



**CONESTOGA-ROVERS
& ASSOCIATES**

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TRANSMITTAL

DATE: April 30, 2014 REFERENCE NO.: 581000

PROJECT NAME: 800 Franklin Street, Oakland

To: Mr. Jerry Wickham
Alameda County Environmental Health
1131 Harbor Bay Parkway, Suite 250
Alameda, California
94502-6577

RECEIVED

By Alameda County Environmental Health at 4:35 pm, May 01, 2014

Please find enclosed: Draft Final
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 Prints

Sent via: Mail Same Day Courier
 Overnight Courier Other Geotracker and ACEH ftp uploads

QUANTITY	DESCRIPTION
1	Groundwater Monitoring Report – First Half 2014

As Requested For Review and Comment
 For Your Use

COMMENTS:

Should you have any questions regarding the contents of the document, please contact Bryan Fong at (510) 420-3369. Thank you.

Copy to: Ms. Anny Chiu

Completed by: Bryan A. Fong
[Please Print]

Signed: 

Filing: **Correspondence File**

With respect to:

Groundwater Monitoring Report-First Half 2014

Dated April 30, 2014

Fuel Leak Case No. RO0000196

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

Tommy Chiu
Mr. Tommy Chiu

4/14/14
Date



Groundwater Monitoring Report – First Half 2014

**Chiu Property
800 Franklin Street
Oakland, California**

AGENCY CASE NO. RO0000196

**APRIL 30, 2014
REF. NO. 581000 (17)**

**Prepared by:
Conestoga-Rovers
& Associates**

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Section 1.0 Introduction

On behalf of Mr. Tommy Chiu, Conestoga-Rovers & Associates, Inc. (CRA) is submitting this *Groundwater Monitoring Report – First Half 2014*. This report presents a summary of groundwater monitoring and sampling event activities conducted in March 2014, analytical results of samples collected during this event, as well as activities anticipated to occur during the upcoming Second Half of 2014 at the subject Site, located at 800 Franklin Street, Oakland, California (**Figure 1**). This groundwater monitoring event was conducted in accordance with guidelines issued by Alameda County Department of Environmental Health (ACEH).

1.1 Site Information

Site Address	800 Franklin Street, Oakland
Site Use	Commercial Building
Client and Contact	Tommy Chiu
Consultant and Contact Person	CRA, Bryan A. Fong
Lead Agency and Contact	Alameda County Environmental Health, Jerry Wickham, P.G.
Agency Case No.	RO0000196

Section 2.0 Site Activities and Results

2.1 Current Sampling Event Activities

On March 13, 2014, Confluence Environmental, Inc. (Confluence) conducted groundwater monitoring and sampling activities at the subject Site. Confluence measured water levels in wells MW-1, MW-2, MW-3A, and MW-4 through MW-7, and collected groundwater samples from monitoring wells MW-2, MW-3A, MW-6, and MW-7 (**Figures 2 & 3**). Well construction details are provided in **Table 1**. CRA's *Standard Field Procedures for Groundwater Monitoring and Sampling* is presented as **Appendix A**. The laboratory analytical reports and sample chain-of-custody (COC) documents are presented as **Appendix B**, and copies of the field data sheets are included as **Appendix C**.

2.1.1 Water Level Measurements

Depth-to-water measurements were recorded to the nearest 0.01-foot from the surveyed reference elevation on the top of the well casing (TOC). Measurements were collected using a

conductance-actuated well sounder. Depth to groundwater and calculated groundwater elevation data are presented in **Table 2**.

2.1.2 Groundwater Sampling

Confluence collected samples from wells MW-2, MW-3A, MW-6, and MW-7 during the March 2014 event. Field activities associated with groundwater sampling included low-flow well purging, measuring groundwater parameters, and sample collection.

Each well was purged prior to sampling by placing a clean intake tube of a peristaltic pump approximately 1 foot below the initial water level. Depth to water was measured prior to, during, at the termination of low-flow purging and, also, immediately prior to sample collection. Temperature, pH, conductivity, oxygen reduction potential (ORP) and dissolved oxygen (DO) were measured initially and at regular volume intervals. Well purging continued until consecutive pH, specific conductivity and temperature measurements were relatively stable. Field measurements, purge volumes and sample collection data were recorded on field sampling data sheets, included as **Appendix C**.

Groundwater samples were collected from each well using the peristaltic pump. The samples were decanted into 40-milliliter (mL) glass volatile organic analysis (VOA) vials and 1-liter amber glass containers supplied by McCampbell Analytical, Inc. (McCampbell) of Pittsburg, California. Sample containers were labeled, sealed in a plastic bag, placed on ice in a chilled cooler and transported under COC to McCampbell, a State-certified laboratory, for analysis. The COC used for this monitoring event is included in **Appendix B**.

2.1.3 Equipment Decontamination

To minimize the potential for cross-contamination to occur, the groundwater monitoring equipment was decontaminated prior to being deployed in the first well, and again between each successive well. The tubing for the peristaltic pump was discarded after use at each well.

2.1.4 Sample Analysis

Groundwater samples collected during the First Half event were analyzed for total petroleum hydrocarbons as gasoline (TPHg) and TPH as diesel (TPHd) by modified Environmental Protection Agency (EPA) Method SW8015Bm (with silica gel clean-up for TPHd samples), and benzene, toluene, ethylbenzene and total xylenes (BTEX) and methyl tertiary-butyl ether (MTBE) by EPA Method SW8021B. Based on the lack of historical detections of chloroform and 1,2-dichloroethane (1,2-DCA), these analyses were eliminated from the monitoring program prior to the March 2012 sampling event.

2.2 First Half 2014 Monitoring/Sampling Event Results

Groundwater Flow Direction	Northwest
Hydraulic Gradient	0.005
Measured Groundwater Depth from Top of Casing in Monitoring Wells	22.62 to 23.60 feet
Were Measureable Separate Phase Hydrocarbons Observed	No

2.2.1 Groundwater Flow Direction and Gradient

Depth-to-water measurements collected on March 13, 2014, ranged from 22.62 to 23.60 feet below TOC. Groundwater elevations were calculated by subtracting the depth-to-water measurements from the surveyed TOC elevations. Groundwater elevations were plotted on a site plan and contoured. Based on depth-to-water data collected during the site visit, groundwater flow direction was calculated toward the northwest at a gradient of 0.005. Depth-to-water and groundwater elevation data for the site are summarized in **Table 2** and presented on **Figure 2**.

2.2.2 Groundwater Analytical Results

Hydrocarbon concentrations were detected in wells MW-2, MW-3A, and MW-6 during the First Half 2014.

- TPHg was detected in wells MW-2, MW-3A, and MW-6 at concentrations ranging from 2,300 micrograms per liter ($\mu\text{g/L}$) in MW-6 to 39,000 $\mu\text{g/L}$ in MW-3A.
- Benzene concentrations were detected in wells MW-2, MW-3A, and MW-6 at concentrations ranging from 900 $\mu\text{g/L}$ in MW-6 to 3,200 $\mu\text{g/L}$ in MW-3A (**Figure 3**).
- Toluene, ethylbenzene and xylenes were detected in wells MW-2, MW-3A, and MW-6 at varying concentrations and are presented on **Table 2**.
- Diesel-range hydrocarbons (TPHd) were detected in samples from wells MW-2, MW-3A, and MW-6 at concentrations of 1,400, 6,100 and 140 $\mu\text{g/L}$, respectively. The analytical notes specify that diesel compounds are significant, but with no recognizable pattern. The analytical notes also specify that gasoline compounds are significant, which suggest that the TPHd detections may be the result of heavier compounds of the gasoline-range hydrocarbons.
- No MTBE was detected above laboratory reporting limits in any of the wells.

Elevated hydrocarbon concentrations in groundwater continue to exist in the vicinity of the former underground storage tanks (USTs). Concentrations detected in well MW-3A remain consistent with previous data. Concentrations detected in wells MW-2 and MW-6, decreased in comparison to the previous groundwater monitoring event and no hydrocarbon concentrations were detected in downgradient well MW-7 for the sixth consecutive semi-annual event, indicating that the plume is stable and defined within the monitoring well network. The analytical results are provided in **Table 2**. The laboratory analytical report and sample COC documents are presented as **Appendix B**

2.2.3 GeoTracker Submittal

CRA uploaded relevant data from the First Half 2014 monitoring event to the GeoTracker database.

2.3 Proposed Activities For the Second Half 2014

The subject site will be monitored again during the Second Half 2014. CRA will measure water levels in wells MW-1 through MW-7 and collect groundwater samples from MW-2, MW-3A, MW-6 and MW-7. These four groundwater samples will be analyzed for TPHd with silica gel cleanup, TPHg by modified EPA Method SW8015Bm, and MTBE and BTEX by modified EPA Method SW8021B. The Second Half 2014 monitoring and sampling activities, and analytical results will be reported in the upcoming *Groundwater Monitoring Report – Second Half 2014*.

Respectfully Submitted,

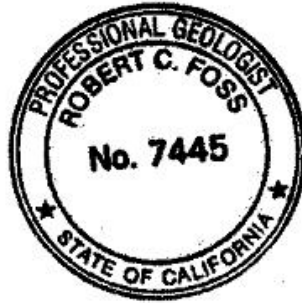
CONESTOGA-ROVERS & ASSOCIATES



Bryan A. Fong



Robert Foss, P.G.



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Figures

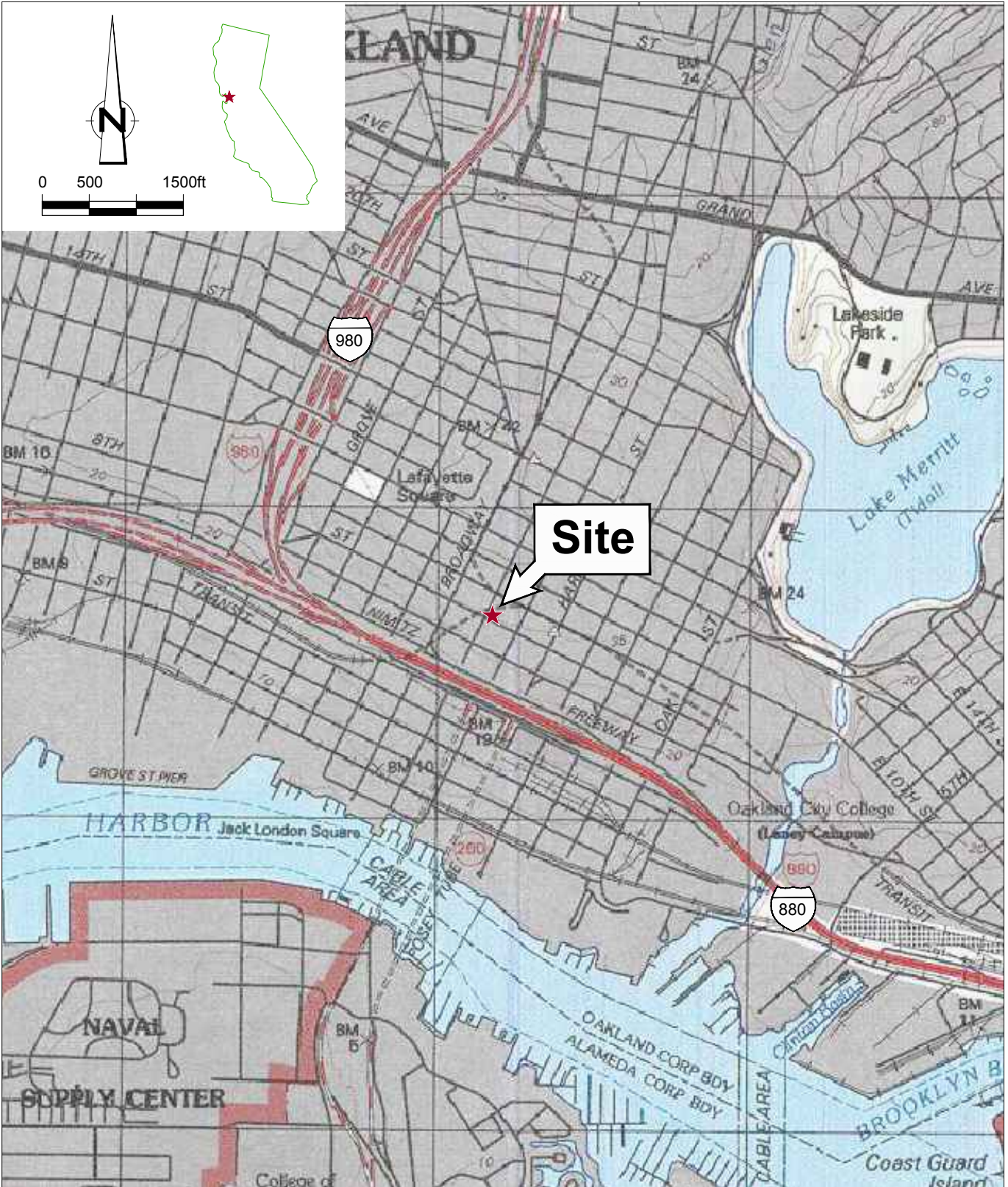


Figure 1
 VICINITY MAP
 CHIU PROPERTY
 800 FRANKLIN STREET
 Oakland, California



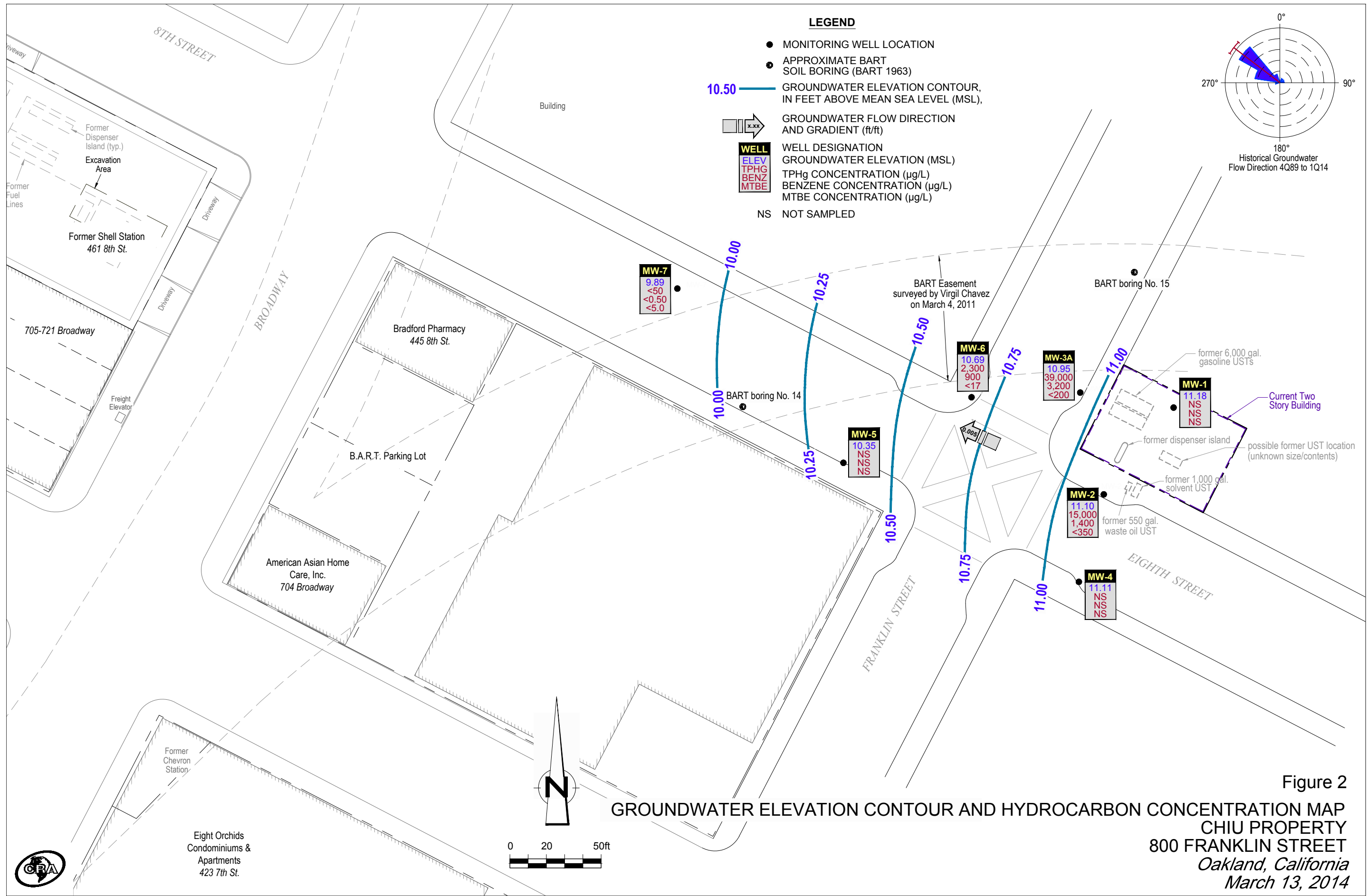


Figure 2
GROUNDWATER ELEVATION CONTOUR AND HYDROCARBON CONCENTRATION MAP
 CHI U PROPERTY
 800 FRANKLIN STREET
 Oakland, California
 March 13, 2014

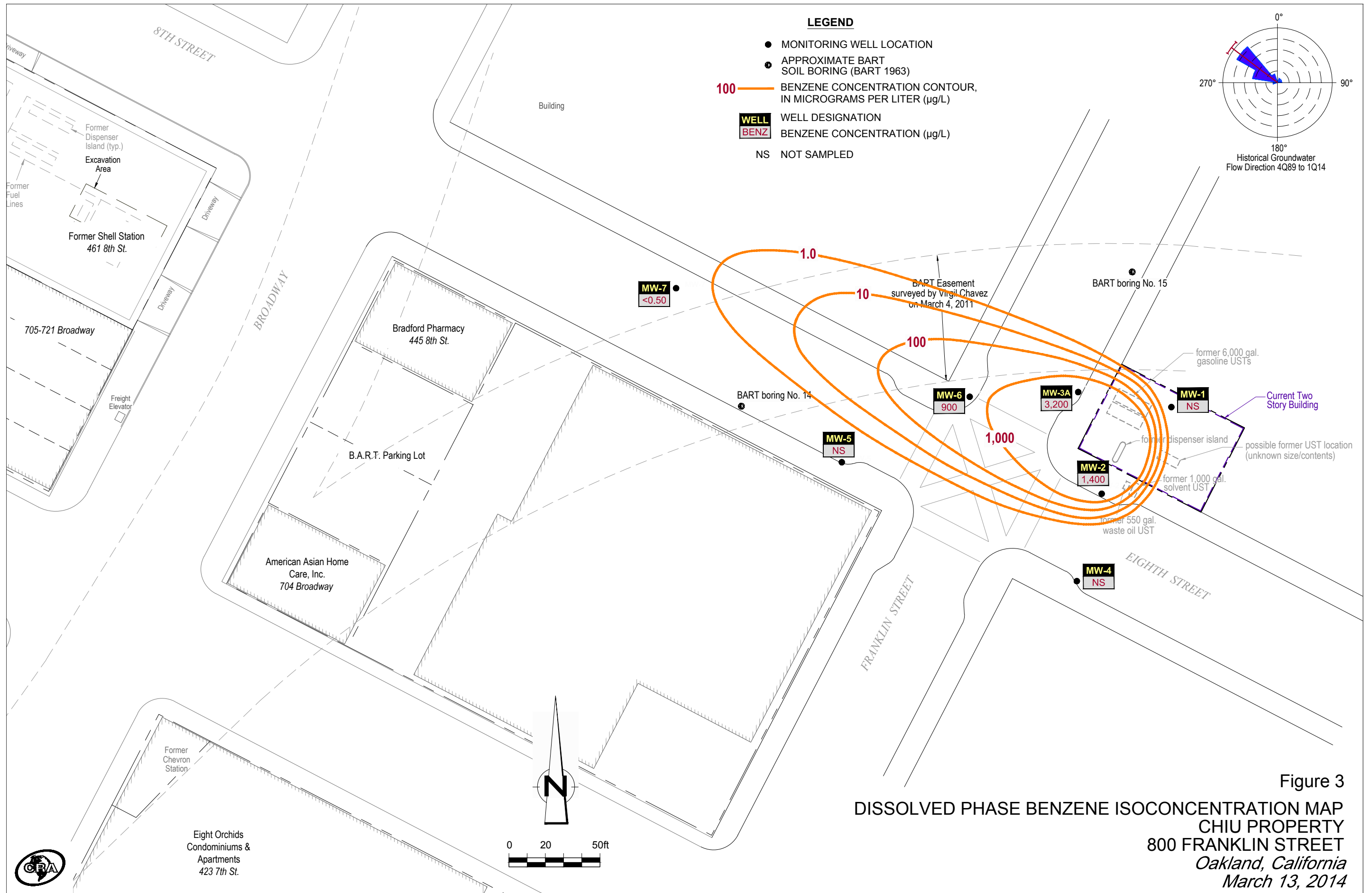


Figure 3
 DISSOLVED PHASE BENZENE ISOCONCENTRATION MAP
 CHIU PROPERTY
 800 FRANKLIN STREET
 Oakland, California
 March 13, 2014

Tables

TABLE 1

**WELL CONSTRUCTION DETAILS
CHIU PROPERTY
800 FRANKLIN STREET
OAKLAND, CALIFORNIA**

<i>Well ID</i>	<i>Date Installed</i>	<i>Borehole Depth (ft)</i>	<i>Borehole Diameter (in)</i>	<i>Casing Diameter (in)</i>	<i>Screen Interval (ft bgs)</i>	<i>Screen Size (in)</i>	<i>Filter Pack (ft bgs)</i>	<i>Bentonite Seal (ft bgs)</i>	<i>Cement Seal (ft bgs)</i>	<i>TOC Elevation (ft msl)</i>
MW-1	1989	35.0	8.0	2	20.0 - 35.0	0.010	18.0 - 35.0	16.0 - 18.0	0 - 16.0	33.42
MW-2	1989	35.0	8.0	2	20.0 - 35.0	0.010	18.0 - 35.0	16.0 - 18.0	0 - 16.0	33.66
MW-3*	Installed: 1989 Destroyed: 1/29/07	35.0	8.0	2	20.0 - 35.0	0.010	18.0 - 35.0	16.0 - 18.0	0 - 16.0	34.23
MW-3A	2/8/2007	35.0	10.0	4	20.0 - 35.0	0.010	19.0 - 35.0	17.0 - 19.0	0 - 17.0	34.16
MW-4	10/2/1991	35.0	8.0	2	20.0 - 35.0	0.010	18.0 - 35.0	-	0 - 18.0	33.64
MW-5	10/3/1991	35.0	8.0	2	20.0 - 35.0	0.010	18.0 - 35.0	-	0 - 18.0	33.56
MW-6	5/15/1997	35.0	8.0	2	14.5 - 36.25	0.010	14.5 - 36.25	12.5 - 14.5	0 - 12.5	33.98
MW-7	5/23/2012	35.0	8.0	2	18.0 - 35.0	0.010	16.0 - 35.0	14.0 - 16.0	0 - 14.0	33.49

Abbreviations / Notes

ft = feet

in = inches

ft bgs = feet below grade surface

ft msl = feet above mean sea level

TOC = top of casing

* = Monitoring well MW-3 properly destroyed on January 29, 2007 by Cambria.

TABLE 2

GROUNDWATER ANALYTICAL AND ELEVATION DATA: PETROLEUM HYDROCARBONS
 CHIU PROPERTY
 800 FRANKLIN STREET
 OAKLAND, CALIFORNIA

Well ID	TOC Elevation (ft msl)	Date Sampled	Depth to Water (ft below TOC)	Groundwater		TPHg	TPHd	TPHmo	Benzene	Toluene	Ethylbenzene µg/L	Xylenes	MTBE	Chloroform	1,2-DCA
				Elevation (feet msl)											
MW-1		10/12/1989	22.87	10.55		ND	--	--	ND	ND	ND	ND	--	0.8	8.6
33.42		10/31/1991	--	--		630	960	1,700	3.2	ND<0.5	ND<0.5	130	--	--	0.0098
34.89		10/21/1992	23.48	11.41		520	--	--	78	38	ND<0.5	120	--	--	ND
		2/25/1993	22.51	12.38		1,600	--	--	160	190	34	350	--	--	--
		4/27/1993	22.36	12.53		380	--	--	5.2	ND<0.5	ND<0.5	74	--	--	--
		10/7/1993	--	12.10		1,000	--	--	81	150	47	230	--	--	--
33.98		3/28/1994	--	11.91		460	--	--	14	25	14	39	--	--	--
		4/29/1994	--	--		--	--	--	--	--	--	--	--	--	--
		6/10/1994	--	11.66		--	--	--	--	--	--	--	--	--	--
		7/8/1994	--	11.62		--	--	--	--	--	--	--	--	--	--
		7/26/1994	--	11.48		--	--	--	--	--	--	--	--	--	--
		8/25/1994	--	11.47		--	--	--	--	--	--	--	--	--	--
		10/27/1994	22.51	11.47		ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
		1/6/1995	--	12.08		--	--	--	--	--	--	--	--	--	--
		2/1/1995	--	12.79		--	--	--	--	--	--	--	--	--	--
		3/29/1995	--	12.75		--	--	--	--	--	--	--	--	--	--
		10/31/1995	--	12.48		1,400	--	--	15	38	49	510	19	--	--
		5/21/1997	--	12.49		150	--	--	2.9	1.5	8.6	26	ND<5.0	--	--
		8/10/2004	23.35	10.63		ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		9/28/2004É	--	--		--	--	--	--	--	--	--	--	--	--
		12/21/2004	22.93	11.05		ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		3/11/2005É	--	--		--	--	--	--	--	--	--	--	--	--
		6/16/2005	20.68	13.30		ND<50	--	--	0.64	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		9/1/2005	20.74	13.24		ND<50	--	--	1.2	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		12/16/2005	20.95	13.03		ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		3/10/2006	20.34	13.64		ND<50	--	--	0.60	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		9/15/2006	21.51	12.47		ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	6.4	ND<0.5
		3/8/2007	21.81	12.17		ND<50	ND<50	ND<250	ND<0.5	ND<0.5	0.72	ND<0.5	ND<5.0	6.9	ND<0.5
		9/17/2007	22.08	11.90		ND<50	ND<50	ND<250	ND<0.5	ND<0.5	2.3	ND<0.5	ND<0.5	4.7	ND<0.5
		3/4/2008	21.72	12.26		ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	1.3	ND<0.5
		9/3/2008	22.70	11.28		ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	0.98	ND<0.5
		3/4/2009	22.49	11.49		ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	0.65
		9/8/2009	22.80	11.18		ND<50	ND<50	ND<250	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5	ND<0.5
		3/19/2010	22.25	11.73		ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	ND<0.5	0.58
		9/3/2010	22.51	11.47		ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	1.2	ND<0.5
		3/4/2011	22.10	11.88		ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	ND<0.5	ND<0.5
		8/22/2011	22.23	11.75		ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	ND<0.5	ND<0.5
		3/5/2012	22.61	11.37		ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		9/27/2012	22.31	11.67		ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		3/25/2013	22.20	11.78		--	--	--	--	--	--	--	--	--	--
		9/19/2013	22.84	11.14		--	--	--	--	--	--	--	--	--	--
		3/13/2014	22.80	11.18		--	--	--	--	--	--	--	--	--	--
MW-2		10/12/1989	23.25	10.40		38,000	--	3,900	1,300	1,200	ND	4,700	--	--	--
33.66		10/31/1991	--	--		10,000	1,500	--	1,800	1,200	270	960	--	--	0.17
		11/6/1991	24.02	9.64		--	--	--	--	--	--	--	--	--	--

TABLE 2

GROUNDWATER ANALYTICAL AND ELEVATION DATA: PETROLEUM HYDROCARBONS
 CHIU PROPERTY
 800 FRANKLIN STREET
 OAKLAND, CALIFORNIA

Well ID	TOC Elevation (ft msl)	Date Sampled	Depth to Water (ft below TOC)	Groundwater										
				Elevation (feet msl)	TPHg	TPHd	TPHmo	Benzene	Toluene	Ethylbenzene µg/L	Xylenes	MTBE	Chloroform	1,2-DCA
MW-2 (cont.)	10/21/1992	22.42	11.24	270,000	--	--	--	9,700	4,500	9,600	56,000	--	--	15.4
	2/25/1993	21.50	12.16	49,000	--	--	--	4,300	11,000	1,300	9,100	--	--	--
	4/27/1993	21.26	12.40	39,000	--	--	--	1,400	4,000	220	5,200	--	--	--
	10/7/1993	--	12.04	50,000	--	--	--	2,700	8,100	940	7,800	--	--	--
	3/28/1994	--	11.88	20,000	--	--	--	360	1,300	220	1,800	--	--	--
	4/29/1994	--	11.87	--	--	--	--	--	--	--	--	--	--	--
	6/10/1994	--	11.44	--	--	--	--	--	--	--	--	--	--	--
	7/8/1994	--	11.42	--	--	--	--	--	--	--	--	--	--	--
	7/26/1994	--	11.22	--	--	--	--	--	--	--	--	--	--	--
	8/25/1994	--	11.01	--	--	--	--	--	--	--	--	--	--	--
	10/27/1994	22.66	11.00	21,000	--	--	--	1,200	3,700	600	4,300	--	--	--
	1/6/1995	--	11.66	--	--	--	--	--	--	--	--	--	--	--
	2/1/1995	--	12.21	--	--	--	--	--	--	--	--	--	--	--
	3/29/1995	--	12.66	--	--	--	--	--	--	--	--	--	--	--
	10/31/1995	--	11.51	45,000	--	--	--	3,100	8,800	1,200	8,400	810	--	--
	5/21/1997	--	12.65	18,000	--	--	--	1,400	4,200	680	3,600	370	--	--
	8/10/2004	21.03	12.63	47,000 (a)	--	--	--	4,200	4,900	1,400	6,000	ND<500	--	--
	9/28/2004	22.95	10.71	--	--	--	--	--	--	--	--	--	--	--
	12/21/2004	20.91	12.75	13,000 (a)	--	--	--	500	310	34	1,600	ND<100	--	--
	3/11/2005	11.35	22.31	32,000 (a)	--	--	--	970	2,400	890	4,200	ND<1,000	--	--
	6/16/2005	20.50	13.16	43,000 (a,i)	--	--	--	1,500	3,400	1,200	5,400	ND<1,200	--	--
	9/1/2005	20.60	13.06	20,000 (a)	--	--	--	640	1,700	460	2,200	ND<200	--	--
	12/16/2005	20.83	12.83	32,000 (a,i)	--	--	--	1,000	3,100	760	3,800	ND<500	--	--
	3/10/2006	20.05	13.61	20,000 (a)	--	--	--	460	1,900	440	2,400	ND<400	--	--
	9/15/2006	21.31	12.35	43,000 (a)	3,100 (d)	ND<250	--	1,600	4,400	1,100	5,100	ND<500	16	ND<10
	3/8/2007	21.62	12.04	30,000 (a,h)	4,600 (d,h)	ND<1,200	--	1,200	3,400	890	4,500	ND<500	ND<50	ND<50 (j,h)
	9/17/2007	21.92	11.74	31,000 (a)	6,600 (d,b)	340	--	790	3,000	700	3,100	ND<100	ND<100	ND<100
	3/4/2008	--	--	--	--	--	--	--	--	--	--	--	--	--
	9/3/2008	22.50	11.16	46,000 (a)	5,100 (d)	370	--	1,700	8,600	1,400	7,500	ND<250	ND<250	ND<250
	3/4/2009	22.25	11.41	56,000 (a)	13,000 (d)	1,100	--	1,500	5,300	990	4,500	ND<10	ND<10	ND<10
9/8/2009	22.60	11.06	42,000 (a)	11,000 (d)	1,200	--	1,400 (1,200)	5,200 (4,900)	970 (890)	5,500 (4,900)	ND<100 (ND<100)	ND<0.5	ND<100	
33.75	3/19/2010 **	21.96	11.70	30,000 (a,h)	12,000 (d,h)	--	(1,000)	(3,500)	(980)	(4,500)	(ND<50)	ND<5.0	ND<5.0	
	9/3/2010	22.30	11.45	9,500 (a)	1,500 (d)	--	(320)	(290)	(140)	(970)	(ND<12)	ND<12	ND<12	
	3/4/2011	21.85	11.90	12,000 (a)	2,200 (d)	--	(610)	(430)	(290)	(1,400)	(ND<25)	ND<25	ND<25	
	8/22/2011	22.04	11.71	7,900 (a)	1,300 (d)	--	(320)	(270)	(170)	(1,400)	(ND<12)	ND<0.5	ND<12	
	3/5/2012	22.32	11.43	18,000(a)	1,400 (d)	--	1,200	930	560	2,100	ND<500	--	--	
	9/27/2012	22.16	11.59	6,300 (a)	690 (d)	--	410	290	130	830	ND<70	--	--	
	3/25/2013	22.01	11.74	9,200 (a)	900 (d)	--	820	440	280	1,200	ND<250	--	--	
	9/19/2013	22.68	11.07	20,000 (a)	2,300 (d)	--	1,900	2,200	630	3,100	ND<550	--	--	
	3/13/2014	22.65	11.10	15,000 (a)	1,400 (d)	--	1,400	1,800	550	1,700	ND<350	--	--	
MW-3	10/12/1989	24.02	10.21	87,000	--	4,500	3,200	8,800	ND	6,500	--	--	70.0	
34.23	10/31/1991	--	--	310,000	25,000	--	9,300	25,000	5,600	27,000	--	--	0.058	
	11/6/1991	23.52	10.71	--	--	--	--	--	--	--	--	--	--	
	10/21/1992	23.32	10.91	22,000	--	--	10,000	4,300	790	2,100	--	--	ND	

TABLE 2

GROUNDWATER ANALYTICAL AND ELEVATION DATA: PETROLEUM HYDROCARBONS
 CHIU PROPERTY
 800 FRANKLIN STREET
 OAKLAND, CALIFORNIA

Well ID	Date Sampled	Groundwater TOC Elevation (ft msl)	Depth to Water (ft below TOC)	Groundwater Elevation (feet msl)	TPHg	TPHd	TPHmo	Benzene	Toluene	Ethylbenzene	Xylenes	MTBE	Chloroform	1,2-DCA	
					←					µg/L					→
MW-4 (cont.)	4/27/1993	20.74	12.90	100	--	--	ND<0.5	ND<0.5	ND<0.5	0.9	--	--	--	--	
	10/7/1993	--	12.52	240	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--	--	
	3/28/1994	--	12.34	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--	--	
	4/29/1994	--	11.33	--	--	--	--	--	--	--	--	--	--	--	
	6/10/1994	--	11.55	--	--	--	--	--	--	--	--	--	--	--	
	7/8/1994	--	11.54	--	--	--	--	--	--	--	--	--	--	--	
	7/26/1994	--	11.30	--	--	--	--	--	--	--	--	--	--	--	
	8/25/1994	--	11.09	--	--	--	--	--	--	--	--	--	--	--	--
	10/27/1994	22.69	10.95	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--	--
	1/6/1995	--	11.70	--	--	--	--	--	--	--	--	--	--	--	--
	2/1/1995	--	12.34	--	--	--	--	--	--	--	--	--	--	--	--
	3/29/1995	--	12.76	--	--	--	--	--	--	--	--	--	--	--	--
	10/31/1995	--	11.61	80	--	--	ND<0.5	0.6	ND<0.5	1.0	ND<0.5	--	--	--	--
	5/21/1997	--	12.08	ND<50	--	--	11	120	27	180	ND<0.5	ND<0.5	--	--	--
	9/28/2004	22.72	10.92	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
	12/21/2004	20.65	12.99	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
	3/11/2005	20.20	13.44	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
	6/16/2005	20.38	13.26	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
	9/1/2005	20.48	13.16	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
	12/16/2005	20.78	12.86	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
	3/10/2006	19.81	13.83	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
	9/15/2006	21.16	12.48	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	28	ND<0.5	ND<0.5
	3/8/2007	21.52	12.12	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	23	ND<0.5	ND<0.5
	9/17/2007	21.84	11.80	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	18	ND<0.5	ND<0.5
	3/4/2008	21.41	12.23	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	13	ND<0.5	ND<0.5
	9/3/2008	22.50	11.14	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	12	ND<0.5	ND<0.5
	3/4/2009	22.15	11.49	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	14	ND<0.5	ND<0.5
	9/8/2009	22.56	11.08	ND<50	ND<50	ND<250	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	11	ND<0.5	ND<0.5
	33.73	3/19/2010 *	21.88	11.76	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	10	ND<0.5
		9/3/2010	22.21	11.52	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	ND<0.5	ND<0.5
		3/4/2011	21.78	11.95	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	1.0	ND<0.5
		8/22/2011	21.92	11.81	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	ND<0.5	ND<0.5
		3/5/2012	22.34	11.39	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--
	9/27/2012	21.98	11.75	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	
	3/25/2013	21.95	11.78	--	--	--	--	--	--	--	--	--	--	--	
	9/19/2013	←						Inaccessible						→	
	3/13/2014	22.62	11.11	--	--	--	--	--	--	--	--	--	--	--	
MW-5	10/31/1991	--	--	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	1.1	--	
33.51	11/6/1991	24.00	9.51	ND	--	--	ND	ND	ND	ND	ND	--	--	--	
	10/21/1992	23.24	10.27	840	--	--	17	120	39	180	--	--	--	--	
33.56	2/25/1993	22.40	11.16	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--	
	4/27/1993	22.15	11.41	260	--	--	53	19	1.2	2.4	--	--	--	--	
	10/7/1993	--	11.06	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--	
	3/28/1994	--	10.95	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--	
	4/29/1994	--	10.91	--	--	--	--	--	--	--	--	--	--	--	

TABLE 2

GROUNDWATER ANALYTICAL AND ELEVATION DATA: PETROLEUM HYDROCARBONS
 CHIU PROPERTY
 800 FRANKLIN STREET
 OAKLAND, CALIFORNIA

Well ID	TOC Elevation (ft msl)	Date Sampled	Depth to Water (ft below TOC)	Groundwater Elevation (feet msl)	TPHg	TPHd	TPHmo	Benzene	Toluene	Ethylbenzene	Xylenes	MTBE	Chloroform	1,2-DCA
					←					µg/L				→
MW-5 (cont.)		6/10/1994	--	10.68	--	--	--	--	--	--	--	--	--	--
		7/8/1994	--	10.60	--	--	--	--	--	--	--	--	--	--
		7/26/1994	--	10.45	--	--	--	--	--	--	--	--	--	--
		8/25/1994	--	10.28	--	--	--	--	--	--	--	--	--	--
		10/27/1994	23.50	10.06	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
		1/6/1995	--	10.78	--	--	--	--	--	--	--	--	--	--
		2/1/1995	--	11.25	--	--	--	--	--	--	--	--	--	--
		3/29/1995	--	11.63	--	--	--	--	--	--	--	--	--	--
		10/31/1995	--	10.64	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--
		5/21/1997	--	11.04	260	--	--	2.4	33	7.7	56	ND<5.0	--	--
		9/28/2004	23.70	9.86	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	1.5	ND<5.0	--	--
		12/21/2004	21.40	12.16	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		3/11/2005	21.40	12.16	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		6/16/2005	21.63	11.93	ND<50 (i)	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		9/1/2005	21.65	11.91	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		12/16/2005	21.94	11.62	ND<50 (i)	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		3/10/2006	21.11	12.45	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		9/15/2006	22.20	11.36	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	10	ND<0.5
		3/8/2007	22.44	11.12	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	18	ND<0.5
		9/17/2007	22.73	10.83	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	14	ND<0.5
		3/4/2008	22.32	11.24	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	19	ND<0.5
		9/3/2008	23.13	10.43	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	17	ND<0.5
		3/4/2009	22.95	10.61	ND<50	ND<50	ND<250	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	14	ND<0.5
		9/8/2009	23.21	10.35	ND<50	ND<50	ND<250	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	ND<0.5 (ND<0.5)	11	ND<0.5
	33.67	3/19/2010 *	22.72	10.84	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	14	ND<0.5
		9/3/2010	23.03	10.64	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	7.2	ND<0.5
		3/4/2011	22.60	11.07	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	3.4	ND<0.5
	8/22/2011	22.63	11.04	ND<50	ND<50	--	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	(ND<0.5)	1.9	ND<0.5	
	3/5/2012	22.94	10.73	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--	
	9/27/2012	22.75	10.92	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--	
	3/25/2013	22.73	10.94	--	--	--	--	--	--	--	--	--	--	
	9/19/2013	23.34	10.33	--	--	--	--	--	--	--	--	--	--	
	3/13/2014	23.32	10.35	--	--	--	--	--	--	--	--	--	--	
MW-6 33.98		5/21/1997	--	11.26	760	--	--	2.5	1.7	ND<0.50	25	10	--	--
		9/28/2004	24.00	9.98	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		12/21/2004	21.61	12.37	ND<50	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
		3/11/2005	21.60	12.38	340 (a)	--	--	1.9	2.6	0.68	0.61	ND<5.0	--	--
		6/16/2005	21.81	12.17	1,300 (a)	--	--	58	8.3	6.1	4.0	ND<25	--	--
		9/1/2005	21.82	12.16	1,900 (a)	--	--	150	19	18	76	ND<12	--	--
		12/16/2005	22.03	11.95	3,600 (a,i)	--	--	560	63	33	230	ND<50	--	--
		3/10/2006	21.46	12.52	2,200 (a)	--	--	240	10	20	87	ND<50	--	--
		9/15/2006	22.46	11.52	1,800 (a)	480 (d)	ND<250	10	6.7	9.9	42	ND<17	3.2	ND<0.5
		3/8/2007	22.64	11.34	4,300 (a)	890 (d)	ND<250	260	36	29	140	ND<60	ND<10	ND<10 (j)
	9/17/2007	22.88	11.10	7,000 (a)	970 (d)	ND<250	760	28	46	270	ND<10	ND<10	ND<10	
	3/4/2008	22.51	11.47	400 (a)	74 (d)	ND<250	46	ND<1.0	1.0	6.0	ND<1.0	ND<1.0	ND<1.0	

TABLE 2

GROUNDWATER ANALYTICAL AND ELEVATION DATA: PETROLEUM HYDROCARBONS
 CHIU PROPERTY
 800 FRANKLIN STREET
 OAKLAND, CALIFORNIA

Well ID TOC Elevation (ft msl)	Date Sampled	Depth to Water (ft below TOC)	Groundwater Elevation (feet msl)	TPHg	TPHd	TPHmo	Benzene	Toluene	Ethylbenzene µg/L	Xylenes	MTBE	Chloroform	1,2-DCA
				←									
MW-6 (cont.) 34.05	9/3/2008	23.24	10.74	280 (a)	69 (d, b)	ND<250	2.9	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<0.5
	3/4/2009	23.14	10.84	670 (a)	150 (d)	ND<250	68	13	ND<2.5	12	ND<2.5	ND<2.5	ND<2.5
	9/8/2009	23.38	10.60	8,000 (a)	1,400 (d)	ND<250	870 (770)	16 (ND<12)	34 (17)	1500 (1,200)	ND<12 (ND<12)	ND<0.5	ND<12
	3/19/2010 *	22.93	11.05	8,900 (a)	1,200 (d)	--	(2,900)	(ND<100)	(ND<100)	(ND<100)	(ND<5.0)	ND<5.0	15
	9/3/2010	23.19	10.86	4,600 (a)	710 (d)	--	(1,500)	(33)	(35)	(79)	(ND<25)	ND<25	ND<25
	3/4/2011	22.78	11.27	3,700 (a)	410 (d)	--	(1,300)	(170)	(70)	(200)	(ND<25)	ND<25	ND<25
	8/22/2011	22.85	11.20	490 (a)	120 (b,d)	--	(190)	(ND<5.0)	(ND<5.0)	(ND<5.0)	(ND<5.0)	0.86	ND<5.0
	3/5/2012	23.16	10.89	190 (a)	65 (b,d)	--	38	2.7	1.4	7.3	ND<15	--	--
	9/27/2012	22.91	11.14	79 (a)	ND<50	--	11	ND<0.5	ND<0.5	0.90	ND<5.0	--	--
	3/25/2013	22.87	11.18	59 (a)	ND<50	--	12	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
	9/19/2013	23.40	10.65	8,500 (a)	1,100 (d)	--	3,200	48	52	92	ND<250	--	--
	3/13/2014	23.36	10.69	2,300 (a)	140 (b,d)	--	900	3.1	11	16	ND<17	--	--
	MW-7 33.49	6/25/2012	22.98	10.51	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--
9/27/2012		23.22	10.27	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
12/4/2012		23.46	10.03	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
3/25/2013		23.19	10.30	ND<50	ND<50	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	ND<5.0	--	--
9/19/2013		23.65	9.84	ND<50	ND<50	--	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<5.0	--	--
3/13/2014		23.60	9.89	ND<50	ND<50	--	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<5.0	--	--
<i>Grab Groundwater</i>													
B-7	3/11/2011	--	--	ND<50 (i)	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
B-8	3/11/2011	--	--	ND<50 (i)	--	--	ND<0.5	ND<0.5	ND<0.5	ND<0.5	--	--	--
B-9	3/12/2011	--	--	ND<50 (i)	--	--	ND<0.5	3.0	ND<0.5	ND<0.5	--	--	--

GROUNDWATER ANALYTICAL AND ELEVATION DATA: PETROLEUM HYDROCARBONS
 CHIU PROPERTY
 800 FRANKLIN STREET
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Well ID	Date Sampled	Groundwater Elevation (feet msl)	Depth to Water (ft below TOC)	TPHg	TPHd	TPHmo	Benzene	Toluene	Ethylbenzene µg/L	Xylenes	MTBE	Chloroform	1,2-DCA
TOC Elevation (ft msl)				←									→

Abbreviations and Notes:

TOC Elevation = Top of well casing elevation measured in feet above mean sea level

msl = Above mean sea level

µg/L = Micrograms per liter

TPHg = Total petroleum hydrocarbons as gasoline by EPA Method SW8015C.

TPHd = Total petroleum hydrocarbons as diesel by EPA Method SW8015C with silica gel cleanup.

TPHmo = Total petroleum hydrocarbons as motor oil by EPA Method SW8015C with silica gel cleanup.

Benzene, toluene, ethylbenzene, and xylenes by EPA Method SW8021B (SW8260B).

MTBE = Methyl tertiary-butyl ether by EPA Method SW8021B by (8260B)

Chloroform by EPA Method SW8260B.

1,2-DCA = 1,2-Dichloroethane by EPA Method SW8260B.

Sheen = A sheen was observed on the water's surface.

Field = Observed in the field.

Lab = Observed in analytical laboratory.

(a) = unmodified or weakly modified gasoline is significant

(b) = diesel range compounds are significant; no recognizable pattern

(d) = gasoline range compounds are significant

(h) = lighter than water immiscible sheen/product is present

(i) = liquid sample that contains ~1 vol. % sediment

(j) = sample diluted due to high organic content/matrix interference

(k) = surrogate recovery outside of the control limits due to coelution with another peak(s) / cluttered chromatogram.

(l) = oil range compounds are significant

ND<5.0 = Not detected above detection limit.

-- = Not available, not analyzed, or not applicable

* = Surveyed September 7, 2006; updated to table May 24, 2010

** = Surveyed March 8, 2007; updated to table May 24, 2010

É = Unable to access well due to denial by current tenant

Appendix A

Standard Field Procedures for Groundwater Monitoring and Sampling

Conestoga–Rovers & Associates

STANDARD FIELD PROCEDURES FOR GROUNDWATER MONITORING AND SAMPLING

This document presents standard field methods for groundwater monitoring, purging and sampling, and well development. These procedures are designed to comply with Federal, State and local regulatory guidelines. Conestoga-Rovers and Associate's field procedures are summarized below.

Groundwater Elevation Monitoring

Prior to performing monitoring activities, the historical monitoring and analytical data of each monitoring well shall be reviewed to determine if any of the wells are likely to contain non-aqueous phase liquid (NAPL) and to determine the order in which the wells will be monitored (i.e. cleanest to dirtiest). Groundwater monitoring should not be performed when the potential exists for surface water to enter the well (i.e. flooding during a rainstorm).

Prior to monitoring, each well shall be opened and the well cap removed to allow water levels to stabilize and equilibrate. The condition of the well box and well cap shall be observed and recommended repairs noted. Any surface water that may have entered and flooded the well box should be evacuated prior to removing the well cap. In wells with no history of NAPL, the static water level and total well depth shall be measured to the nearest 0.01 foot with an electronic water level meter. Wells with the highest contaminant concentrations shall be measured last. In wells with a history of NAPL, the NAPL level/thickness and static water level shall be measured to the nearest 0.01 foot using an electronic interface probe. The water level meter and/or interface probe shall be thoroughly cleaned and decontaminated at the beginning of the monitoring event and between each well. Monitoring equipment shall be washed using soapy water consisting of Liqui-nox™ or Alconox™ followed by one rinse of clean tap water and then two rinses of distilled water.

Groundwater Purging and Sampling

Prior to groundwater purging and sampling, the historical analytical data of each monitoring well shall be reviewed to determine the order in which the wells should be purged and sampled (i.e. cleanest to dirtiest). No purging or groundwater sampling shall be performed on wells with a measurable thickness of NAPL or floating NAPL globules. If a sheen is observed, the well should be purged and a groundwater sample collected only if no NAPL is present.

Wells shall be purged according to low flow protocol using an aboveground peristaltic pump. Groundwater wells shall be purged at a low flow rate not to exceed 500 milliliters per minute (mL/min) until groundwater parameters of conductivity and/or dissolved oxygen have stabilized to within 10% for three consecutive readings. Temperature, pH, and conductivity shall also be measured and recorded approximately every 3 to 5 minutes. The total volume of groundwater removed shall be recorded along with any other notable physical characteristic such as color and odor. If required, field parameters such as turbidity shall also be measured prior to collection of each groundwater sample.

Conestoga–Rovers & Associates

Groundwater samples shall be collected after well parameters have stabilized at a low flow rate not to exceed 500 mL/min. Groundwater samples shall be decanted into clean containers supplied by the analytical laboratory. New latex gloves and Teflon lined tubing shall be used for sampling each well.

Sample Handling

Except for samples that will be tested in the field, or that require special handling or preservation, samples shall be stored in coolers chilled to 4° C for shipment to the analytical laboratory. Samples shall be labeled, placed in protective foam sleeves or bubble wrap as needed, stored on crushed ice at or below 4° C, and submitted under chain-of-custody (COC) to the laboratory. The laboratory shall be notified of the sample shipment schedule and arrival time. Samples shall be shipped to the laboratory within a time frame to allow for extraction and analysis to be performed within the standard sample holding times.

Sample labels shall be filled out using indelible ink and must contain the site name; field identification number; the date, time, and location of sample collection; notation of the type of sample; identification of preservatives used; remarks; and the signature of the sampler. Field identification must be sufficient to allow easy cross-reference with the field datasheet.

All samples submitted to the laboratory shall be accompanied by a COC record to ensure adequate documentation. A copy of the COC shall be retained in the project file. Information on the COC shall consist of the project name and number; project location; sample numbers; sampler/recorder's signature; date and time of collection of each sample; sample type; analyses requested; name of person receiving the sample; and date of receipt of sample.

Laboratory-supplied trip blanks shall accompany the samples and be analyzed to check for cross-contamination, if requested by the project manager.

Waste Handling and Disposal

Groundwater extracted during sampling shall be stored onsite in sealed U.S. DOT H17 55-gallon drums and shall be labeled with the contents, date of generation, generator identification, and consultant contact. Extracted groundwater may be disposed offsite by a licensed waste handler or may be treated and discharged via an operating onsite groundwater extraction/treatment system.

Appendix B

Certified Analytical Reports and Chain-Of-Custody Documentation



McC Campbell Analytical, Inc.

"When Quality Counts"

Analytical Report

WorkOrder: 1403503

Report Created for: Conestoga-Rovers & Associates
5900 Hollis St, Suite A
Emeryville, CA 94608

Project Contact: Bryan Fong

Project P.O.:

Project Name: #P1-140311; 800 Franklin St, Oakland

Project Received: 03/14/2014

Analytical Report reviewed & approved for release on 03/20/2014 by:

*Question about
your data?*

[Click here to email
McC Campbell](#)

Angela Rydelius,
Laboratory Manager

The report shall not be reproduced except in full, without the written approval of the laboratory. The analytical results relate only to the items tested. Results reported conform to the most current NELAP standards, where applicable, unless otherwise stated in the case narrative.





Glossary of Terms & Qualifier Definitions

Client: Conestoga-Rovers & Associates
Project: #P1-140311; 800 Franklin St, Oakland
WorkOrder: 1403503

Glossary Abbreviation

95% Interval	95% Confident Interval
DF	Dilution Factor
DUP	Duplicate
EDL	Estimated Detection Limit
ITEF	International Toxicity Equivalence Factor
LCS	Laboratory Control Sample
MB	Method Blank
MB % Rec	% Recovery of Surrogate in Method Blank, if applicable
MDL	Method Detection Limit
MS	Matrix Spike
MSD	Matrix Spike Duplicate
ND	Not detected at or above the indicated MDL or RL
NR	Matrix interferences, or analyte concentration in sample exceeds spike amount for soil matrix or exceeds 2x spike amount for water matrix; or sample diluted due to high matrix or analyte content.
RD	Relative Difference
RL	Reporting Limit (The RL is the lowest calibration standard in a multipoint calibration.)
RPD	Relative Percent Deviation
RRT	Relative Retention Time
SPK Val	Spike Value
SPKRef Val	Spike Reference Value
TEQ	Toxicity Equivalence

Analytical Qualifier

S	spike recovery outside accepted recovery limits
c4	surrogate recovery outside of the control limits due to coelution with another peak(s) / cluttered chromatogram.
d1	weakly modified or unmodified gasoline is significant
e2	diesel range compounds are significant; no recognizable pattern
e4	gasoline range compounds are significant.
e7	oil range compounds are significant



Analytical Report

Client: Conestoga-Rovers & Associates
Project: #P1-140311; 800 Franklin St, Oakland
Date Received: 3/14/14 16:54
Date Prepared: 3/18/14

WorkOrder: 1403503
Extraction Method: SW5030B
Analytical Method: SW8021B/8015Bm
Unit: µg/L

Gasoline Range (C6-C12) Volatile Hydrocarbons as Gasoline with BTEX and MTBE

Client ID	Lab ID	Matrix/ExtType	Date Collected	Instrument	Batch ID
MW-2	1403503-001A	Water	03/13/2014 08:50	GC3	88308
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH(g)	15,000		1000	20	03/18/2014 01:09
MTBE	ND		350	20	03/18/2014 01:09
Benzene	1400		10	20	03/18/2014 01:09
Toluene	1800		10	20	03/18/2014 01:09
Ethylbenzene	550		10	20	03/18/2014 01:09
Xylenes	1700		10	20	03/18/2014 01:09
<u>Surrogates</u>	<u>REC (%)</u>		<u>Limits</u>	Analytical Comments: d1	
aaa-TFT	105		70-130		03/18/2014 01:09
MW-3A	1403503-002A	Water	03/13/2014 08:15	GC3	88308
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH(g)	39,000		1000	20	03/18/2014 01:38
MTBE	ND		200	20	03/18/2014 01:38
Benzene	3200		10	20	03/18/2014 01:38
Toluene	1200		10	20	03/18/2014 01:38
Ethylbenzene	1900		10	20	03/18/2014 01:38
Xylenes	7200		10	20	03/18/2014 01:38
<u>Surrogates</u>	<u>REC (%)</u>	<u>Qualifiers</u>	<u>Limits</u>	Analytical Comments: d1,c4	
aaa-TFT	177	S	70-130		03/18/2014 01:38
MW-6	1403503-003A	Water	03/13/2014 07:40	GC3	88308
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH(g)	2300		170	3.3	03/18/2014 19:38
MTBE	ND		17	3.3	03/18/2014 19:38
Benzene	900		10	20	03/18/2014 03:06
Toluene	3.1		1.7	3.3	03/18/2014 19:38
Ethylbenzene	11		1.7	3.3	03/18/2014 19:38
Xylenes	16		1.7	3.3	03/18/2014 19:38
<u>Surrogates</u>	<u>REC (%)</u>		<u>Limits</u>	Analytical Comments: d1	
aaa-TFT	110		70-130		03/18/2014 19:38

(Cont.)



Analytical Report

Client: Conestoga-Rovers & Associates
Project: #P1-140311; 800 Franklin St, Oakland
Date Received: 3/14/14 16:54
Date Prepared: 3/18/14

WorkOrder: 1403503
Extraction Method: SW5030B
Analytical Method: SW8021B/8015Bm
Unit: µg/L

Gasoline Range (C6-C12) Volatile Hydrocarbons as Gasoline with BTEX and MTBE

Client ID	Lab ID	Matrix/ExtType	Date Collected	Instrument	Batch ID
MW-7	1403503-004A	Water	03/13/2014 07:10	GC3	88264
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH(g)	ND		50	1	03/18/2014 20:37
MTBE	ND		5.0	1	03/18/2014 20:37
Benzene	ND		0.50	1	03/18/2014 20:37
Toluene	ND		0.50	1	03/18/2014 20:37
Ethylbenzene	ND		0.50	1	03/18/2014 20:37
Xylenes	ND		0.50	1	03/18/2014 20:37
<u>Surrogates</u>	<u>REC (%)</u>		<u>Limits</u>		
aaa-TFT	103		70-130		03/18/2014 20:37



Analytical Report

Client: Conestoga-Rovers & Associates
Project: #P1-140311; 800 Franklin St, Oakland
Date Received: 3/14/14 16:54
Date Prepared: 3/14/14

WorkOrder: 1403503
Extraction Method: SW3510C/3630C
Analytical Method: SW8015B
Unit: µg/L

Total Extractable Petroleum Hydrocarbons with Silica Gel Clean-Up

Client ID	Lab ID	Matrix/ExtType	Date Collected	Instrument	Batch ID
MW-2	1403503-001B	Water	03/13/2014 08:50	GC6A	88192
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH-Diesel (C10-C23)	1400		50	1	03/15/2014 08:41
<u>Surrogates</u>	<u>REC (%)</u>		<u>Limits</u>	Analytical Comments: e4	
C9	111		70-130		03/15/2014 08:41
MW-3A	1403503-002B	Water	03/13/2014 08:15	GC6B	88192
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH-Diesel (C10-C23)	6100		50	1	03/15/2014 05:05
<u>Surrogates</u>	<u>REC (%)</u>		<u>Limits</u>	Analytical Comments: e4,e7,e2	
C9	105		70-130		03/15/2014 05:05
MW-6	1403503-003B	Water	03/13/2014 07:40	GC6A	88192
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH-Diesel (C10-C23)	140		50	1	03/19/2014 02:56
<u>Surrogates</u>	<u>REC (%)</u>		<u>Limits</u>	Analytical Comments: e4,e2	
C9	119		70-130		03/19/2014 02:56
MW-7	1403503-004B	Water	03/13/2014 07:10	GC6A	88192
<u>Analytes</u>	<u>Result</u>		<u>RL</u>	<u>DF</u>	<u>Date Analyzed</u>
TPH-Diesel (C10-C23)	ND		50	1	03/15/2014 09:54
<u>Surrogates</u>	<u>REC (%)</u>		<u>Limits</u>		
C9	114		70-130		03/15/2014 09:54



Quality Control Report

Client: Conestoga-Rovers & Associates
Date Prepared: 3/16/14
Date Analyzed: 3/15/14
Instrument: GC3
Matrix: Water
Project: #P1-140311; 800 Franklin St, Oakland

WorkOrder: 1403503
BatchID: 88264
Extraction Method: SW5030B
Analytical Method: SW8021B/8015Bm
Unit: µg/L
Sample ID: MB/LCS-88264
 1403405-004AMS/MSD

QC Summary Report for SW8021B/8015Bm

Analyte	MB Result	LCS Result	RL	SPK Val	MB SS %REC	LCS %REC	LCS Limits
TPH(btex)	ND	55.74	40	60	-	92.9	70-130
MTBE	ND	9.542	5.0	10	-	95.4	70-130
Benzene	ND	10.03	0.50	10	-	100	70-130
Toluene	ND	9.945	0.50	10	-	99.4	70-130
Ethylbenzene	ND	9.731	0.50	10	-	97.3	70-130
Xylenes	ND	29.65	0.50	30	-	98.8	70-130

Surrogate Recovery

aaa-TFT	10.44	10.3		10	104	103	70-130
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Analyte	MS Result	MSD Result	SPK Val	SPKRef Val	MS %REC	MSD %REC	MS/MSD Limits	RPD	RPD Limit
TPH(btex)	56.64	56.55	60	ND	94.4	94.3	70-130	0.151	20
MTBE	9.454	9.486	10	ND	94.5	94.9	70-130	0.337	20
Benzene	10.62	10.45	10	ND	106	105	70-130	1.65	20
Toluene	10.36	10.45	10	ND	104	104	70-130	0	20
Ethylbenzene	9.543	10.36	10	ND	95.4	104	70-130	8.18	20
Xylenes	29.25	31.2	30	ND	97.5	104	70-130	6.44	20

Surrogate Recovery

aaa-TFT	9.838	10.33	10		98	103	70-130	4.83	20
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(Cont.)



Quality Control Report

Client: Conestoga-Rovers & Associates
Date Prepared: 3/17/14
Date Analyzed: 3/17/14
Instrument: GC3
Matrix: Water
Project: #P1-140311; 800 Franklin St, Oakland

WorkOrder: 1403503
BatchID: 88308
Extraction Method: SW5030B
Analytical Method: SW8021B/8015Bm
Unit: µg/L
Sample ID: MB/LCS-88308
 1403429-001AMS/MSD

QC Summary Report for SW8021B/8015Bm

Analyte	MB Result	LCS Result	RL	SPK Val	MB SS %REC	LCS %REC	LCS Limits
TPH(btex)	ND	59.87	40	60	-	99.8	70-130
MTBE	ND	10.51	5.0	10	-	105	70-130
Benzene	ND	10.29	0.50	10	-	103	70-130
Toluene	ND	10.27	0.50	10	-	103	70-130
Ethylbenzene	ND	10.14	0.50	10	-	101	70-130
Xylenes	ND	30.61	0.50	30	-	102	70-130
Surrogate Recovery							
aaa-TFT	10	9.728		10	100	97	70-130

Analyte	MS Result	MSD Result	SPK Val	SPKRef Val	MS %REC	MSD %REC	MS/MSD Limits	RPD	RPD Limit
TPH(btex)	NR	NR	0	33000	NR	NR	-	NR	
MTBE	NR	NR	0	ND<1000	NR	NR	-	NR	
Benzene	NR	NR	0	12000	NR	NR	-	NR	
Toluene	NR	NR	0	14000	NR	NR	-	NR	
Ethylbenzene	NR	NR	0	1600	NR	NR	-	NR	
Xylenes	NR	NR	0	10000	NR	NR	-	NR	
Surrogate Recovery									
aaa-TFT	NR	NR	0		NR	NR	-	NR	



Quality Control Report

Client: Conestoga-Rovers & Associates
Date Prepared: 3/14/14
Date Analyzed: 3/15/14 - 3/18/14
Instrument: GC6A, GC6B
Matrix: Water
Project: #P1-140311; 800 Franklin St, Oakland

WorkOrder: 1403503
BatchID: 88192
Extraction Method: SW3510C/3630C
Analytical Method: SW8015B
Unit: µg/L
Sample ID: MB/LCS-88192

QC Summary Report for SW8015B

Analyte	MB Result	LCS Result	RL	SPK Val	MB SS %REC	LCS %REC	LCS Limits
TPH-Diesel (C10-C23)	ND	875	50	1000	-	87.5	70-130
Surrogate Recovery							
C9	772.5	609.3		625	124	97	70-130

1534 Willow Pass Rd
Pittsburg, CA 94565-1701
(925) 252-9262

CHAIN-OF-CUSTODY RECORD

WorkOrder: 1403503

ClientCode: CETE

WaterTrax
 WriteOn
 EDF
 Excel
 EQulS
 Email
 HardCopy
 ThirdParty
 J-flag

Report to:
 Bryan Fong
 Conestoga-Rovers & Associates
 5900 Hollis St, Suite A
 Emeryville, CA 94608
 (510) 420-3369 FAX: (510) 420-9170

Email: bfong@croworld.com
 cc/3rd Party:
 PO:
 ProjectNo: #P1-140311; 800 Franklin St, Oakland

Bill to:
 Accounts Payable
 Conestoga-Rovers & Associates
 5900 Hollis St, Ste. A
 Emeryville, CA 94608

Requested TAT: 5 days

Date Received: 03/14/2014
Date Printed: 03/20/2014

Lab ID	Client ID	Matrix	Collection Date	Hold	Requested Tests (See legend below)												
					1	2	3	4	5	6	7	8	9	10	11	12	
1403503-001	MW-2	Water	3/13/2014 8:50	<input type="checkbox"/>	A	A	B										
1403503-002	MW-3A	Water	3/13/2014 8:15	<input type="checkbox"/>	A		B										
1403503-003	MW-6	Water	3/13/2014 7:40	<input type="checkbox"/>	A		B										
1403503-004	MW-7	Water	3/13/2014 7:10	<input type="checkbox"/>	A		B										

Test Legend:

1	G-MBTEx_W	2	PREDF REPORT	3	TPH(D)WSG_W	4		5	
6		7		8		9		10	
11		12							

Prepared by: Ana Venegas

Comments:

NOTE: Soil samples are discarded 60 days after results are reported unless other arrangements are made (Water samples are 30 days). Hazardous samples will be returned to client or disposed of at client expense.



WORK ORDER SUMMARY

Client Name: CONESTOGA-ROVERS & ASSOCIATES

QC Level: LEVEL 2

Work Order: 1403503

Project: #P1-140311; 800 Franklin St, Oakland

Client Contact: Bryan Fong

Date Received: 3/14/2014

Comments:

Contact's Email: bfong@craworld.com

WaterTrax
 WriteOn
 EDF
 Excel
 Fax
 Email
 HardCopy
 ThirdParty
 J-flag

Lab ID	Client ID	Matrix	Test Name	Number of Containers	Bottle & Preservative	De-chlorinated	Collection Date & Time	TAT	Sediment Content	Hold	SubOut
1403503-001A	MW-2	Water	SW8021B/8015Bm (G/MBTEX)	3	voahcl	<input type="checkbox"/>	3/13/2014 8:50	5 days	Present	<input type="checkbox"/>	
1403503-001B	MW-2	Water	SW8015B (Diesel w/ S.G. Clean-Up)	3	voahcl	<input type="checkbox"/>	3/13/2014 8:50	5 days	Present	<input type="checkbox"/>	
1403503-002A	MW-3A	Water	SW8021B/8015Bm (G/MBTEX)	3	voahcl	<input type="checkbox"/>	3/13/2014 8:15	5 days	Present	<input type="checkbox"/>	
1403503-002B	MW-3A	Water	SW8015B (Diesel w/ S.G. Clean-Up)	3	voahcl	<input type="checkbox"/>	3/13/2014 8:15	5 days	Present	<input type="checkbox"/>	
1403503-003A	MW-6	Water	SW8021B/8015Bm (G/MBTEX)	3	voahcl	<input type="checkbox"/>	3/13/2014 7:40	5 days	Present	<input type="checkbox"/>	
1403503-003B	MW-6	Water	SW8015B (Diesel w/ S.G. Clean-Up)	3	voahcl	<input type="checkbox"/>	3/13/2014 7:40	5 days	Present	<input type="checkbox"/>	
1403503-004A	MW-7	Water	SW8021B/8015Bm (G/MBTEX)	3	voahcl	<input type="checkbox"/>	3/13/2014 7:10	5 days	Present	<input type="checkbox"/>	
1403503-004B	MW-7	Water	SW8015B (Diesel w/ S.G. Clean-Up)	3	voahcl	<input type="checkbox"/>	3/13/2014 7:10	5 days	Present	<input type="checkbox"/>	

*** NOTE: STLC and TCLP extractions require 48 hrs to complete; therefore, all TATs begin after the extraction is completed (i.e., 24hr TAT yields results in 72 hrs from sample submission).**

Bottle Legend:

voahcl =



Confluence Environmental, Inc.
 3308 El Camino Ave, Suite 300 # 148
 Sacramento, CA 95821
 916-760-7641 - main
 916-473-8617 - fax
 www.confluence-env.com

CEESC

1403503

Chain of Custody

Project Name: 800 Franklin St, Oakland

Job Number: P1-140311

TAT: STANDARD 5 DAY 2 DAY 24 HOUR OTHER:

Lab: McCampbell	Site Address: 800 Franklin St, Oakland	Confluence PM: Jason Brown
Address: 1534 Willow Pass Rd, Pittsburg, CA 94565	California Global ID No.: T0600100050	Phone / Fax: 916-760-7641 / 916-473-8617
Contact:	Include EDF w/ Report: <input checked="" type="radio"/> Yes <input type="radio"/> No	Confluence Log Code: CESC
Phone/ Fax: 925-252-9262	Consultant / PM: CRA / Bryan Fong	Report to: Bryan Fong
	Phone / Fax: 510-385-0509	Invoice to: CRA

Sample ID	Time	Date	Matrix			Laboratory No.	No. of Containers	Preservative					Requested Analysis			Notes and Comments
			Soil/Solid	Water/Liquid	Air			Unpreserved	H ₂ SO ₄	HNO ₃	HCl	NaOH	TPH-G (8015)	BTEX, MTBE* (8021)	TPH-D w/ sgc	
MW-2	0850	3-13-14	X			6						X	X	X		
MW-3A	0815	}	}	}	}	}						X	X	X		
MW-6	0740											X	X	X		
MW-7	0710	2				1						X	X	X		
												ICE/ 2.5				
												GOOD CONDITION			APPROPRIATE	
												HEAVY SPACE			CONTAINERS	
												DECLORINATED IN LAB.			PRESERVED IN LAB	
												PRESERVATION			VOAS O&G METALS OTHER	

Sampler's Name: <u>Maria Vestoni</u>	Relinquished By / Affiliation: <u>[Signature]</u>	Date: <u>3-14-14</u>	Time: <u>13:46</u>	Accepted By / Affiliation: <u>[Signature]</u>	Date: <u>3/14/14</u>	Time: <u>13:46</u>
Sampler's Company: Confluence Environmental						
Shipment Date:						
Shipment Method:						

Special Instructions: *Confirm MTBE by 8260



Sample Receipt Checklist

Client Name: **Conestoga-Rovers & Associates** Date and Time Received: **3/14/2014 4:54:19 PM**
 Project Name: **#P1-140311; 800 Franklin St, Oakland** LogIn Reviewed by: **Ana Venegas**
 WorkOrder N°: **1403503** Matrix: Water Carrier: Courier

Chain of Custody (COC) Information

Chain of custody present? Yes No
 Chain of custody signed when relinquished and received? Yes No
 Chain of custody agrees with sample labels? Yes No
 Sample IDs noted by Client on COC? Yes No
 Date and Time of collection noted by Client on COC? Yes No
 Sampler's name noted on COC? Yes No

Sample Receipt Information

Custody seals intact on shipping container/cooler? Yes No NA
 Shipping container/cooler in good condition? Yes No
 Samples in proper containers/bottles? Yes No
 Sample containers intact? Yes No
 Sufficient sample volume for indicated test? Yes No

Sample Preservation and Hold Time (HT) Information

All samples received within holding time? Yes No
 Container/Temp Blank temperature Cooler Temp: 4.5°C NA
 Water - VOA vials have zero headspace / no bubbles? Yes No NA
 Sample labels checked for correct preservation? Yes No
 Metal - pH acceptable upon receipt (pH<2)? Yes No NA
 Samples Received on Ice? Yes No

(Ice Type: WET ICE)

* NOTE: If the "No" box is checked, see comments below.

 Comments:

Appendix C

Field Data Sheets



Confluence Environmental, Inc.
 3308 El Camino Ave, Suite 300 # 148
 Sacramento, CA 95821
 916-760-7641 - main
 916-473-8617 - fax
 www.confluence-env.com

Chain of Custody

Project Name: 800 Franklin St, Oakland

Job Number: P1-12/0311

TAT: STANDARD 5 DAY 2 DAY 24 HOUR OTHER:

Lab: McCampbell	Site Address: 800 Franklin St, Oakland	Confluence PM: Jason Brown
Address: 1534 Willow Pass Rd, Pittsburg, CA 94565	California Global ID No.: T0600100050	Phone / Fax: 916-760-7641 / 916-473-8617
Contact:	Include EDF w/ Report: <input checked="" type="radio"/> Yes <input type="radio"/> No	Confluence Log Code: CESC
Phone/ Fax: 925-252-9262	Consultant / PM: CRA / Bryan Fong	Report to: Bryan Fong
	Phone / Fax: 510-385-0509	Invoice to: CRA

Sample ID	Time	Date	Matrix			Laboratory No.	No. of Containers	Preservative					Requested Analysis					Notes and Comments					
			Soil/Solid	Water/Liquid	Air			Unpreserved	H ₂ SO ₄	HNO ₃	HCl	NaOH	TPH-G (8015)	BTEX, MTBE* (8021)	TPH-D w/ sgc								
MW-2	0850	3/13/14	X			6							X	X	X								
MW-3A	0815	}				1							X	X	X								
MW-6	0740														X	X	X						
MW-7	0710	}				1							X	X	X								

Sampler's Name: <u>Matt Pestoni</u>	Relinquished By / Affiliation	Date	Time	Accepted By / Affiliation	Date	Time
Sampler's Company: Confluence Environmental	<u>[Signature]</u>	3-13-14				
Shipment Date:						
Shipment Method:						

Special Instructions: *Confirm MTBE by 8260

Purging And Sampling Data Sheet

Job#: P1-140311	Sampler: M Pestoni	Client: CRA
Well ID: MW-6	Date: 3/13/14	Site: Chiu Property, Oakland
Well diam: 1/4" 1" <u>2"</u> 3" 4" 6" Other:	DTW: 25.56 Total Depth: 32.75	
Purge equip: ES - diam: Bladder <u>Peri</u> Waterra Positive Air Displacement Ext. System disp bailer teflon bailer other:	Tubing: OD: New Dedicated NA	
Purge method: 3-5 Case Volume <u>Micro/Low-Flow</u> Extraction Other:		
Pump depth/ intake:	Multipliers: 1"= 0.04 2"= 0.16 3"= 0.37 4"= 0.65 5"= 1.02 6"= 1.47 Radius ² X 0.163	
(TD - DTW X Multiplier = 1 Volume		80% Recovery (TD - DTW X 0.20 + DTW)

1 Volume = _____ X _____ = _____ (Total Purge) 80% = _____

Time	Temp (°C/°F)	pH	Cond (mS/cm)	Turbidity (NTU)	Purge Rate (gal or gal/min)	Volume Removed (gal/L)	DO (mg/l)	ORP (mv)	DTW	Notes
0720	18.8	6.7	1322	71000	200	.5	0.79	-30.6	25.50	
0723	18.4	6.6	1357	>10000	200	1.1	0.39	-41.6	23.68	
0726	18.3	6.6	1313	>1000	100	1.4	0.36	-23.8	23.69	
0729	18.3	6.6	1353	480	100	1.7	0.38	-31.6	23.69	
0732	18.3	6.6	1358	448	}	2.0	0.41	-36.3	23.70	
0735	18.3	6.6	1360	432		2.3	0.43	-37.2	23.70	
0738	18.3	6.6	1363	429		2.6	0.45	-39.0	23.70	

Did well dewater? YES <u>NO</u>	Total volume removed: 2.6 (gal) <u>L</u>	
Sample method: Disp Bailer <u>Ded. Tubing</u> New Tubing Ext. Port Other:		
Sample date: 3.13.14	Sample time: 0740	DTW at sample: 33.70
Sample ID: MW-6	Lab: McCampbell	Number of bottles: 6
Analysis: TPH-G, BTEX, MTBE, TPH-D		
Equipment blank ID @	Field blank ID @	
Duplicate ID:	Pre-purge DO:	Post purge DO:
Fe2 ⁺ :	Pre-purge ORP:	Post purge ORP:
NAPL depth:	Volume of NAPL:	Volume removed: ml

