gel Treated).....	27
1608078-08 - MW-9-W-160315	
Volatile Organic Analysis (EPA Method 8260B).....	28
Purgeable Aromatics and Total Petroleum Hydrocarbons.....	29
Total Petroleum Hydrocarbons (Silica Gel Treated).....	30

Quality Control Reports

Volatile Organic Analysis (EPA Method 8260B)	
Method Blank Analysis.....	31
Laboratory Control Sample.....	32
Precision and Accuracy.....	33
Purgeable Aromatics and Total Petroleum Hydrocarbons	
Method Blank Analysis.....	34
Laboratory Control Sample.....	35
Precision and Accuracy.....	36
Total Petroleum Hydrocarbons (Silica Gel Treated)	
Method Blank Analysis.....	37
Laboratory Control Sample.....	38
Precision and Accuracy.....	39

Notes

Notes and Definitions.....	40
----------------------------	----

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



BC Laboratories, Inc.

Environmental Testing Laboratory Since 1949

CHAIN OF CUSTODY FORM

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

Union Oil Consultant: **AFCOM** 16-08078 of

Union Oil Site ID: **5781**

Site Global ID: **T0600101467**

Site Address: **3535 Peetersaw St
Oakland CA**

Union Oil PM: **N. ARCEWEX**

Union Oil PM Phone No.: **925-790-6912**

Charge Code: **NWRTB-0351640-0-LAB**

This is a LEGAL document. ALL fields must be filled out CORRECTLY and COMPLETELY.

SAMPLE ID		Matrix	Depth	Date (yyymmdd)	Sample Time	# of Containers	Relinquished By	Company	Date / Time
GA	W-S-A	-1	160315	0945	2	TPH - Diesel by EPA 8015	[Signature]	BCLAB	3/16/16 18:30
MW-A	W-S-A	-2		1205	8	TPH - G by EPA 8260B	[Signature]	BCLAB	3/16/16 21:50
MW-4	W-S-A	-3		1140		Ethanol by EPA 8260B	[Signature]	BCLAB	3/16/16 21:50
MW-5	W-S-A	-4		1400		BTEX/MTBE/PAHs by EPA 8260B	[Signature]	BCLAB	3/16/16 21:50
MW-6	W-S-A	-5		1315		EPA 8260B Full List with OXYS	[Signature]	BCLAB	3/16/16 21:50
MW-7	W-S-A	-6		0830			[Signature]	BCLAB	3/16/16 21:50
MW-8	W-S-A	-7		1115			[Signature]	BCLAB	3/16/16 21:50
MW-9	W-S-A	-8					[Signature]	BCLAB	3/16/16 21:50
	W-S-A								
	W-S-A								
	W-S-A								
	W-S-A								

Relinquished By: [Signature] Date / Time: 3/15/16 1600

Received By: [Signature] Date / Time: 3/16/16 1510

Relinquished By: [Signature] Date / Time: 3/16/16 1830

Received By: [Signature] Date / Time: 3/16/16 18:30

Special Instructions: Turnaround Time (TAT): Standard 24 Hours 48 Hours 72 Hours

Notes / Comments: [Handwritten notes and signatures]

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



BC LABORATORIES INC. COOLER RECEIPT FORM Page 2 Of 1

Submission #: 16-08078

SHIPPING INFORMATION: Fed Ex UPS Ontrac Hand Delivery BC Lab Field Service Other (Specify) _____

SHIPPING CONTAINER: Ice Chest None Box Other (Specify) _____

FREE LIQUID: YES NO

Refrigerant: Ice Blue Ice None Other Comments: _____

Custody Seals: Ice Chest Containers None Intact? Yes No Intact? Yes No Comments: _____

All samples received? Yes No All samples containers intact? Yes No Description(s) match COC? Yes No

COC Received: YES NO

Emissivity: 0.95 Container: AMBER Thermometer ID: H208 Date/Time: 3/16/16 2:15⁰

Temperature: (A) 0.4 °C / (C) 0.5 °C Analyst Init: MM

SAMPLE CONTAINERS	SAMPLE NUMBERS									
	1	2	3	4	5	6	7	8	9	10
QT PE UNPRES										
4oz / 8oz / 16oz PE UNPRES										
2oz Cr ⁶										
QT INORGANIC CHEMICAL METALS										
INORGANIC CHEMICAL METALS 4oz / 8oz / 16oz										
PT CYANIDE										
PT NITROGEN FORMS										
PT TOTAL SULFIDE										
2oz. NITRATE / NITRITE										
PT TOTAL ORGANIC CARBON										
PT CHEMICAL OXYGEN DEMAND										
PIA PHENOLICS										
40ml VOA VIAL TRAVEL BLANK <u>094</u>	<u>AS</u>									
40ml VOA VIAL <u>096</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>	<u>A→F</u>
QT EPA 1664										
PT ODOR										
RADIOLOGICAL										
BACTERIOLOGICAL										
40 ml VOA VIAL- 504										
QT EPA 508/608/8080										
QT EPA 515.1/8150										
QT EPA 525										
QT EPA 525 TRAVEL BLANK										
40ml EPA 547										
40ml EPA 531.1										
8oz EPA 548										
QT EPA 549										
QT EPA 8015M	<u>PL</u>									
QT EPA 8270	<u>3176</u>									
8oz / 16oz / 32oz AMBER	<u>GH</u>	<u>GH</u>	<u>GH</u>	<u>GH</u>	<u>GH</u>	<u>GH</u>	<u>GH</u>	<u>GH</u>	<u>GH</u>	<u>GH</u>
8oz / 16oz / 32oz JAR										
SOIL SLEEVE										
PCB VIAL										
PLASTIC BAG										
TEDLAR BAG										
FERROUS IRON										
ENCORE										
SMART KIT										
SUMMA CANISTER										

Comments: _____

Sample Numbering Completed By: MM Date/Time: 3-17-16 0830 Rev 20 07/24/2015

A = Actual / C = Corrected

(S:\WPDoc\WordPerfect\LAB_DDCS\FORMS\SAMRECrev 20)

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Laboratory / Client Sample Cross Reference

Laboratory	Client Sample Information
------------	---------------------------

1608078-01	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: QA-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 00:00 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): QA Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

1608078-02	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: MW-A-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 09:45 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): MW-A Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

1608078-03	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: MW-4-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 12:05 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): MW-4 Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Laboratory / Client Sample Cross Reference

Laboratory	Client Sample Information
------------	---------------------------

1608078-04	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: MW-5-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 11:40 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): MW-5 Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

1608078-05	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: MW-6-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 14:00 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): MW-6 Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

1608078-06	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: MW-7-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 13:15 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): MW-7 Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Laboratory / Client Sample Cross Reference

Laboratory	Client Sample Information
------------	---------------------------

1608078-07	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: MW-8-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 08:30 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): MW-8 Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

1608078-08	COC Number: --- Project Number: 5781 Sampling Location: --- Sampling Point: MW-9-W-160315 Sampled By: GRD	Receive Date: 03/16/2016 21:50 Sampling Date: 03/15/2016 11:15 Sample Depth: --- Lab Matrix: Water Sample Type: Trip Blank Delivery Work Order: Global ID: T0600101467 Location ID (FieldPoint): MW-9 Matrix: W Sample QC Type (SACode): CS Cooler ID:
-------------------	--	---

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-01	Client Sample Name: 5781, QA-W-160315, 3/15/2016 12:00:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	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	ND	ug/L	0.50		EPA-8260B	ND		1
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	ND	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
1,2-Dichloroethane-d4 (Surrogate)	105	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	102	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	96.3	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/17/16 18:54	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-01	Client Sample Name: 5781, QA-W-160315, 3/15/2016 12:00:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	ND	ug/L	50		EPA-8015B	ND		1
a,a,a-Trifluorotoluene (FID Surrogate)	100	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/17/16 22:05	AKM	GC-V9	1	BZC1734

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-02	Client Sample Name: 5781, MW-A-W-160315, 3/15/2016 9:45:00AM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	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	ND	ug/L	0.50		EPA-8260B	ND		1
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	ND	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
1,2-Dichloroethane-d4 (Surrogate)	100	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	102	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	96.4	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/17/16 19:14	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-02	Client Sample Name: 5781, MW-A-W-160315, 3/15/2016 9:45:00AM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	ND	ug/L	50		EPA-8015B	ND		1
a,a,a-Trifluorotoluene (FID Surrogate)	102	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/17/16 18:20	AKM	GC-V9	1	BZC1734

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

BCL Sample ID: 1608078-02	Client Sample Name: 5781, MW-A-W-160315, 3/15/2016 9:45:00AM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Diesel Range Organics (C12 - C24)	ND	ug/L	50		Luft/TPHd	ND		1
Tetracosane (Surrogate)	61.6	%	40 - 140 (LCL - UCL)		Luft/TPHd			1
Capric acid (Reverse Surrogate)	0	%	0 - 1 (LCL - UCL)		Luft/TPHd			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	Luft/TPHd	03/22/16	03/29/16 09:28	RSM	GC-5	1	BZC2922

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-03	Client Sample Name: 5781, MW-4-W-160315, 3/15/2016 12:05:00PM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	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	ND	ug/L	0.50		EPA-8260B	ND		1
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	ND	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
1,2-Dichloroethane-d4 (Surrogate)	98.8	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	100	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	96.0	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/17/16 19:33	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-03	Client Sample Name: 5781, MW-4-W-160315, 3/15/2016 12:05:00PM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	ND	ug/L	50		EPA-8015B	ND		1
a,a,a-Trifluorotoluene (FID Surrogate)	97.0	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/17/16 22:25	AKM	GC-V9	1	BZC1734

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

BCL Sample ID: 1608078-03	Client Sample Name: 5781, MW-4-W-160315, 3/15/2016 12:05:00PM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Diesel Range Organics (C12 - C24)	ND	ug/L	50		Luft/TPHd	ND		1
Tetracosane (Surrogate)	71.6	%	40 - 140 (LCL - UCL)		Luft/TPHd			1
Capric acid (Reverse Surrogate)	0	%	0 - 1 (LCL - UCL)		Luft/TPHd			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	Luft/TPHd	03/22/16	03/29/16 09:43	RSM	GC-5	1	BZC2922

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-04	Client Sample Name: 5781, MW-5-W-160315, 3/15/2016 11:40:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Benzene	2.8	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	13	ug/L	0.50		EPA-8260B	ND		1
Methyl t-butyl ether	0.70	ug/L	0.50		EPA-8260B	ND		1
Toluene	1.0	ug/L	0.50		EPA-8260B	ND		1
Total Xylenes	9.4	ug/L	1.0		EPA-8260B	ND		1
t-Amyl Methyl ether	ND	ug/L	0.50		EPA-8260B	ND		1
t-Butyl alcohol	ND	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
1,2-Dichloroethane-d4 (Surrogate)	98.2	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	105	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	102	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/17/16 19:52	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-04	Client Sample Name: 5781, MW-5-W-160315, 3/15/2016 11:40:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	2200	ug/L	500		EPA-8015B	ND	A01	1
a,a,a-Trifluorotoluene (FID Surrogate)	96.5	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/18/16 00:08	AKM	GC-V9	10	BZC1734

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

BCL Sample ID: 1608078-04	Client Sample Name: 5781, MW-5-W-160315, 3/15/2016 11:40:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Diesel Range Organics (C12 - C24)	1300	ug/L	250		Luft/TPHd	ND	A01,A52	1
Tetracosane (Surrogate)	69.2	%	40 - 140 (LCL - UCL)		Luft/TPHd			1
Capric acid (Reverse Surrogate)	0	%	0 - 1 (LCL - UCL)		Luft/TPHd			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	Luft/TPHd	03/22/16	03/29/16 14:16	RSM	GC-5	5	BZC2922

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-05	Client Sample Name: 5781, MW-6-W-160315, 3/15/2016 2:00:00PM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	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	ND	ug/L	0.50		EPA-8260B	ND		1
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	ND	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
1,2-Dichloroethane-d4 (Surrogate)	99.4	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	98.8	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	102	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/18/16 12:38	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-05	Client Sample Name: 5781, MW-6-W-160315, 3/15/2016 2:00:00PM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	ND	ug/L	50		EPA-8015B	ND		1
a,a,a-Trifluorotoluene (FID Surrogate)	97.0	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/17/16 22:46	AKM	GC-V9	1	BZC1734

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

BCL Sample ID: 1608078-05	Client Sample Name: 5781, MW-6-W-160315, 3/15/2016 2:00:00PM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Diesel Range Organics (C12 - C24)	ND	ug/L	50		Luft/TPHd	ND		1
Tetracosane (Surrogate)	76.3	%	40 - 140 (LCL - UCL)		Luft/TPHd			1
Capric acid (Reverse Surrogate)	0	%	0 - 1 (LCL - UCL)		Luft/TPHd			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	Luft/TPHd	03/22/16	03/29/16 10:11	RSM	GC-5	1	BZC2922

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-06	Client Sample Name: 5781, MW-7-W-160315, 3/15/2016 1:15:00PM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	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	ND	ug/L	0.50		EPA-8260B	ND		1
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	ND	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
1,2-Dichloroethane-d4 (Surrogate)	103	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	105	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	97.2	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/18/16 12:58	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-06	Client Sample Name: 5781, MW-7-W-160315, 3/15/2016 1:15:00PM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	ND	ug/L	50		EPA-8015B	ND		1
a,a,a-Trifluorotoluene (FID Surrogate)	102	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/17/16 23:06	AKM	GC-V9	1	BZC1734

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

BCL Sample ID: 1608078-06	Client Sample Name: 5781, MW-7-W-160315, 3/15/2016 1:15:00PM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Diesel Range Organics (C12 - C24)	ND	ug/L	50		Luft/TPHd	ND		1
Tetracosane (Surrogate)	59.3	%	40 - 140 (LCL - UCL)		Luft/TPHd			1
Capric acid (Reverse Surrogate)	0	%	0 - 1 (LCL - UCL)		Luft/TPHd			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	Luft/TPHd	03/22/16	03/29/16 10:26	RSM	GC-5	1	BZC2922

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-07	Client Sample Name: 5781, MW-8-W-160315, 3/15/2016 8:30:00AM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	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	ND	ug/L	0.50		EPA-8260B	ND		1
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	ND	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
1,2-Dichloroethane-d4 (Surrogate)	102	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	101	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	97.5	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/18/16 13:18	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-07	Client Sample Name: 5781, MW-8-W-160315, 3/15/2016 8:30:00AM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	ND	ug/L	50		EPA-8015B	ND		1
a,a,a-Trifluorotoluene (FID Surrogate)	106	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/17/16 23:27	AKM	GC-V9	1	BZC1734

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

BCL Sample ID: 1608078-07	Client Sample Name: 5781, MW-8-W-160315, 3/15/2016 8:30:00AM
----------------------------------	---

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Diesel Range Organics (C12 - C24)	ND	ug/L	50		Luft/TPHd	ND		1
Tetracosane (Surrogate)	59.8	%	40 - 140 (LCL - UCL)		Luft/TPHd			1
Capric acid (Reverse Surrogate)	0	%	0 - 1 (LCL - UCL)		Luft/TPHd			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	Luft/TPHd	03/22/16	03/29/16 10:40	RSM	GC-5	1	BZC2922

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

BCL Sample ID: 1608078-08	Client Sample Name: 5781, MW-9-W-160315, 3/15/2016 11:15:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	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	ND	ug/L	0.50		EPA-8260B	ND		1
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	ND	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
1,2-Dichloroethane-d4 (Surrogate)	102	%	75 - 125 (LCL - UCL)		EPA-8260B			1
Toluene-d8 (Surrogate)	102	%	80 - 120 (LCL - UCL)		EPA-8260B			1
4-Bromofluorobenzene (Surrogate)	98.0	%	80 - 120 (LCL - UCL)		EPA-8260B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8260B	03/17/16	03/17/16 21:10	IO1	MS-V10	1	BZC1672

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

BCL Sample ID: 1608078-08	Client Sample Name: 5781, MW-9-W-160315, 3/15/2016 11:15:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Gasoline Range Organics (C4 - C12)	ND	ug/L	50		EPA-8015B	ND		1
a,a,a-Trifluorotoluene (FID Surrogate)	97.8	%	70 - 130 (LCL - UCL)		EPA-8015B			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	EPA-8015B	03/17/16	03/17/16 23:48	AKM	GC-V9	1	BZC1705

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

BCL Sample ID: 1608078-08	Client Sample Name: 5781, MW-9-W-160315, 3/15/2016 11:15:00AM
----------------------------------	--

Constituent	Result	Units	PQL	MDL	Method	MB Bias	Lab Quals	Run #
Diesel Range Organics (C12 - C24)	ND	ug/L	50		Luft/TPHd	ND		1
Tetracosane (Surrogate)	75.4	%	40 - 140 (LCL - UCL)		Luft/TPHd			1
Capric acid (Reverse Surrogate)	0	%	0 - 1 (LCL - UCL)		Luft/TPHd			1

Run #	Method	Prep Date	Run Date/Time	Analyst	Instrument	Dilution	QC Batch ID
1	Luft/TPHd	03/22/16	03/29/16 11:24	RSM	GC-5	1	BZC2922

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

Quality Control Report - Method Blank Analysis

Constituent	QC Sample ID	MB Result	Units	PQL	MDL	Lab Quals
QC Batch ID: BZC1672						
Benzene	BZC1672-BLK1	ND	ug/L	0.50		
1,2-Dibromoethane	BZC1672-BLK1	ND	ug/L	0.50		
1,2-Dichloroethane	BZC1672-BLK1	ND	ug/L	0.50		
Ethylbenzene	BZC1672-BLK1	ND	ug/L	0.50		
Methyl t-butyl ether	BZC1672-BLK1	ND	ug/L	0.50		
Toluene	BZC1672-BLK1	ND	ug/L	0.50		
Total Xylenes	BZC1672-BLK1	ND	ug/L	1.0		
t-Amyl Methyl ether	BZC1672-BLK1	ND	ug/L	0.50		
t-Butyl alcohol	BZC1672-BLK1	ND	ug/L	10		
Diisopropyl ether	BZC1672-BLK1	ND	ug/L	0.50		
Ethanol	BZC1672-BLK1	ND	ug/L	250		
Ethyl t-butyl ether	BZC1672-BLK1	ND	ug/L	0.50		
1,2-Dichloroethane-d4 (Surrogate)	BZC1672-BLK1	103	%	75 - 125 (LCL - UCL)		
Toluene-d8 (Surrogate)	BZC1672-BLK1	103	%	80 - 120 (LCL - UCL)		
4-Bromofluorobenzene (Surrogate)	BZC1672-BLK1	104	%	80 - 120 (LCL - UCL)		

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

Quality Control Report - Laboratory Control Sample

Constituent	QC Sample ID	Type	Result	Spike Level	Units	Percent Recovery	RPD	Control Limits		Lab
								Percent Recovery	RPD	
QC Batch ID: BZC1672										
Benzene	BZC1672-BS1	LCS	31.340	25.000	ug/L	125		70 - 130		
Toluene	BZC1672-BS1	LCS	29.150	25.000	ug/L	117		70 - 130		
1,2-Dichloroethane-d4 (Surrogate)	BZC1672-BS1	LCS	9.8900	10.000	ug/L	98.9		75 - 125		
Toluene-d8 (Surrogate)	BZC1672-BS1	LCS	9.6100	10.000	ug/L	96.1		80 - 120		
4-Bromofluorobenzene (Surrogate)	BZC1672-BS1	LCS	11.570	10.000	ug/L	116		80 - 120		

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Volatile Organic Analysis (EPA Method 8260B)

Quality Control Report - Precision & Accuracy

Constituent	Type	Source Sample ID	Source Result	Result	Spike Added	Units	RPD	Control Limits		Lab Quals
								Percent Recovery	Percent Recovery	
QC Batch ID: BZC1672		Used client sample: N								
Benzene	MS	1607274-18	ND	32.430	25.000	ug/L		130		70 - 130
	MSD	1607274-18	ND	31.010	25.000	ug/L	4.5	124	20	70 - 130
Toluene	MS	1607274-18	ND	30.530	25.000	ug/L		122		70 - 130
	MSD	1607274-18	ND	30.430	25.000	ug/L	0.3	122	20	70 - 130
1,2-Dichloroethane-d4 (Surrogate)	MS	1607274-18	ND	9.7900	10.000	ug/L		97.9		75 - 125
	MSD	1607274-18	ND	9.7400	10.000	ug/L	0.5	97.4		75 - 125
Toluene-d8 (Surrogate)	MS	1607274-18	ND	10.050	10.000	ug/L		100		80 - 120
	MSD	1607274-18	ND	10.000	10.000	ug/L	0.5	100		80 - 120
4-Bromofluorobenzene (Surrogate)	MS	1607274-18	ND	10.370	10.000	ug/L		104		80 - 120
	MSD	1607274-18	ND	10.720	10.000	ug/L	3.3	107		80 - 120

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

Quality Control Report - Method Blank Analysis

Constituent	QC Sample ID	MB Result	Units	PQL	MDL	Lab Quals
QC Batch ID: BZC1705						
Gasoline Range Organics (C4 - C12)	BZC1705-BLK1	ND	ug/L	50		
a,a,a-Trifluorotoluene (FID Surrogate)	BZC1705-BLK1	95.4	%		70 - 130 (LCL - UCL)	
QC Batch ID: BZC1734						
Gasoline Range Organics (C4 - C12)	BZC1734-BLK1	ND	ug/L	50		
a,a,a-Trifluorotoluene (FID Surrogate)	BZC1734-BLK1	92.0	%		70 - 130 (LCL - UCL)	

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

Quality Control Report - Laboratory Control Sample

Constituent	QC Sample ID	Type	Result	Spike Level	Units	Percent Recovery	RPD	Control Limits		Lab
								Percent Recovery	RPD	
QC Batch ID: BZC1705										
Gasoline Range Organics (C4 - C12)	BZC1705-BS1	LCS	962.66	1000.0	ug/L	96.3		85 - 115		
a,a,a-Trifluorotoluene (FID Surrogate)	BZC1705-BS1	LCS	41.600	40.000	ug/L	104		70 - 130		
QC Batch ID: BZC1734										
Gasoline Range Organics (C4 - C12)	BZC1734-BS1	LCS	953.00	1000.0	ug/L	95.3		85 - 115		
a,a,a-Trifluorotoluene (FID Surrogate)	BZC1734-BS1	LCS	38.042	40.000	ug/L	95.1		70 - 130		

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Purgeable Aromatics and Total Petroleum Hydrocarbons

Quality Control Report - Precision & Accuracy

Constituent	Type	Source Sample ID	Source Result	Result	Spike Added	Units	RPD	Control Limits		Lab Quals
								Percent Recovery	Percent Recovery	
QC Batch ID: BZC1705		Used client sample: N								
Gasoline Range Organics (C4 - C12)	MS	1603129-99	ND	912.83	1000.0	ug/L		91.3		70 - 130
	MSD	1603129-99	ND	910.14	1000.0	ug/L	0.3	91.0	20	70 - 130
a,a,a-Trifluorotoluene (FID Surrogate)	MS	1603129-99	ND	39.902	40.000	ug/L		99.8		70 - 130
	MSD	1603129-99	ND	40.268	40.000	ug/L	0.9	101		70 - 130
QC Batch ID: BZC1734		Used client sample: N								
Gasoline Range Organics (C4 - C12)	MS	1607274-12	ND	903.26	1000.0	ug/L		90.3		70 - 130
	MSD	1607274-12	ND	850.04	1000.0	ug/L	6.1	85.0	20	70 - 130
a,a,a-Trifluorotoluene (FID Surrogate)	MS	1607274-12	ND	36.053	40.000	ug/L		90.1		70 - 130
	MSD	1607274-12	ND	36.168	40.000	ug/L	0.3	90.4		70 - 130

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

Quality Control Report - Method Blank Analysis

Constituent	QC Sample ID	MB Result	Units	PQL	MDL	Lab Quals
QC Batch ID: BZC2922						
Diesel Range Organics (C12 - C24)	BZC2922-BLK1	ND	ug/L	50		
Tetracosane (Surrogate)	BZC2922-BLK1	64.9	%	40 - 140 (LCL - UCL)		
Capric acid (Reverse Surrogate)	BZC2922-BLK1	0	%	0 - 1 (LCL - UCL)		

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

Quality Control Report - Laboratory Control Sample

Constituent	QC Sample ID	Type	Result	Spike Level	Units	Percent Recovery	RPD	Control Limits		Lab
								Percent Recovery	RPD	
QC Batch ID: BZC2922										
Diesel Range Organics (C12 - C24)	BZC2922-BS1	LCS	280.50	500.00	ug/L	56.1		20 - 110		
Tetracosane (Surrogate)	BZC2922-BS1	LCS	13.986	20.000	ug/L	69.9		40 - 140		
Capric acid (Reverse Surrogate)	BZC2922-BS1	LCS	ND	100.00	ug/L	0		0 - 1		

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Total Petroleum Hydrocarbons (Silica Gel Treated)

Quality Control Report - Precision & Accuracy

Constituent	Type	Source Sample ID	Source Result	Result	Spike Added	Units	RPD	Control Limits		Lab Quals
								Percent Recovery	RPD	
QC Batch ID: BZC2922		Used client sample: N								
Diesel Range Organics (C12 - C24)	MS	1428224-11	ND	203.50	500.00	ug/L		40.7		20 - 110
	MSD	1428224-11	ND	251.90	500.00	ug/L	21.3	50.4	30	20 - 110
Tetracosane (Surrogate)	MS	1428224-11	ND	13.660	20.000	ug/L		68.3		40 - 140
	MSD	1428224-11	ND	13.187	20.000	ug/L	3.5	65.9		40 - 140
Capric acid (Reverse Surrogate)	MS	1428224-11	ND	ND	100.00	ug/L		0		0 - 1
	MSD	1428224-11	ND	ND	100.00	ug/L		0		0 - 1

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.



AECOM
1220 Avenida Acaso
Camarillo, CA 93012

Reported: 03/30/2016 12:54
Project: 5781
Project Number: 351640
Project Manager: Chad Roper

Notes And Definitions

- MDL Method Detection Limit
- ND Analyte Not Detected
- PQL Practical Quantitation Limit
- A01 Detection and quantitation limits are raised due to sample dilution.
- A52 Chromatogram not typical of diesel.