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ARCADIS
100 Montgomery Street
Suite 300
San Francisco
California 94104
Tel 415.374.2744
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Re: Third Quarter 2009 Ground-Water Monitoring Report
Former BP Station # 11133
2220 98th Avenue
Oakland, California
ACEH Case # RO0000403

Environmental

"I declare that to the best of my knowledge at the present time, that the information and/or recommendations contained in the attached document are true and correct."

Date:
10/05/2009

Submitted by:

Hollis E. Phillips, PG
Senior Geologist

Contact:
Hollis Phillips

Phone:
415.374.2744 x13

Email:
hollis.phillips@arcadis-us.com

Our ref:
GP09BPNA.0000

Third Quarter 2009 Ground-Water Monitoring Report
Former BP Service Station #11133
2220 98th Avenue
Oakland, California

Prepared for

Ms. Hollis Phillips, PG
Senior Geologist
ARCADIS-US, Inc.
100 Montgomery Street, Ste. 300
San Francisco, California 94104

On behalf of

Atlantic Richfield Company
PO Box 1257
San Ramon, California 94583

Prepared by

BROADBENT & ASSOCIATES, INC.
ENGINEERING, WATER RESOURCES & ENVIRONMENTAL

1324 Mangrove Avenue, Suite 212
Chico, California 95926
(530) 566-1400
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October 2009

Project No. 06-88-656

Broadbent & Associates, Inc.
1324 Mangrove Ave., Suite 212
Chico, CA 95926
Voice (530) 566-1400
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BROADBENT & ASSOCIATES, INC
ENVIRONMENTAL, WATER RESOURCES & ENGINEERING

October 5, 2009

Project No. 06-88-656

ARCADIS-US, Inc.
100 Montgomery Street, Ste. 300
San Francisco, California 94104

Attn.: Ms. Hollis Phillips, PG

Re: Third Quarter 2009 Ground-Water Monitoring Report, Former BP Service Station #11133, 2220 98th Avenue, Oakland, Alameda County, California;
ACEH Case #RO0000403

Dear Ms. Phillips:

Provided herein is the *Third Quarter 2009 Ground-Water Monitoring Report* for Former BP Service Station #11133 located at 2220 98th Avenue, Oakland, California (Site). This report presents the results of ground-water monitoring conducted at the Site during the Third Quarter of 2009.

Should you have questions regarding the work performed or results obtained, please do not hesitate to contact us at (530) 566-1400.

Sincerely,

BROADBENT & ASSOCIATES, INC.

Matthew G. Herrick, P.G., C.HG.
Senior Hydrogeologist

Enclosure

cc: Mr. Paresh Khatri, Alameda County Environmental Health (Submitted via ACEH ftp site)
Ms. Shelby Lathrop, ConocoPhillips, 76 Broadway, Sacramento, California 95818
Electronic copy uploaded to GeoTracker

STATION #11133 GROUND-WATER MONITORING REPORT

Facility: #11133 Address:	2220 98th Avenue, Oakland
ARCADIS Project Manager:	Ms. Hollis Phillips, PG
Consulting Co./Contact Persons:	Broadbent & Associates, Inc.(BAI)/Rob Miller & Matt Herrick (530) 566-1400
Primary Agency/Regulatory ID No.:	Alameda County Environmental Health (ACEH) ACEH Case #RO0000403
Consultant Project No.:	06-88-656
Facility Permits/Permitting Agency:	NA

WORK PERFORMED THIS QUARTER (Third Quarter 2009):

1. Prepared and submitted *Second Quarter 2009 Ground-Water Monitoring Report* (BAI, 07/27/2009).
2. Conducted soil and ground-water investigation as requested by ACEH in their letter dated May 15, 2009. Work performed by Stratus Environmental, Inc. (Stratus) on July 12, 2009.
3. Prepared and submitted the *Soil and Ground-Water Investigation Report* (BAI, 08/13/2009).
4. Conducted ground-water monitoring/sampling for Third Quarter 2009. Work performed by Stratus Environmental, Inc. (Stratus) on July 21, 2009.

WORK PROPOSED FOR NEXT QUARTER (Fourth Quarter 2009):

1. Prepared and submitted this *Third Quarter 2009 Ground-Water Monitoring Report* (contained herein).
2. Implement proposed work activities included in the April 15, 2009 *Feasibility Study and Corrective Action Plan* including installation of on-site injection well and initiation of nitrate/sulfate pilot study work activities as approved by ACEH in their letter dated August 13, 2009.

QUARTERLY RESULTS SUMMARY:

Current phase of project:	**Ground-water monitoring/sampling/treatment pilot study**
Frequency of ground-water monitoring:	**Semi-Annually (1Q & 3Q): Wells MW-1, MW-2, MW-3, AW-1 through AW-9, RW-1**
Frequency of ground-water sampling:	**Semi-Annually (1Q & 3Q): Wells MW-1, MW-3, AW-1, AW-4, AW-5, AW-6, and RW-1** **Annually (1Q): Well AW-2** **Not Sampled: Wells MW-2, AW-3, AW-7, AW-8, AW-9**
Is free product (FP) present on-site:	**No**
FP recovered this quarter:	**None**
Current remediation techniques:	**NA**
Depth to ground water (below TOC):	**11.10 ft (MW-2) to 20.00 ft (AW-9)**
General ground-water flow direction:	**West**
Approximate hydraulic gradient:	**0.01 ft/ft**

DISCUSSION:

Third Quarter 2009 ground-water monitoring and sampling was conducted at Station #11133 on July 21, 2009 by Stratus. Water levels were gauged in 11 of the 13 wells scheduled to be gauged at the Site. Stratus reported that well AW-7 could not be located (This well has not been able to be located

since First Quarter 2001). Well AW-8 was inaccessible due to a parked car. Wells VW-1 through VW-3 and VEW-4 through VEW-9 were also gauged to assess well integrity. Wells VW-1, VEW-5, VEW-8, and VEW-9 were dry. No other irregularities were noted during water level gauging. Depth to ground-water measurements ranged from 11.10 ft at well MW-2 to 20.00 ft at well AW-9. Resulting ground-water surface elevations ranged from 24.40 ft above mean sea level in well MW-2 to 17.78 ft at well AW-9. Water level elevations were between historic minimum and maximum ranges for each well, as summarized in Table 1. Water level elevations yielded a potentiometric ground-water flow direction and gradient magnitude toward the west at approximately 0.01 ft/ft. Ground-water monitoring field data sheets are provided within Appendix A. Measured depths to ground water and respective ground-water elevations are summarized in Table 1. Current and historic ground-water flow directions and gradients are provided in Table 3. A Site Location Map is provided as Drawing 1. Potentiometric ground-water elevation contours are presented in Drawing 2.

Ground-water samples were collected from nine wells: AW-1, AW-2, AW-4, AW-5, AW-6, MW-1, MW-3, RW-1, and VEW-4. No irregularities were reported during sampling. Samples were submitted under chain-of-custody protocol to Calscience Environmental Laboratories, Inc. (Garden Grove, California), for analysis of Gasoline Range Organics (GRO, C6-12) by the EPA Method 8015B; for Benzene, Toluene, Ethylbenzene, and Total Xylenes (BTEX) by EPA Method 8260B; and tert-Amyl methyl ether (TAME), tert-Butyl alcohol (TBA), Di-isopropyl ether (DIPE), 1,2-Dibromomethane (EDB), 1,2-Dichloroethane (1,2-DCA), Ethanol, Ethyl tert-butyl ether (ETBE), and Methyl tert-butyl ether (MTBE) by EPA Method 8260B. Bio-degradation parameters including dissolved oxygen, oxygen reduction potential (ORP), conductivity, pH, temperature, total alkalinity, nitrate, sulfate, dissolved sulfide, carbon dioxide, methane, manganese and ferrous iron were also monitored during this quarter. Each of the samples collected for the analysis of ferrous iron and dissolved sulfide were received after the holding time expired. No other irregularities were encountered during laboratory analysis of applicable samples. Ground-water sampling field data sheets and the laboratory analytical report, including chain-of-custody documentation, are provided in Appendix A.

Gasoline range organics (GRO) were detected above the laboratory reporting limits in seven of the nine wells sampled at concentrations up to 5,900 micrograms per liter (µg/L) in well AW-1. Benzene was detected above the laboratory reporting limit in three of the nine wells sampled at concentrations up to 560 µg/L in well AW-1. Toluene was detected above the laboratory reporting limit in well AW-2 at a concentration of 150 µg/L. Ethylbenzene was detected above the laboratory reporting limit in four of the nine wells sampled at concentrations up to 98 µg/L in well AW-2. Total Xylenes were detected above the laboratory reporting limit in five of the nine wells sampled at concentrations up to 220 µg/L in well AW-2. TAME was detected above the laboratory reporting limit in five of the nine wells sampled at concentrations up to 30 µg/L in well AW-1. TBA was detected above the laboratory reporting limit in two of the nine wells sampled at concentrations of 15 µg/L in well RW-1 and 110 µg/L in well AW-5. MTBE was detected above the laboratory reporting limit in seven of the nine wells sampled at concentrations up to 170 µg/L in well AW-1. The remaining fuel additives and oxygenates were not detected above their laboratory reporting limits in the nine wells sampled this quarter.

Review of specific biodegradation monitoring parameters provided in Table 4 indicate anaerobic conditions on the Site and within the plume. This ascertation is based on depleted nitrate and sulfate concentrations and the presence of ferrous iron (Fe^{2+}). Furthermore, the presence of methane, manganese, and carbon dioxide in a majority of the wells suggests the occurrence of anaerobic biodegradation. The negative ORP readings observed at the Site indicate reducing conditions and the relatively high total alkalinity measurements suggest the presence of bioactivity. Results from the biodegradation monitoring parameters for Third Quarter 2009 are generally comparable to the results obtained in the Second Quarter 2009 with the exception of the elevated DO concentrations. The elevated DO values appear suspect and

are considered erronous. It is believed that the Stratus field personal encountered problems with the instrumentation utilized to measure DO and reported incorrect readings.

Analytes detected during Third Quarter, 2009 were all within historic minimum and maximum concentration ranges recorded for each well, with the following exceptions: GRO and Total Xylenes in well RW-1 were observed at the lowest concentration historically detected. Historic laboratory analytical results are summarized in Table 1, Table 2 and Table 4. A copy of the laboratory analytical report, including chain-of-custody documentation are provided in Appendix A. Third Quarter 2009 groundwater monitoring data (GEO_WELL) and laboratory analytical results (EDF) were uploaded to the GeoTracker AB2886 Database. Upload confirmation pages are provided in Appendix B.

CONSLUSION AND RECOMMENDATION

Results of Third Quarter, 2009 ground-water sampling activities indicate generally stable to decreasing dissolved analyte concentrations across the site. ACEH approved the April 15, 2009 *Feasibility Study and Corrective Action Plan*, which included recommendations for installation of an on-site injection well and initiation of nitrate/sulfate pilot study work activities, in their August 13, 2009 letter. As of the date of this report, the injection well has yet to be installed and it is not expected that the well will be installed by the October 12, 2009 deadline as specified in the ACEH August 13, 2009 letter. It is anticipated that the well will be installed during Fourth Quarter, 2009 and pilot scale nitrate/sulfate addition work activities will follow.

CLOSURE:

The findings presented in this report are based upon: observations of Stratus field personnel (see Appendix A), the points investigated, and results of laboratory tests performed by Calscience (Garden Grove, California). Our services were performed in accordance with the generally accepted standard of practice at the time this report was written. No other warranty, expressed or implied was made. This report has been prepared for the exclusive use of ARCADIS-US, Inc. and Atlantic Richfield Company (a BP affiliated company). It is possible that variations in soil or ground-water conditions could exist beyond points explored in this investigation. Also, changes in site conditions could occur in the future due to variations in rainfall, temperature, regional water usage, or other factors.

ATTACHMENTS:

Drawing 1. Site Location Map, Former BP Service Station #11133, 2220 98th Avenue, Oakland, California

Drawing 2. Ground-Water Elevation Contour and Analytical Summary Map, July 21 2009, Former BP Service Station #11133, 2220 98th Avenue, Oakland, California

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses, Station #11133, 2220 98th Avenue, Oakland, California

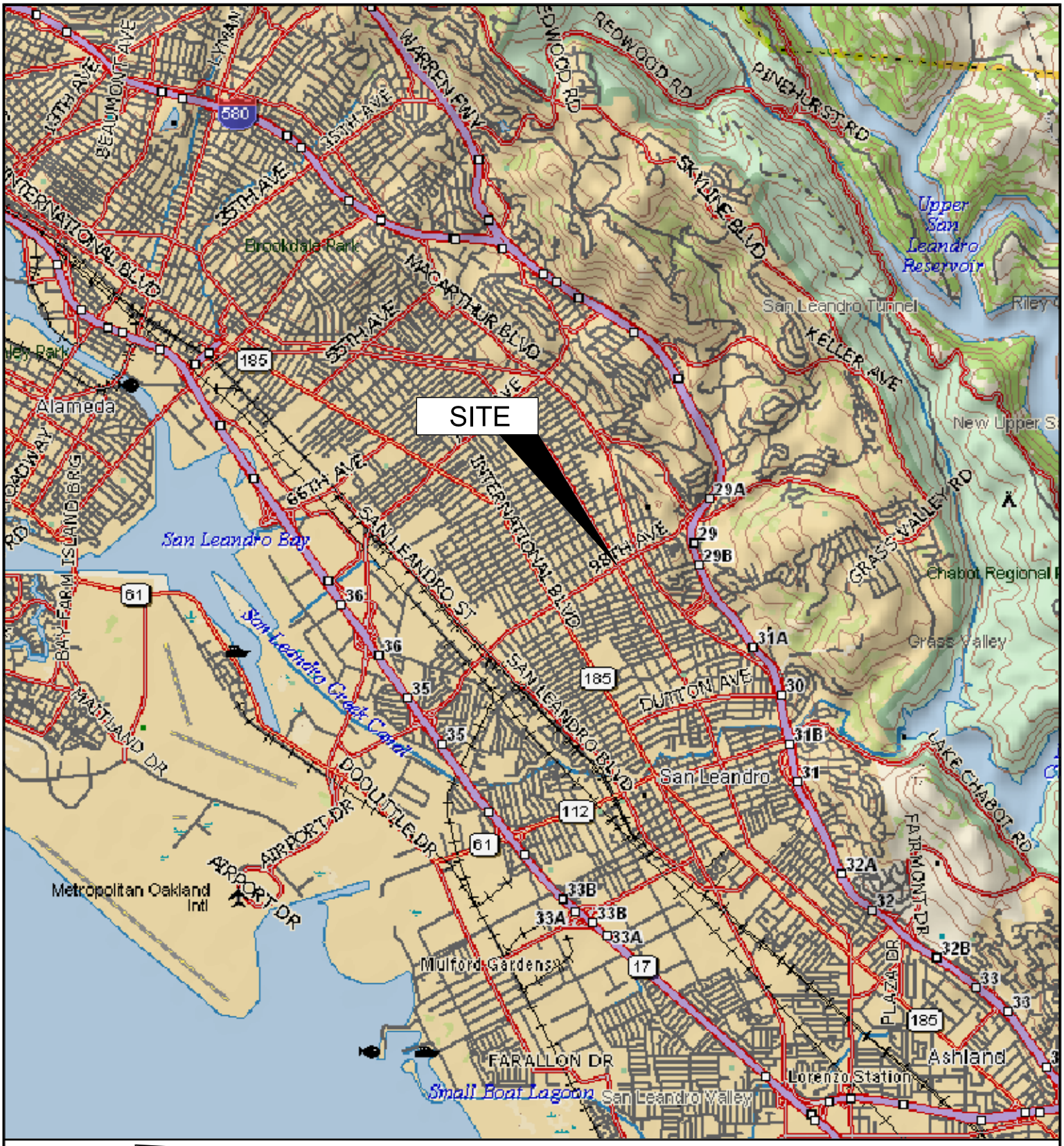
Table 2. Summary of Fuel Additives Analytical Data, Station #11133, 2220 98th Avenue, Oakland, California

Table 3. Historical Ground-Water Flow Direction and Gradient, Station #11133, 2220 98th Avenue, Oakland, California

Table 4. Bio-Degradation Parameters, Station #11133, 2220 98th Avenue, Oakland, California

Appendix A. Stratus Ground-Water Sampling Data Package (Includes Field Data Sheets, Laboratory Report, Chain-of-Custody Documentation, Non-Hazardous Waste Data Form, and Field Procedures)

Appendix B. GeoTracker Upload Confirmation



0 1 2

APPROXIMATE SCALE (mi)

IMAGE SOURCE: DELORME

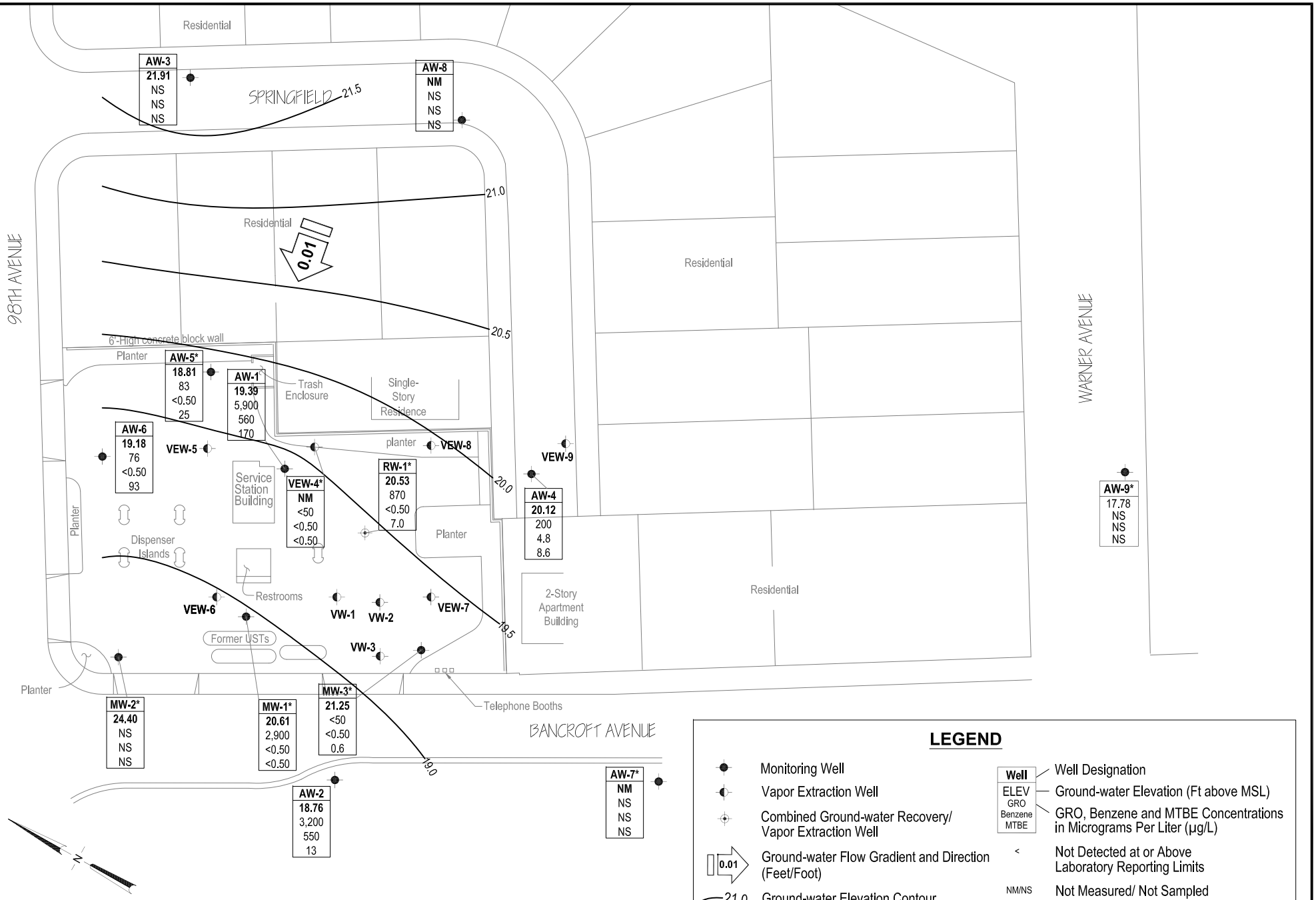
BROADBENT & ASSOCIATES, INC.
ENGINEERING, WATER RESOURCES & ENVIRONMENTAL
1324 Mangrove Ave. Suite 212, Chico, California 95926

Project No.: 06-88-656 Date: 9/30/2009

Former BP Service Station #11133
2220 98th Avenue
Oakland, California

Site Location Map

Drawing
1



NOTES: WELL AW-7 COULD NOT BE SAMPLED DUE TO INACCESSIBILITY.
SITE MAP ADAPTED FROM CAMBRIA ENVIRONMENTAL FIGURES.
SITE DIMENSIONS AND FACILITY LOCATIONS NOT VERIFIED.

0 60 120
SCALE (ft)

BROADBENT & ASSOCIATES, INC.
ENGINEERING, WATER RESOURCES & ENVIRONMENTAL
1324 Mangrove Ave. Suite 212, Chico, California 95926
Project No.: 06-88-656 Date: 9/16/09

Former BP Service Station #11133
2220 98th Avenue
Oakland, California

Ground-Water Elevation Contour and Analytical Summary Map
21 July 2009

Drawing
2

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-1															
4/5/1991	--	38.11	25.44	--	12.67	4,100	1,500	69	100	83	--	--	SUP	--	
4/1/1992	--	38.11	23.22	--	14.89	--	--	--	--	--	--	--	--	--	
4/2/1992	--	38.11	--	--	--	11,000	1,800	210	210	490	--	--	APP	--	
7/6/1992	--	38.11	24.89	--	13.22	6,500	4,000	40	290	530	--	--	ANA	--	
10/7/1992	--	38.11	26.55	--	11.56	4,700	1,500	41	47	300	--	--	ANA	--	
10/7/1992	--	38.11	--	--	--	2,900	1,200	25	37	210	--	--	ANA	--	e
1/14/1993	--	38.11	23.73	--	14.38	2,800	830	31	140	240	--	--	PACE	--	m
1/14/1993	--	38.11	--	--	--	4,100	1,700	28	130	230	--	--	PACE	--	m, e
4/22/1993	--	38.11	--	--	--	39,000	14,000	530	1,800	6,100	987	--	PACE	--	c, m
7/15/1993	--	38.11	22.50	--	15.61	6,200	2,200	28	210	540	838	--	PACE	--	c, m
10/21/1993	--	38.11	24.32	--	13.79	2,400	820	13	55	120	832	--	PACE	--	c, m
1/27/1994	--	38.11	23.72	--	14.39	3,500	1,400	26	130	220	650	--	PACE	--	c, n
4/21/1994	--	38.11	22.48	--	15.63	40,000	12,000	1,900	1,600	5,000	1,119	1.4	PACE	--	m
9/9/1994	--	38.11	23.04	--	15.07	3,500	1,600	5	200	250	--	2.1	PACE	--	m
9/9/1994	--	38.11	--	--	--	3,900	1,900	5.5	190	240	--	--	PACE	--	e
12/21/1994	--	38.11	21.70	--	16.41	7,600	3,100	36	370	320	855	1.6	PACE	--	m
1/30/1995	--	38.11	17.71	--	20.40	35,000	23,000	650	3,200	4,100	--	1.7	ATI	--	
4/10/1995	--	38.11	--	--	--	56,000	17,000	2,000	3,900	10,000	--	--	ATI	--	e
4/10/1995	--	38.11	20.04	--	18.07	60,000	18,000	2,000	4,300	11,000	--	7.9	ATI	--	
6/29/1995	--	38.11	20.60	--	17.51	72,000	10,000	7,300	4,200	15,000	--	6.2	ATI	--	
6/29/1995	--	38.11	--	--	--	86,000	12,000	8,400	4,800	18,000	--	--	ATI	--	e
9/18/1995	--	38.11	21.87	--	16.24	--	--	--	--	--	--	--	--	--	
9/19/1995	--	38.11	--	--	--	65,000	12,000	3,100	4,400	14,000	1,000	8.5	ATI	--	
12/7/1995	--	38.11	22.06	--	16.05	25,000	8,700	<50	2,500	1,300	1,100	2.9	ATI	--	
3/28/1996	--	38.11	16.91	--	21.20	24,000	11,000	<100	3,200	3,390	<1000	6.6	SPL	--	
6/20/1996	--	38.11	20.82	--	17.29	38,000	6,900	1,100	3,200	7,300	<100	6.4	SPL	--	
10/11/1996	--	38.11	23.20	--	14.91	33,000	8,500	69	3,300	4,230	580	6.3	SPL	--	
1/2/1997	--	38.11	20.41	--	17.70	32,000	8,000	<50	3,100	2,300	700	6.7	SPL	--	
4/14/1997	--	38.11	21.61	--	16.50	--	--	--	--	--	--	--	--	--	
4/15/1997	--	38.11	--	--	--	31,000	5,000	160	2,400	4,540	340	5.4	SPL	--	
7/2/1997	--	38.11	21.17	--	16.94	26,000	5,800	<100	2,600	2,200	<1000	6.2	SPL	--	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-1 Cont.															
9/30/1997	--	38.11	21.48	--	16.63	29,000	9,200	17	1,400	130	560	6.9	SPL	--	
1/21/1998	--	38.11	20.02	--	18.09	50,000	6,900	450	3,200	4,450	720	5.8	SPL	--	
4/9/1998	--	38.11	13.37	--	24.74	--	--	--	--	--	--	--	--	--	
4/10/1998	--	38.11	--	--	--	46,000	5,800	1,900	3,000	7,400	1,000	4.3	SPL	--	
6/19/1998	--	38.11	19.12	--	18.99	42,000	6,600	200	3,000	3,350	660	4.9	SPL	--	
6/19/1998	--	38.11	--	--	--	43,000	6,800	260	3,100	3,490	620	--	SPL	--	e
11/30/1998	--	38.11	21.13	--	16.98	23,000	6,700	<25	3,100	130	710/820	--	SPL	--	g
1/21/1999	--	38.11	20.77	--	17.34	25,000	4,800	54	2,800	780	1,000	--	SPL	--	
4/30/1999	--	38.11	20.80	--	17.31	21,000	5,300	67	2,800	750	1,500	--	SPL	--	
7/9/1999	--	38.11	20.41	--	17.70	11,000	3,000	<10	760	180	1,300	--	SPL	--	
11/3/1999	--	38.11	20.82	--	17.29	--	--	--	--	--	--	--	--	--	
1/12/2000	--	38.11	19.99	--	18.12	330,000	5,300	10	2,900	560	2,200	--	PACE	--	
4/13/2000	--	38.11	20.14	--	17.97	--	--	--	--	--	--	--	--	--	
5/24/2000	--	38.11	20.17	--	17.94	--	--	--	--	--	--	--	--	--	
6/1/2000	--	38.11	23.05	--	15.06	--	--	--	--	--	--	--	--	--	
6/8/2000	--	38.11	17.08	--	21.03	--	--	--	--	--	--	--	--	--	
6/15/2000	--	38.11	16.93	--	21.18	--	--	--	--	--	--	--	--	--	
7/26/2000	--	38.11	20.07	--	18.04	15,000	290	98	77	220	37,000	--	PACE	--	
10/24/2000	--	38.11	20.10	--	18.01	--	--	--	--	--	--	--	--	--	
1/19/2001	--	38.11	19.82	--	18.29	7,600	2,220	10.9	415	58.4	1,630	--	PACE	--	
7/24/2001	--	38.11	19.86	--	18.25	9,600	2,140	6.34	281	43	1,440	--	PACE	--	
1/18/2002	--	38.11	15.60	--	22.51	20,000	2,170	75.2	1,800	2,080	1,250	--	PACE	--	
8/1/2002	--	38.11	19.55	--	18.56	14,000	2,150	<12.5	197	42.4	1,120	--	PACE	--	
1/16/2003	--	38.11	16.32	--	21.79	15,000	2,300	75	1,600	1,800	1,100	--	SEQ	--	p
7/7/2003	--	38.11	19.80	--	18.31	9,700	1,600	<25	540	110	1,100	--	SEQ	--	q, u
02/05/2004	--	38.11	18.75	--	19.36	12,000	2,000	<50	820	590	930	--	SEQM	6.7	
07/01/2004	P	38.11	19.72	--	18.39	9,900	2,600	<25	300	<25	1,100	--	SEQM	6.5	
03/16/2005	P	38.11	18.78	--	19.33	10,000	1,100	30	630	560	720	0.8	SEQM	6.7	
07/22/2005	P	38.11	15.53	--	22.58	8,000	770	5.4	520	50	510	--	SEQM	6.5	
01/25/2006	P	38.11	18.10	--	20.01	6,400	1,200	10	490	290	490	--	SEQM	7.0	
7/6/2006	P	38.11	17.44	--	20.67	6,200	1,300	70	570	180	270	--	TAMC	6.8	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-1 Cont.															
1/8/2007	P	38.11	16.74	--	21.37	3700	690	19	110	30	380	2.53	TAMC	6.77	
7/10/2007	P	38.11	17.30	--	20.81	4,200	560	12	93	40	220	1.79	TAMC	6.90	
1/15/2008	P	38.11	15.96	--	22.15	5,000	670	<10	490	200	230	0.92	TAMC	6.91	
7/15/2008	P	38.11	18.63	--	19.48	3,400	340	4.5	27	17	<0.50	1.80	CEL	6.79	
10/21/2008	P	38.11	19.96	--	18.15	1,900	160	<5.0	15	<5.0	120	2.40	CEL	7.01	
1/6/2009	P	38.11	19.13	--	18.98	5,000	670	<5.0	84	<5.0	170	1.37	CEL	6.09	
4/21/2009	P	38.11	16.96	--	21.15	7,900	510	<10	90	46	160	2.29	CEL	7.28	
7/21/2009	**P**	**38.11**	**18.72**	**--**	**19.39**	**5,900**	**560**	**<10**	**92**	**10**	**170**	**17.46**	**CEL**	**7.23**	**y**
AW-2															
4/5/1991	--	36.83	22.36	--	14.47	<50	<0.3	<0.3	<0.3	<0.3	--	--	SUP	--	
4/1/1992	--	36.83	20.81	--	16.02	--	--	--	--	--	--	--	--	--	
4/2/1992	--	36.83	--	--	--	130	25	2.3	0.7	2.1	--	--	APP	--	
7/6/1992	--	36.83	23.57	--	13.26	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
10/7/1992	--	36.83	25.24	--	11.59	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
1/14/1993	--	36.83	20.82	--	16.01	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
4/22/1993	--	36.83	19.37	--	17.46	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
7/15/1993	--	36.83	21.29	--	15.54	<50	<0.5	<0.5	<0.5	<0.5	<5.0	--	PACE	--	m
10/21/1993	--	36.83	23.14	--	13.69	<50	1.3	1.1	0.9	2.1	<5.0	--	PACE	--	m
1/27/1994	--	36.83	22.34	--	14.49	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
4/21/1994	--	36.83	21.15	--	15.68	<50	<0.5	<0.5	<0.5	<0.5	<5.0	2.0	PACE	--	m
9/9/1994	--	36.83	22.09	--	14.74	<50	<0.5	<0.5	<0.5	<0.5	--	4.1	PACE	--	m
12/21/1994	--	36.83	20.12	--	16.71	<50	<0.5	<0.5	<0.5	<0.5	<5.0	2.0	PACE	--	m
1/30/1995	--	36.83	16.65	--	20.18	<50	<0.50	<0.50	<0.50	<1.0	--	2.5	ATI	--	
4/10/1995	--	36.83	16.22	--	20.61	<50	<0.50	<0.50	<0.50	<1.0	--	4.4	ATI	--	
6/29/1995	--	36.83	17.55	--	19.28	<50	<0.50	<0.50	<0.50	<1.0	--	7.8	ATI	--	
9/18/1995	--	36.83	19.87	--	16.96	--	--	--	--	--	--	--	--	--	
9/19/1995	--	36.83	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	4.5	ATI	--	
9/19/1995	--	36.83	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	--	ATI	--	e
12/7/1995	--	36.83	21.31	--	15.52	<50	<0.50	<0.50	<0.50	<1.0	<5.0	4.9	ATI	--	
3/28/1996	--	36.83	15.61	--	21.22	<50	<0.5	<1	<1	<1	<10	4.1	SPL	--	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-2 Cont.															
6/20/1996	--	36.83	16.30	--	20.53	<50	<0.5	<1	<1	<1	<10	5.2	SPL	--	
10/11/1996	--	36.83	19.60	--	17.23	<50	<0.5	<1.0	<1.0	<1.0	<10	6.0	SPL	--	
1/2/1997	--	36.83	15.97	--	20.86	<50	<0.5	<1.0	<1.0	<1.0	<10	6.1	SPL	--	
4/14/1997	--	36.83	17.19	--	19.64	<50	<0.5	<1.0	<1.0	<1.0	<10	5.3	SPL	--	
7/2/1997	--	36.83	18.11	--	18.72	<50	<0.5	<1.0	<1.0	<1.0	<10	5.7	SPL	--	
9/30/1997	--	36.83	18.52	--	18.31	<50	<0.5	<1.0	<1.0	<1.0	860	5.4	SPL	--	
1/21/1998	--	36.83	14.46	--	22.37	160	13	<1.0	<1.0	<1.0	110	4.9	SPL	--	
4/9/1998	--	36.83	12.85	--	23.98	--	--	--	--	--	--	--	--	--	
4/10/1998	--	36.83	--	--	--	<50	<0.5	<1.0	<1.0	<1.0	<10	3.9	SPL	--	
6/19/1998	--	36.83	14.37	--	22.46	60	<0.5	<1.0	<1.0	<1.0	<10	3.6	SPL	--	
11/30/1998	--	36.83	16.90	--	19.93	--	--	--	--	--	--	--	--	--	
1/21/1999	--	36.83	16.87	--	19.96	<50	<1.0	<1.0	<1.0	<1.0	<1.0	--	SPL	--	
4/30/1999	--	36.83	17.01	--	19.82	--	--	--	--	--	--	--	--	--	
7/9/1999	--	36.83	17.83	--	19.00	--	--	--	--	--	--	--	--	--	
11/3/1999	--	36.83	19.74	--	17.09	--	--	--	--	--	--	--	--	--	
1/12/2000	--	36.83	19.90	--	16.93	<50	<0.5	<0.5	<0.5	<0.5	<0.5	--	PACE	--	
4/13/2000	--	36.83	19.75	--	17.08	--	--	--	--	--	--	--	--	--	
7/26/2000	--	36.83	19.86	--	16.97	--	--	--	--	--	--	--	--	--	
10/24/2000	--	36.83	18.77	--	18.06	--	--	--	--	--	--	--	--	--	
1/19/2001	--	36.83	--	--	--	--	--	--	--	--	--	--	--	--	f
7/24/2001	--	36.83	--	--	--	--	--	--	--	--	--	--	--	--	f
1/18/2002	--	36.83	15.17	--	21.66	<50	<0.5	<0.5	<0.5	<1.0	<0.5	--	PACE	--	
8/1/2002	--	36.83	17.17	--	19.66	--	--	--	--	--	--	--	--	--	
1/16/2003	--	36.83	14.81	--	22.02	<50	<0.50	<0.50	<0.50	<0.50	<2.5	--	SEQ	--	p
7/7/2003	--	36.83	16.65	--	20.18	--	--	--	--	--	--	--	--	--	
02/05/2004	--	36.83	15.37	--	21.46	<50	3.0	<0.50	<0.50	<0.50	5.1	--	SEQM	6.6	
07/01/2004	--	36.83	17.55	--	19.28	--	--	--	--	--	--	--	--	--	
03/16/2005	P	36.83	14.58	--	22.25	<50	0.75	<0.50	1.1	1.1	<0.50	1.7	SEQM	6.7	
07/22/2005	--	36.83	15.41	--	21.42	--	--	--	--	--	--	--	--	--	
01/25/2006	P	36.83	14.17	--	22.66	280	110	<1.0	3.9	8.7	12	--	SEQM	7.1	
7/6/2006	--	36.83	14.00	--	22.83	--	--	--	--	--	--	--	--	--	

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Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-2 Cont.															
1/8/2007	P	36.83	15.85	--	20.98	1900	550	160	58	180	40	2.09	TAMC	7.2	
7/10/2007	--	36.83	17.25	--	19.58	--	--	--	--	--	--	--	--	--	
1/15/2008	P	36.83	15.75	--	21.08	2,300	900	87	100	140	48	0.83	TAMC	6.79	
7/15/2008	P	36.83	17.99	--	18.84	6,400	1,700	550	340	940	<50	2.14	CEL	7.05	
10/21/2008	P	36.83	19.19	--	17.64	2,600	580	96	110	180	16	1.65	CEL	7.33	
1/6/2009	P	36.83	18.45	--	18.38	2,100	440	54	67	110	11	0.84	CEL	6.94	
4/21/2009	P	36.83	16.05	--	20.78	3,400	600	140	99	190	10	1.89	CEL	7.42	
7/21/2009	**P**	**36.83**	**18.07**	**--**	**18.76**	**3,200**	**550**	**150**	**98**	**220**	**13**	**9.29**	**CEL**	**7.32**	**y**
AW-3															
4/5/1991	--	39.13	23.90	--	15.23	5,200	980	450	95	310	--	--	SUP	--	
4/1/1992	--	39.13	22.50	--	16.63	4,700	890	47	43	110	--	--	APP	--	
7/6/1992	--	39.13	23.26	--	15.87	3,900	3,100	30	80	99	--	--	ANA	--	
10/7/1992	--	39.13	24.75	--	14.38	5,000	2,600	<0.5	<0.5	59	--	--	ANA	--	
1/14/1993	--	39.13	23.59	--	15.54	350	250	<0.5	<0.5	<0.5	--	--	PACE	--	m
4/22/1993	--	39.13	19.42	--	19.71	240	71	2.4	0.6	4	--	--	PACE	--	m
7/15/1993	--	39.13	20.09	--	19.04	650	71	2.8	1.5	1.1	37.3	--	PACE	--	c, m
10/21/1993	--	39.13	--	--	--	170	6.1	2	1.7	4.4	--	--	PACE	--	e
10/21/1993	--	39.13	21.88	--	17.25	160	4.8	1.7	1.6	3.6	8.95	--	PACE	--	m
1/27/1994	--	39.13	--	--	--	90	2.9	0.5	<0.5	<0.5	--	--	PACE	--	e
1/27/1994	--	39.13	22.33	--	16.80	92	2.1	<0.5	<0.5	<0.5	7.37	--	PACE	--	m
4/21/1994	--	39.13	20.96	--	18.17	150	3.6	0.8	0.9	2.5	9.36	1.3	PACE	--	m
9/9/1994	--	39.13	21.60	--	17.53	53	<0.5	<0.5	<0.5	<0.5	--	1.9	PACE	--	m
12/21/1994	--	39.13	--	--	--	--	--	--	--	--	--	--	--	--	f
1/30/1995	--	39.13	--	--	--	--	--	--	--	--	--	--	--	--	f
4/10/1995	--	39.13	--	--	--	--	--	--	--	--	--	--	--	--	f
6/29/1995	--	39.13	15.41	--	23.72	<50	<0.50	<0.50	<0.50	<1.0	--	8.0	ATI	--	
9/18/1995	--	39.13	17.83	--	21.30	--	--	--	--	--	--	--	--	--	
9/19/1995	--	39.13	--	--	--	61,000	11,000	2,900	4,100	13,000	790	7.4	ATI	--	
12/7/1995	--	39.13	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	--	ATI	--	e
12/7/1995	--	39.13	19.27	--	19.86	<50	<0.50	<0.50	<0.50	<1.0	<5.0	3.4	ATI	--	

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						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-3 Cont.															
3/28/1996	--	39.13	--	--	--	<50	<0.5	<1	<1	<1	<10	--	SPL	--	e
3/28/1996	--	39.13	13.85	--	25.28	<50	<0.5	<1	<1	<1	<10	4.1	SPL	--	
6/20/1996	--	39.13	14.47	--	24.66	<50	<0.5	<1	<1	<1	<10	4.2	SPL	--	
6/20/1996	--	39.13	--	--	--	<50	<0.5	<1	<1	<1	<10	--	SPL	--	e
10/11/1996	--	39.13	17.97	--	21.16	<50	<0.5	<1.0	<1.0	<1.0	<10	4.7	SPL	--	
10/11/1996	--	39.13	--	--	--	<50	<0.5	<1.0	<1.0	<1.0	<10	--	SPL	--	e
1/2/1997	--	39.13	13.00	--	26.13	<50	<0.5	<1.0	<1.0	<1.0	<10	5.6	SPL	--	
4/14/1997	--	39.13	14.36	--	24.77	<50	<0.5	<1.0	<1.0	<1.0	<10	5.0	SPL	--	
4/15/1997	--	39.13	--	--	--	<50	<0.5	<1.0	<1.0	<1.0	<10	--	SPL	--	e
7/2/1997	--	39.13	15.87	--	23.26	<50	<0.5	<1.0	<1.0	<1.0	<10	5.4	SPL	--	
9/30/1997	--	39.13	17.50	--	21.63	<250	<2.5	<5.0	<5.0	<5.0	810	5.7	SPL	--	
1/21/1998	--	39.13	--	--	--	150	<0.5	<1.0	<1.0	1.2	110	--	SPL	--	e
1/21/1998	--	39.13	11.98	--	27.15	140	<0.5	<1.0	<1.0	<1.0	99	4.6	SPL	--	
4/9/1998	--	39.13	9.45	--	29.68	--	--	--	--	--	--	--	--	--	
4/10/1998	--	39.13	--	--	--	<50	<0.5	<1.0	<1.0	1.6	<10	4.5	SPL	--	
4/10/1998	--	39.13	--	--	--	<50	<0.5	<1.0	1.4	1.7	<10	--	SPL	--	e
6/19/1998	--	39.13	12.13	--	27.00	<50	<0.5	<1.0	<1.0	<1.0	<10	4.4	SPL	--	
11/30/1998	--	39.13	15.91	--	23.22	--	--	--	--	--	--	--	--	--	
1/21/1999	--	39.13	15.93	--	23.20	<50	<1.0	<1.0	<1.0	<1.0	<1.0	--	SPL	--	
4/30/1999	--	39.13	15.98	--	23.15	--	--	--	--	--	--	--	--	--	
7/9/1999	--	39.13	14.58	--	24.55	--	--	--	--	--	--	--	--	--	
11/3/1999	--	39.13	17.43	--	21.70	--	--	--	--	--	--	--	--	--	
1/12/2000	--	39.13	18.30	--	20.83	<50	<0.5	<0.5	<0.5	<0.5	<0.5	--	PACE	--	
4/13/2000	--	39.13	18.89	--	20.24	--	--	--	--	--	--	--	--	--	
7/26/2000	--	39.13	18.67	--	20.46	--	--	--	--	--	--	--	--	--	
10/24/2000	--	39.13	18.98	--	20.15	--	--	--	--	--	--	--	--	--	
1/19/2001	--	39.13	16.74	--	22.39	--	--	--	--	--	--	--	--	--	
7/24/2001	--	39.13	18.55	--	20.58	--	--	--	--	--	--	--	--	--	
1/18/2002	--	39.13	14.49	--	24.64	--	--	--	--	--	--	--	--	--	
8/1/2002	--	39.13	14.27	--	24.86	--	--	--	--	--	--	--	--	--	
1/16/2003	--	39.13	14.25	--	24.88	--	--	--	--	--	--	--	--	--	

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						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-3 Cont.															
7/7/2003	--	39.13	14.70	--	24.43	--	--	--	--	--	--	--	--	--	
02/05/2004	--	39.13	14.61	--	24.52	--	--	--	--	--	--	--	--	--	
07/01/2004	--	39.13	15.62	--	23.51	--	--	--	--	--	--	--	--	--	
03/16/2005	P	39.13	12.70	--	26.43	<50	<0.50	<0.50	<0.50	<0.50	<0.50	1.1	SEQM	7.3	
07/22/2005	--	39.13	13.44	--	25.69	--	--	--	--	--	--	--	--	--	
01/25/2006	--	39.13	13.56	--	25.57	--	--	--	--	--	--	--	--	--	
7/6/2006	--	39.13	11.60	--	27.53	--	--	--	--	--	--	--	--	--	
1/8/2007	--	39.13	14.97	--	24.16	--	--	--	--	--	--	--	--	--	
7/10/2007	--	39.13	15.81	--	23.32	--	--	--	--	--	--	--	--	--	
1/15/2008	--	39.13	15.97	--	23.16	--	--	--	--	--	--	--	--	--	
7/15/2008	--	39.13	16.70	--	22.43	--	--	--	--	--	--	--	--	--	
10/21/2008	--	39.13	18.16	--	20.97	--	--	--	--	--	--	--	--	--	
1/6/2009	--	39.13	18.35	--	20.78	--	--	--	--	--	--	--	--	--	
4/21/2009	--	39.13	15.57	--	23.56	--	--	--	--	--	--	--	--	--	
7/21/2009	--	**39.13**	**17.22**	--	**21.91**	--	--	--	--	--	--	--	--	--	
AW-4															
4/5/1991	--	39.08	25.12	--	13.96	110,000	40,000	13,000	2,000	5,500	--	--	SUP	--	
4/1/1992	--	39.08	--	--	--	210,000	55,000	23,000	2,900	7,000	--	--	APP	--	e
4/1/1992	--	39.08	23.56	--	15.52	230,000	57,000	31,000	2,900	7,600	--	--	APP	--	
7/6/1992	--	39.08	25.87	--	13.21	38,000	16,000	5,400	2,000	6,100	--	--	ANA	--	
10/7/1992	--	39.08	27.53	--	11.55	120,000	41,000	26,000	4,700	13,000	--	--	ANA	--	
1/14/1993	--	39.08	24.12	--	14.96	62,000	18,000	14,000	2,700	7,700	1,400	--	PACE	--	c, m
4/22/1993	--	39.08	21.47	--	17.61	18,000	1,100	2,100	320	3,500	--	--	PACE	--	m
7/15/1993	--	39.08	23.30	--	15.78	21,000	820	2,300	590	3,800	1,978	--	PACE	--	c, m
10/21/1993	--	39.08	25.08	--	14.00	11,000	570	83	630	2,300	4,600	--	PACE	--	c, m
1/27/1994	--	39.08	24.61	--	14.47	12,000	420	460	600	2,200	6,400	--	PACE	--	c, m
4/21/1994	--	39.08	22.96	--	16.12	12,000	110	250	150	1,900	16,010	1.5	PACE	--	c, m
4/21/1994	--	39.08	--	--	--	14,000	71	160	29	1,200	13,000	--	PACE	--	c, e
9/9/1994	--	39.08	23.85	--	15.23	9,700	75	64	280	2,000	--	2.1	PACE	--	m
12/21/1994	--	39.08	--	--	--	--	--	--	--	--	--	--	--	--	f

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						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-4 Cont.															
1/30/1995	--	39.08	--	--	--	--	--	--	--	--	--	--	--	--	f
4/10/1995	--	39.08	18.07	--	21.01	3,700	69	8.7	44	130	--	8.5	ATI	--	
6/29/1995	--	39.08	19.25	--	19.83	8,000	62	190	190	1,100	--	7.5	ATI	--	
9/18/1995	--	39.08	20.73	--	18.35	--	--	--	--	--	--	--	--	--	
9/19/1995	--	39.08	--	--	--	12,000	660	1,600	200	1,900	7,100	8.3	ATI	--	
12/7/1995	--	39.08	22.49	--	16.59	41,000	8,400	7,200	710	6,300	5,200	3.6	ATI	--	
3/28/1996	--	39.08	16.49	--	22.59	--	--	--	--	--	--	--	--	--	f
6/20/1996	--	39.08	16.00	--	23.08	<50	<0.5	<1	<1	<1	12	--	SPL	--	
10/11/1996	--	39.08	19.52	--	19.56	36,000	12,000	5,500	<25	3,800	880/1000	6.2	SPL	--	g
1/2/1997	--	39.08	--	--	--	<50	61	3.8	3.5	8.1	110	--	SPL	--	e
1/2/1997	--	39.08	15.80	--	23.28	<50	<0.5	<1.0	<1.0	<1.0	22	6.4	SPL	--	
4/14/1997	--	39.08	17.01	--	22.07	--	--	--	--	--	--	--	--	--	
4/15/1997	--	39.08	--	--	--	<50	<0.5	<1.0	<1.0	<1.0	<10	5.4	SPL	--	
7/2/1997	--	39.08	19.68	--	19.40	<50	21	<1.0	<1.0	<1.0	41	4.1	SPL	--	
9/30/1997	--	39.08	22.71	--	16.37	--	--	--	--	--	--	--	--	--	f
1/21/1998	--	39.08	15.89	--	23.19	13,000	2,900	<10	230	314	3,100	3.9	SPL	--	
4/9/1998	--	39.08	13.50	--	25.58	--	--	--	--	--	--	--	--	--	
4/10/1998	--	39.08	--	--	--	890	<0.5	<1	<1	<1	730	4.9	SPL	--	
6/19/1998	--	39.08	14.75	--	24.33	60	<0.5	<1.0	<1.0	<1.0	34	4.3	SPL	--	
11/30/1998	--	39.08	19.25	--	19.83	--	--	--	--	--	--	--	--	--	
1/21/1999	--	39.08	18.94	--	20.14	3,700	830	93	200	360	30	--	--	--	
4/30/1999	--	39.08	19.10	--	19.98	--	--	--	--	--	--	--	--	--	
7/9/1999	--	39.08	18.93	--	20.15	76,000	12,000	6,600	2,000	8,700	320	--	SPL	--	
11/3/1999	--	39.08	20.65	--	18.43	--	--	--	--	--	--	--	--	--	
1/12/2000	--	39.08	21.21	--	17.87	67,000	12,000	3,500	2,900	15,000	280	--	PACE	--	
4/13/2000	--	39.08	21.33	--	17.75	--	--	--	--	--	--	--	--	--	
5/24/2000	--	39.08	19.84	--	19.24	--	--	--	--	--	--	--	--	--	
6/1/2000	--	39.08	19.04	--	20.04	--	--	--	--	--	--	--	--	--	
6/8/2000	--	39.08	18.32	--	20.76	--	--	--	--	--	--	--	--	--	
6/15/2000	--	39.08	16.70	--	22.38	--	--	--	--	--	--	--	--	--	
7/26/2000	--	39.08	21.50	--	17.58	910	<0.5	<0.5	<0.5	<0.5	3,500	--	PACE	--	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-4 Cont.															
10/24/2000	--	39.08	22.00	--	17.08	--	--	--	--	--	--	--	--	--	
1/19/2001	--	39.08	18.97	--	20.11	6,600	2,460	24	497	534	267	--	PACE	--	
7/24/2001	--	39.08	18.55	--	20.53	5,100	1,080	143	409	827	115	--	PACE	--	
1/18/2002	--	39.08	17.22	--	21.86	3,900	442	241	157	681	85.3	--	PACE	--	
8/1/2002	--	39.08	--	--	--	--	--	--	--	--	--	--	--	--	f
1/16/2003	--	39.08	16.85	--	22.23	2,900	260	160	120	590	<120	--	SEQ	--	p
7/7/2003	--	39.08	17.94	--	21.14	600	90	7.9	18	36	56	--	SEQ	--	q
02/05/2004	--	39.08	16.94	--	22.14	420	40	3.1	15	27	40	--	SEQM	6.8	
07/01/2004	P	39.08	18.24	--	20.84	6,000	970	200	310	1,500	64	--	SEQM	6.7	
03/16/2005	P	39.08	16.16	--	22.92	3,600	71	31	200	870	23	0.6	SEQM	6.5	
07/22/2005	P	39.08	15.89	--	23.19	4,800	750	48	300	840	59	--	SEQM	6.7	
01/25/2006	P	39.08	15.48	--	23.60	<500	13	<5.0	14	62	12	--	SEQM	7.0	
7/6/2006	P	39.08	14.87	--	24.21	2,800	430	21	230	680	39	--	TAMC	6.7	
1/8/2007	P	39.08	16.48	--	22.60	190	6.6	<0.50	4.1	14	38	3.00	TAMC	6.80	
7/10/2007	P	39.08	17.95	--	21.13	160	2.7	<0.50	0.90	1.0	27	2.54	TAMC	7.19	
1/15/2008	P	39.08	17.70	--	21.38	150	<0.50	<0.50	0.71	<0.50	17	1.30	TAMC	6.75	
7/15/2008	P	39.08	18.74	--	20.34	250	44	1.1	44	78	25	2.64	CEL	6.91	
10/21/2008	P	39.08	20.07	--	19.01	270	1.6	<1.0	<1.0	<1.0	18	1.54	CEL	7.25	
1/6/2009	P	39.08	19.45	--	19.63	230	0.88	<0.50	<0.50	<0.50	8.3	0.70	CEL	6.31	
4/21/2009	P	39.08	17.00	--	22.08	260	4.6	1.6	21	28	4.1	3.51	CEL	7.48	
7/21/2009	**P**	**39.08**	**18.96**	**--**	**20.12**	**200**	**4.8**	**<0.50**	**6.9**	**2.8**	**8.6**	**6.14**	**CEL**	**7.04**	**y**
AW-5															
4/5/1991	--	38.51	25.48	--	13.03	420	31	7.5	20	68	--	--	SUP	--	
4/1/1992	--	38.51	23.95	--	14.56	--	--	--	--	--	--	--	--	--	
4/2/1992	--	38.51	--	--	--	4,000	270	63	190	290	--	--	APP	--	
7/6/1992	--	38.51	26.48	--	12.03	1,400	160	<2.5	250	58	--	--	ANA	--	
10/7/1992	--	38.51	28.18	--	10.33	360	12	0.6	8.7	5	--	--	ANA	--	
1/14/1993	--	38.51	24.15	--	14.36	1,700	270	7.5	130	62	--	--	PACE	--	m
4/22/1993	--	38.51	--	--	--	3,500	780	29	240	210	--	--	PACE	--	m, e
4/22/1993	--	38.51	22.43	--	16.08	2,700	780	30	220	180	--	--	PACE	--	m

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Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-5 Cont.															
7/15/1993	--	38.51	--	--	--	1,300	68	8.3	64	99	<50	--	PACE	--	m, e
7/15/1993	--	38.51	24.31	--	14.20	1,300	69	16	67	120	<50	--	PACE	--	m
10/21/1993	--	38.51	26.05	--	12.46	510	9.6	1.5	17	45	75	--	PACE	--	c, m
1/27/1994	--	38.51	26.42	--	12.09	420	3.3	<0.5	1	0.9	48.9	--	PACE	--	m
4/21/1994	--	38.51	24.36	--	14.15	1,000	110	25	56	27	75	1.3	PACE	--	c, m
9/9/1994	--	38.51	24.55	--	13.96	210	<0.5	<0.5	0.5	0.9	--	2.7	PACE	--	m
12/21/1994	--	38.51	22.30	--	16.21	410	<0.5	20	4.3	1.4	114	1.1	PACE	--	m
12/21/1994	--	38.51	--	--	--	340	<0.5	15	3.3	1.4	104	--	PACE	--	m, e
1/30/1995	--	38.51	18.88	--	19.63	210	0.6	11	8.8	2	--	1.5	ATI	--	
4/10/1995	--	38.51	18.44	--	20.07	500	1.4	0.59	6.5	4.3	--	8.3	ATI	--	
6/29/1995	--	38.51	19.92	--	18.59	490	1.2	0.58	7.3	2.2	--	6.9	ATI	--	d
9/18/1995	--	38.51	22.15	--	16.36	--	--	--	--	--	--	--	--	--	
9/19/1995	--	38.51	--	--	--	260	0.62	<0.50	3.1	1.1	110	8.2	ATI	--	
12/7/1995	--	38.51	23.75	--	14.76	60	<0.50	<0.50	<0.50	<1.0	210	4.3	ATI	--	
3/28/1996	--	38.51	17.76	--	20.75	<50	<0.5	<1	<1	<1	63	3.0	SPL	--	
6/20/1996	--	38.51	18.46	--	20.05	<50	<0.5	<1	<1	<1	<10	3.6	SPL	--	
10/11/1996	--	38.51	21.84	--	16.67	<50	<0.5	<1.0	<1.0	<1.0	<10	4.5	SPL	--	
1/2/1997	--	38.51	18.01	--	20.50	<50	<0.5	<1.0	<1.0	<1.0	<10	4.6	SPL	--	
4/14/1997	--	38.51	19.35	--	19.16	<50	<0.5	<1.0	<1.0	<1.0	<10	5.1	SPL	--	
7/2/1997	--	38.51	20.29	--	18.22	<50	<0.5	<1.0	<1.0	<1.0	<10	4.0	SPL	--	
9/30/1997	--	38.51	23.15	--	15.36	<250	<2.5	<5.0	<5.0	<5.0	1,300	6.3	SPL	--	
1/21/1998	--	38.51	17.33	--	21.18	6,100	<0.5	2.1	<1.0	<1.0	3,700	4.5	SPL	--	
4/9/1998	--	38.51	15.25	--	23.26	--	--	--	--	--	--	--	--	--	
4/10/1998	--	38.51	--	--	--	3,500	<0.5	<1.0	<1.0	<1.0	3,000	5.4	SPL	--	
6/19/1998	--	38.51	17.39	--	21.12	3,300	<0.5	<1.0	<1.0	<1.0	2,500	5.2	SPL	--	
11/30/1998	--	38.51	--	--	--	--	--	--	--	--	--	--	--	--	f
1/21/1999	--	38.51	21.22	--	17.29	2,800	<1.0	<1.0	<1.0	<1.0	1,800	--	SPL	--	
4/30/1999	--	38.51	21.50	--	17.01	--	--	--	--	--	--	--	--	--	
7/9/1999	--	38.51	20.15	--	18.36	4,000	<1.0	<1.0	<1.0	<1.0	3400/3500	--	SPL	--	g
11/3/1999	--	38.51	22.04	--	16.47	--	--	--	--	--	--	--	--	--	
1/12/2000	--	38.51	22.59	--	15.92	1,000	7.3	30	6.7	40	4,600	--	PACE	--	j (TPH-g/GRO)

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Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-5 Cont.															
4/13/2000	--	38.51	23.11	--	15.40	--	--	--	--	--	--	--	--	--	
7/26/2000	--	38.51	22.72	--	15.79	1,800	94	35	5.9	27	16,000	--	PACE	--	
10/24/2000	--	38.51	20.15	--	18.36	--	--	--	--	--	--	--	--	--	
1/19/2001	--	38.51	19.79	--	18.72	2,600	<0.5	<0.5	<0.5	<0.5	4,580	--	PACE	--	
7/24/2001	--	38.51	20.17	--	18.34	5,400	18.4	17.2	<12.5	40.8	5,170	--	PACE	--	
1/18/2002	--	38.51	17.34	--	21.17	3,800	343	0.738	<0.5	<1.0	3,750	--	PACE	--	
8/1/2002	--	38.51	19.49	--	19.02	5,300	<12.5	<12.5	<12.5	<25	3,470	--	PACE	--	
1/16/2003	--	38.51	17.30	--	21.21	1,400	140	<10	<10	<10	1,600	--	SEQ	--	p
7/7/2003	--	38.51	18.43	--	20.08	1,400	<10	<10	<10	<10	980	--	SEQ	--	q
02/05/2004	--	38.51	17.24	--	21.27	1,800	<10	<10	<10	<10	810	--	SEQM	6.7	
07/01/2004	P	38.51	19.43	--	19.08	1,100	<5.0	<5.0	<5.0	<5.0	550	--	SEQM	6.6	
03/16/2005	P	38.51	15.30	--	23.21	<5,000	<50	<50	<50	130	890	2.1	SEQM	6.7	
07/22/2005	P	38.51	17.22	--	21.29	<500	5.2	<5.0	<5.0	6.9	390	--	SEQM	6.6	
01/25/2006	P	38.51	15.28	--	23.23	<500	<5.0	<5.0	<5.0	<5.0	26	--	SEQM	7.0	
7/6/2006	P	38.51	15.93	--	22.58	220	<5.0	<5.0	<5.0	<5.0	170	--	TAMC	6.5	
1/8/2007	P	38.51	17.90	--	20.61	170	<2.5	<2.5	<2.5	<2.5	220	5.22	TAMC	6.84	
7/10/2007	P	38.51	19.00	--	19.51	350	<2.5	<2.5	<2.5	<2.5	360	1.96	TAMC	7.02	
1/15/2008	P	38.51	18.16	--	20.35	130	0.54	<0.50	<0.50	<0.50	85	0.90	TAMC	6.82	w
7/15/2008	P	38.51	19.88	--	18.63	100	<0.50	<0.50	<0.50	<0.50	11	2.13	CEL	6.85	
10/21/2008	P	38.51	20.88	--	17.63	86	<0.50	<0.50	<0.50	<0.50	63	1.01	CEL	7.10	
1/6/2009	P	38.51	20.28	--	18.23	150	<1.0	<1.0	<1.0	<1.0	26	0.70	CEL	6.22	
4/21/2009	P	38.51	18.07	--	20.44	100	<0.50	<0.50	<0.50	<0.50	5.1	2.09	CEL	7.35	
7/21/2009	**P**	**38.51**	**19.70**	**--**	**18.81**	**83**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**25**	**6.50**	**CEL**	**7.14**	**y**
AW-6															
4/5/1991	--	37.08	22.48	--	14.60	1,100	80	19	1.4	230	--	--	SUP	--	
4/1/1992	--	37.08	22.50	--	14.58	--	--	--	--	--	--	--	--	--	
4/2/1992	--	37.08	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	APP	--	
7/6/1992	--	37.08	22.74	--	14.34	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
10/7/1992	--	37.08	24.64	--	12.44	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
1/14/1993	--	37.08	22.36	--	14.72	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m

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						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-6 Cont.															
4/22/1993	--	37.08	22.82	--	14.26	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
7/15/1993	--	37.08	20.49	--	16.59	<50	<0.5	<0.5	<0.5	0.8	<5.0	--	PACE	--	m
10/21/1993	--	37.08	22.84	--	14.24	<50	0.5	0.6	<0.5	0.7	<5.0	--	PACE	--	m
1/27/1994	--	37.08	22.33	--	14.75	<50	<0.5	0.9	3.1	12	<5.0	--	PACE	--	m
4/21/1994	--	37.08	20.66	--	16.42	<50	<0.5	<0.5	<0.5	<0.5	<5.0	1.7	PACE	--	m
9/9/1994	--	37.08	21.57	--	15.51	<50	0.9	<0.5	<0.5	0.5	--	2.9	PACE	--	m
12/21/1994	--	37.08	19.40	--	17.68	<50	1.8	0.8	0.8	3.2	5.19	1.1	PACE	--	m
1/30/1995	--	37.08	16.74	--	20.34	<50	<0.50	<0.50	<0.50	<1.0	--	2.2	ATI	--	
1/30/1995	--	37.08	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	--	--	ATI	--	e
4/10/1995	--	37.08	16.01	--	21.07	<50	<0.50	<0.50	<0.50	<1.0	--	8.6	ATI	--	
6/29/1995	--	37.08	17.54	--	19.54	<50	<0.50	<0.50	<0.50	<1.0	--	6.3	ATI	--	
9/18/1995	--	37.08	19.65	--	17.43	--	--	--	--	--	--	--	--	--	
9/19/1995	--	37.08	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	25	8.3	ATI	--	
12/7/1995	--	37.08	20.35	--	16.73	<50	<0.50	<0.50	<0.50	<1.0	16	4.7	ATI	--	
3/28/1996	--	37.08	14.99	--	22.09	<50	<0.5	<1	<1	<1	<10	4.0	SPL	--	
6/20/1996	--	37.08	15.59	--	21.49	<50	<0.5	<1	<1	<1	<10	4.6	SPL	--	
10/11/1996	--	37.08	19.09	--	17.99	<50	<0.5	<1.0	<1.0	<1.0	<10	5.3	SPL	--	
1/2/1997	--	37.08	15.11	--	21.97	<50	<0.5	<1.0	<1.0	<1.0	<10	5.5	SPL	--	
4/14/1997	--	37.08	16.25	--	20.83	<50	<0.5	<1.0	<1.0	<1.0	<10	3.9	SPL	--	
7/2/1997	--	37.08	17.99	--	19.09	<50	<0.5	<1.0	<1.0	<1.0	<10	5.2	SPL	--	
9/30/1997	--	37.08	20.50	--	16.58	<50	<0.5	<1.0	<1.0	<1.0	<10	6.0	SPL	--	
1/21/1998	--	37.08	15.72	--	21.36	160	<0.5	<1.0	<1.0	<1.0	110	5.0	SPL	--	
4/9/1998	--	37.08	13.31	--	23.77	--	--	--	--	--	--	--	--	--	
4/10/1998	--	37.08	--	--	--	370	<0.5	<1.0	<1.0	<1.0	300	4.3	SPL	--	
6/19/1998	--	37.08	15.18	--	21.90	830	2	<1.0	<1.0	<1.0	690	4.0	SPL	--	
11/30/1998	--	37.08	--	--	--	--	--	--	--	--	--	--	--	--	f
1/21/1999	--	37.08	15.78	--	21.30	2,300	<1.0	<1.0	<1.0	<1.0	1,900	--	SPL	--	
4/30/1999	--	37.08	16.01	--	21.07	--	--	--	--	--	--	--	--	--	
7/9/1999	--	37.08	17.63	--	19.45	--	--	--	--	--	--	--	--	--	
11/3/1999	--	37.08	18.42	--	18.66	--	--	--	--	--	--	--	--	--	
1/12/2000	--	37.08	19.92	--	17.16	<50	<0.5	<0.5	<0.5	<0.5	2,700	--	PACE	--	

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						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-6 Cont.															
4/13/2000	--	37.08	19.87	--	17.21	--	--	--	--	--	--	--	--	--	
7/26/2000	--	37.08	19.99	--	17.09	--	--	--	--	--	--	--	--	--	
10/24/2000	--	37.08	18.12	--	18.96	--	--	--	--	--	--	--	--	--	
1/19/2001	--	37.08	17.04	--	20.04	2,700	<0.5	<0.5	<0.5	<0.5	4,850	--	PACE	--	
7/24/2001	--	37.08	17.83	--	19.25	--	--	--	--	--	--	--	--	--	
1/18/2002	--	37.08	15.54	--	21.54	5,500	614	<0.5	<0.5	<1.0	5,390	--	PACE	--	
8/1/2002	--	37.08	16.98	--	20.10	--	--	--	--	--	--	--	--	--	
1/16/2003	--	37.08	15.05	--	22.03	2,900	<20	<20	<20	63	2,500	--	SEQ	--	p
7/7/2003	--	37.08	16.58	--	20.50	--	--	--	--	--	--	--	--	--	
02/05/2004	--	37.08	15.84	--	21.24	7,000	<50	<50	<50	<50	5,400	--	SEQM	6.7	
07/01/2004	P	37.08	17.91	--	19.17	9,600	<50	<50	<50	<50	4,600	--	SEQM	6.5	
03/16/2005	P	37.08	16.04	--	21.04	6,700	<25	<25	<25	<25	4,400	3.0	SEQM	6.8	
07/22/2005	P	37.08	14.20	--	22.88	<5,000	<50	<50	<50	<50	5,500	--	SEQM	6.7	
01/25/2006	P	37.08	14.17	--	22.91	<5,000	<50	<50	<50	<50	3,000	--	SEQM	7.0	
7/6/2006	P	37.08	14.82	--	22.26	3,100	<50	<50	<50	<50	2,800	--	TAMC	6.5	
1/8/2007	P	37.08	15.72	--	21.36	5100	<50	<50	<50	<50	7400	3.18	TAMC	6.78	
7/10/2007	P	37.08	16.99	--	20.09	3,700	<100	<100	<100	<100	3,900	2.09	TAMC	6.83	w
1/15/2008	P	37.08	15.55	--	21.53	120	1.1	<1.0	<1.0	<1.0	150	0.58	TAMC	6.80	w
7/15/2008	P	37.08	17.84	--	19.24	130	<0.50	<0.50	<0.50	<0.50	270	2.12	CEL	6.87	
10/21/2008	P	37.08	18.92	--	18.16	81	<5.0	<5.0	<5.0	<5.0	160	1.01	CEL	7.19	
1/6/2009	P	37.08	18.37	--	18.71	76	<5.0	<5.0	<5.0	<5.0	97	0.94	CEL	6.23	
4/21/2009	P	37.08	15.97	--	21.11	<50	<0.50	<0.50	<0.50	<0.50	22	4.29	CEL	7.38	
7/21/2009	**P**	**37.08**	**17.90**	**--**	**19.18**	**76**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**93**	**10.79**	**CEL**	**7.09**	**y**
AW-7															
4/5/1991	--	37.60	23.38	--	14.22	<50	0.4	0.7	<0.3	<0.3	--	--	SUP	--	
4/1/1992	--	37.60	21.92	--	15.68	--	--	--	--	--	--	--	--	--	
4/2/1992	--	37.60	--	--	--	<50	<0.5	3.2	1	5.4	--	--	APP	--	
7/6/1992	--	37.60	24.50	--	13.10	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
10/7/1992	--	37.60	26.18	--	11.42	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
1/14/1993	--	37.60	22.03	--	15.57	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-7 Cont.															
4/22/1993	--	37.60	21.18	--	16.42	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
7/15/1993	--	37.60	22.09	--	15.51	<50	<0.5	<0.5	<0.5	<0.5	<5.0	--	PACE	--	m
10/21/1993	--	37.60	24.05	--	13.55	51	5	4.2	3.5	8.2	<5.0	--	PACE	--	m
1/27/1994	--	37.60	23.40	--	14.20	<50	<0.5	<0.5	<0.5	<0.5	<5.0	--	PACE	--	m
4/21/1994	--	37.60	22.24	--	15.36	<50	<0.5	<0.5	<0.5	<0.5	<5.0	2.5	PACE	--	m
9/9/1994	--	37.60	22.94	--	14.66	<50	<0.5	<0.5	<0.5	0.5	--	4.3	PACE	--	m
12/21/1994	--	37.60	20.86	--	16.74	<50	<0.5	<0.5	<0.5	<0.5	<5.0	2.2	PACE	--	m
1/30/1995	--	37.60	17.51	--	20.09	<50	<0.50	<0.50	<0.50	<1.0	--	2.7	ATI	--	
4/10/1995	--	37.60	16.69	--	20.91	<50	<0.50	<0.50	<0.50	<1.0	--	4.8	ATI	--	
6/29/1995	--	37.60	18.33	--	19.27	<50	<0.50	<0.50	<0.50	<1.0	--	7.6	ATI	--	
9/18/1995	--	37.60	20.68	--	16.92	--	--	--	--	--	--	--	--	--	
9/19/1995	--	37.60	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	5.1	ATI	--	
12/7/1995	--	37.60	22.15	--	15.45	<50	<0.50	<0.50	<0.50	<1.0	<5.0	5.2	ATI	--	
3/28/1996	--	37.60	16.38	--	21.22	<50	<0.5	<1	<1	<1	<10	3.9	SPL	--	
6/20/1996	--	37.60	17.02	--	20.58	<50	<0.5	<1	<1	<1	<10	5.0	SPL	--	
10/11/1996	--	37.60	20.47	--	17.13	<50	<0.5	<1.0	<1.0	<1.0	<10	6.3	SPL	--	
1/2/1997	--	37.60	16.70	--	20.90	<50	<0.5	<1.0	<1.0	<1.0	<10	6.2	SPL	--	
4/14/1997	--	37.60	17.96	--	19.64	<50	<0.5	<1.0	<1.0	<1.0	<10	5.0	SPL	--	
7/2/1997	--	37.60	19.11	--	18.49	<50	<0.5	<1.0	<1.0	<1.0	<10	5.4	SPL	--	
9/30/1997	--	37.60	22.97	--	14.63	<250	<2.5	<5.0	<5.0	<5.0	1,100	6.5	SPL	--	
1/21/1998	--	37.60	16.50	--	21.10	<50	<0.5	<1.0	<1.0	<1.0	<10	4.9	SPL	--	
4/9/1998	--	37.60	13.56	--	24.04	<50	<0.5	<1.0	<1.0	<1.0	<10	4.9	SPL	--	
6/19/1998	--	37.60	15.41	--	22.19	<50	<0.5	<1.0	<1.0	<1.0	<10	4.4	SPL	--	
11/30/1998	--	37.60	18.90	--	18.70	--	--	--	--	--	--	--	--	--	
1/21/1999	--	37.60	18.39	--	19.21	--	--	--	--	--	--	--	--	--	
4/30/1999	--	37.60	18.54	--	19.06	--	--	--	--	--	--	--	--	--	
7/9/1999	--	37.60	17.98	--	19.62	--	--	--	--	--	--	--	--	--	
11/3/1999	--	37.60	20.22	--	17.38	--	--	--	--	--	--	--	--	--	
1/12/2000	--	37.60	19.46	--	18.14	--	--	--	--	--	--	--	--	--	
4/13/2000	--	37.60	19.59	--	18.01	--	--	--	--	--	--	--	--	--	
7/26/2000	--	37.60	19.69	--	17.91	--	--	--	--	--	--	--	--	--	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-7 Cont.															
10/24/2000	--	37.60	18.78	--	18.82	--	--	--	--	--	--	--	--	--	
1/19/2001	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	f
7/25/2001	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	f
1/18/2002	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
8/1/2002	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
1/16/2003	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
7/7/2003	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
02/05/2004	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
07/01/2004	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
03/16/2005	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
07/22/2005	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
01/25/2006	--	37.60	--	--	--	--	--	--	--	--	--	--	--	--	o
AW-8															
4/5/1991	--	40.86	26.68	--	14.18	80	1.9	2.2	0.5	1.3	--	--	SUP	--	
4/1/1992	--	40.86	25.11	--	15.75	73	<0.5	0.7	<0.5	0.6	--	--	APP	--	
7/6/1992	--	40.86	26.43	--	14.43	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
10/7/1992	--	40.86	28.59	--	12.27	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
1/14/1993	--	40.86	25.55	--	15.31	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
4/22/1993	--	40.86	22.29	--	18.57	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
7/15/1993	--	40.86	23.42	--	17.44	<50	<0.5	<0.5	<0.5	<0.5	<5.0	--	PACE	--	m
10/21/1993	--	40.86	25.15	--	15.71	<50	1.9	1.8	1.3	3.3	<5.0	--	PACE	--	m
1/27/1994	--	40.86	25.42	--	15.44	<50	<0.5	0.5	0.6	8.5	<5.0	--	PACE	--	m
4/21/1994	--	40.86	24.14	--	16.72	<50	<0.5	<0.5	<0.5	<0.5	<5.0	1.5	PACE	--	m
9/9/1994	--	40.86	24.55	--	16.31	<50	<0.5	<0.5	<0.5	<0.5	--	2.4	PACE	--	m
12/21/1994	--	40.86	22.72	--	18.14	<50	<0.5	<0.5	<0.5	<0.5	<5.0	1.1	PACE	--	m
1/30/1995	--	40.86	19.75	--	21.11	<50	<0.50	1	<0.50	1	--	0.8	ATI	--	
4/10/1995	--	40.86	17.78	--	23.08	<50	<0.50	<0.50	<0.50	<1.0	--	8.3	ATI	--	
6/29/1995	--	40.86	18.18	--	22.68	<50	<0.50	<0.50	<0.50	<1.0	--	8.3	ATI	--	
9/18/1995	--	40.86	20.20	--	20.66	--	--	--	--	--	--	--	--	--	
9/19/1995	--	40.86	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	7.7	ATI	--	

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						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
AW-8 Cont.															
12/7/1995	--	40.86	21.54	--	19.32	<50	<0.50	<0.50	<0.50	<1.0	<5.0	4.4	ATI	--	
3/28/1996	--	40.86	15.77	--	25.09	<50	<0.5	<1	<1	<1	<10	3.8	SPL	--	
6/20/1996	--	40.86	16.41	--	24.45	<50	<0.5	<1	<1	<1	<10	3.6	SPL	--	
10/11/1996	--	40.86	19.90	--	20.96	<50	<0.5	<1.0	<1.0	<1.0	<10	6.4	SPL	--	
1/2/1997	--	40.86	15.89	--	24.97	<50	<0.5	<1.0	<1.0	<1.0	<10	5.9	SPL	--	
4/14/1997	--	40.86	17.07	--	23.79	<50	<0.5	<1.0	<1.0	<1.0	<10	4.6	SPL	--	
7/2/1997	--	40.86	18.67	--	22.19	<50	<0.5	<1.0	<1.0	<1.0	<10	5.6	SPL	--	
9/30/1997	--	40.86	22.52	--	18.34	<50	<5	<10	<10	<10	820	6.7	SPL	--	
1/21/1998	--	40.86	16.01	--	24.85	<50	<0.5	<1.0	<1.0	<1.0	<10	5.2	SPL	--	
4/9/1998	--	40.86	11.18	--	29.68	<50	<0.5	<1.0	<1.0	<1.0	<10	4.4	SPL	--	
6/19/1998	--	40.86	13.01	--	27.85	<50	<0.5	<1.0	<1.0	<1.0	<10	4.1	SPL	--	
11/30/1998	--	40.86	17.46	--	23.40	--	--	--	--	--	--	--	--	--	
1/21/1999	--	40.86	17.47	--	23.39	--	--	--	--	--	--	--	--	--	
4/30/1999	--	40.86	17.60	--	23.26	--	--	--	--	--	--	--	--	--	
7/9/1999	--	40.86	16.50	--	24.36	--	--	--	--	--	--	--	--	--	
11/3/1999	--	40.86	19.29	--	21.57	--	--	--	--	--	--	--	--	--	
1/12/2000	--	40.86	21.49	--	19.37	--	--	--	--	--	--	--	--	--	
4/13/2000	--	40.86	21.60	--	19.26	--	--	--	--	--	--	--	--	--	
7/26/2000	--	40.86	21.53	--	19.33	--	--	--	--	--	--	--	--	--	
10/24/2000	--	40.86	19.37	--	21.49	--	--	--	--	--	--	--	--	--	
1/19/2001	--	40.86	18.60	--	22.26	--	--	--	--	--	--	--	--	--	
7/24/2001	--	40.86	18.22	--	22.64	--	--	--	--	--	--	--	--	--	
1/18/2002	--	40.86	16.29	--	24.57	--	--	--	--	--	--	--	--	--	
8/1/2002	--	40.86	17.25	--	23.61	--	--	--	--	--	--	--	--	--	
1/16/2003	--	40.86	15.82	--	25.04	--	--	--	--	--	--	--	--	--	
7/7/2003	--	40.86	18.55	--	22.31	--	--	--	--	--	--	--	--	--	
02/05/2004	--	40.86	--	--	--	--	--	--	--	--	--	--	--	--	t
07/01/2004	--	40.86	18.25	--	22.61	--	--	--	--	--	--	--	--	--	t
03/16/2005	P	40.86	15.20	--	25.66	<50	<0.50	<0.50	<0.50	<0.50	<0.50	1.5	SEQM	7.3	
07/22/2005	--	40.86	--	--	--	--	--	--	--	--	--	--	--	--	f
01/25/2006	--	40.86	--	--	--	--	--	--	--	--	--	--	--	--	f

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						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
AW-8 Cont.															
7/6/2006	--	40.86	13.05	--	27.81	--	--	--	--	--	--	--	--	--	
1/8/2007	--	40.86	16.57	--	24.29	--	--	--	--	--	--	--	--	--	
7/10/2007	--	40.86	17.73	--	23.13	--	--	--	--	--	--	--	--	--	
1/15/2008	--	40.86	17.88	--	22.98	--	--	--	--	--	--	--	--	--	
7/15/2008	--	40.86	18.57	--	22.29	--	--	--	--	--	--	--	--	--	
10/21/2008	--	40.86	20.09	--	20.77	--	--	--	--	--	--	--	--	--	
1/6/2009	--	40.86	20.20	--	20.66	--	--	--	--	--	--	--	--	--	
4/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	f
7/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	**f**
AW-9															
1/2/1997	--	37.78	10.00	--	27.78	<50	<0.5	<1.0	<1.0	<1.0	<10	6.7	SPL	--	
4/14/1997	--	37.78	--	--	--	--	--	--	--	--	--	--	--	--	f
7/2/1997	--	37.78	12.71	--	25.07	<50	<0.5	<1.0	<1.0	<1.0	<10	6.0	SPL	--	
9/30/1997	--	37.78	21.22	--	16.56	<50	<0.5	<1.0	<1.0	<1.0	<10	6.8	SPL	--	
1/21/1998	--	37.78	10.26	--	27.52	<50	<0.5	<1.0	<1.0	<1.0	<10	5.3	SPL	--	
4/9/1998	--	37.78	6.77	--	31.01	<50	<0.5	<1.0	<1.0	<1.0	<10	5.6	SPL	--	
6/19/1998	--	37.78	8.96	--	28.82	<50	<0.5	<1.0	<1.0	<1.0	<10	4.8	SPL	--	
1/8/2007	--	37.78	17.35	--	20.43	--	--	--	--	--	--	--	--	--	
7/10/2007	--	37.78	18.65	--	19.13	--	--	--	--	--	--	--	--	--	
1/15/2008	--	37.78	18.51	--	19.27	--	--	--	--	--	--	--	--	--	
7/15/2008	--	37.78	19.56	--	18.22	--	--	--	--	--	--	--	--	--	
10/21/2008	--	37.78	21.07	--	16.71	--	--	--	--	--	--	--	--	--	
1/6/2009	--	37.78	21.00	--	16.78	--	--	--	--	--	--	--	--	--	
4/21/2009	--	37.78	18.28	--	19.50	--	--	--	--	--	--	--	--	--	
7/21/2009	--	**37.78**	**20.00**	--	**17.78**	--	--	--	--	--	--	--	--	--	
MW-1															
4/5/1991	--	34.46	--	--	--	--	--	--	--	--	--	--	--	--	
4/1/1992	--	34.46	11.25	--	23.21	--	--	--	--	--	--	--	--	--	
7/6/1992	--	34.46	13.61	--	20.85	--	--	--	--	--	--	--	--	--	

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Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
MW-1 Cont.															
10/7/1992	--	34.46	15.15	--	19.31	--	--	--	--	--	--	--	--	--	
1/14/1993	--	34.46	10.73	--	23.73	--	--	--	--	--	--	--	--	--	
4/22/1993	--	34.46	11.64	--	22.82	--	--	--	--	--	--	--	--	--	
7/15/1993	--	34.46	13.50	--	20.96	--	--	--	--	--	--	--	--	--	
10/21/1993	--	34.46	15.21	--	19.25	--	--	--	--	--	--	--	--	--	
1/27/1994	--	34.46	17.48	--	16.98	--	--	--	--	--	--	--	--	--	
4/21/1994	--	34.46	10.94	--	23.52	110,000	1,400	9,100	3,400	30,000	11,000	1.6	PACE	--	c
9/9/1994	--	34.46	13.80	--	20.66	--	--	--	--	--	--	--	--	--	
12/21/1994	--	34.46	12.60	--	21.86	--	--	--	--	--	--	--	--	--	
1/30/1995	--	34.46	--	--	--	--	--	--	--	--	--	--	--	--	
4/10/1995	--	34.46	10.62	--	23.84	--	--	--	--	--	--	--	--	--	
6/29/1995	--	34.46	18.72	--	15.74	--	--	--	--	--	--	--	--	--	
9/18/1995	--	34.46	12.92	--	21.54	--	--	--	--	--	--	--	--	--	
12/7/1995	--	34.46	13.82	--	20.64	--	--	--	--	--	--	--	--	--	
3/28/1996	--	34.46	10.03	--	24.43	--	--	--	--	--	--	--	--	--	
6/20/1996	--	34.46	11.29	--	23.17	--	--	--	--	--	--	--	--	--	
10/11/1996	--	34.46	14.86	--	19.60	--	--	--	--	--	--	--	--	--	
1/2/1997	--	34.46	11.03	--	23.43	--	--	--	--	--	--	--	--	--	
4/14/1997	--	34.46	12.25	--	22.21	--	--	--	--	--	--	--	--	--	
4/15/1997	--	34.46	--	--	--	35,000	130	650	1,700	8,200	4,800	--	SPL	--	
7/2/1997	--	34.46	14.11	--	20.35	42,000	<250	<500	2,000	9,600	<5000	5.5	SPL	--	
9/30/1997	--	34.46	14.40	--	20.06	61,000	130	1,100	2,700	14,600	2,000	6.7	SPL	--	
1/21/1998	--	34.46	7.99	--	26.47	14,000	11	60	310	1,790	1,300	4.5	SPL	--	
4/9/1998	--	34.46	7.89	--	26.57	--	--	--	--	--	--	--	--	--	
4/10/1998	--	34.46	--	--	--	45,000	380	520	2,100	6,800	9,300	5.3	SPL	--	
6/19/1998	--	34.46	10.31	--	24.15	35,000	170	100	1,100	3,590	5,000	4.9	SPL	--	
11/30/1998	--	34.46	11.16	--	23.30	10,000	100	24	350	1,040	1800/2800	--	SPL	--	g
1/21/1999	--	34.46	10.76	--	23.70	18,000	120	37	590	1,800	2,700	--	SPL	--	
4/30/1999	--	34.46	10.78	--	23.68	17,000	240	89	1,100	1,900	1,600	--	SPL	--	
7/9/1999	--	34.46	12.62	--	21.84	58,000	140	100	1,800	6,900	1,200	--	SPL	--	
11/3/1999	--	34.46	14.00	--	20.46	20,000	62	42	620	2,100	630	--	PACE	--	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
MW-1 Cont.															
1/12/2000	--	34.46	15.25	--	19.21	72,000	110	120	2,400	8,200	630	--	PACE	--	
4/13/2000	--	34.46	15.57	--	18.89	37,000	300	32	1,000	1,700	810	--	PACE	--	
5/24/2000	--	34.46	11.75	--	22.71	--	--	--	--	--	--	--	--	--	
6/1/2000	--	34.46	11.41	--	23.05	--	--	--	--	--	--	--	--	--	
6/8/2000	--	34.46	11.68	--	22.78	--	--	--	--	--	--	--	--	--	
6/15/2000	--	34.46	11.85	--	22.61	--	--	--	--	--	--	--	--	--	
7/26/2000	--	34.46	16.19	--	18.27	10,000	480	210	470	710	1,100	--	PACE	--	
10/24/2000	--	34.46	13.89	--	20.57	9,900	31	7.2	550	1,200	4,400	--	PACE	--	
1/19/2001	--	34.46	12.90	--	21.56	57,000	199	7.66	1,170	3,260	514	--	PACE	--	
7/24/2001	--	34.46	13.55	--	20.91	27,000	96.7	<5.0	548	1,460	285	--	PACE	--	
1/18/2002	--	34.46	10.91	--	23.55	25,000	150	31.5	597	1,040	138	--	PACE	--	
8/1/2002	--	34.46	12.97	--	21.49	25,000	80.2	17.7	714	1,280	489	--	PACE	--	
1/16/2003	--	34.46	10.45	--	24.01	22,000	170	110	630	670	<500	--	SEQ	--	p
7/7/2003	--	34.46	12.40	--	22.06	9,900	42	<5.0	160	150	24	--	SEQ	--	q, u
02/05/2004	--	34.46	10.26	--	24.20	6,200	56	11	250	210	9.2	--	SEQM	6.9	
07/01/2004	--	34.46	13.20	--	21.26	18,000	<50	<50	210	300	<50	--	SEQM	--	u
03/16/2005	P	34.46	9.62	--	24.84	7,600	33	5.4	200	130	<5.0	0.9	SEQM	6.9	
07/22/2005	P	34.46	11.23	--	23.23	15,000	<10	<10	110	130	<10	--	SEQM	6.8	u
01/25/2006	P	34.46	8.75	--	25.71	8,300	8.4	4.8	130	120	<2.5	--	SEQM	7.3	u
7/6/2006	P	34.46	10.36	--	24.10	5,100	<2.5	<2.5	16	12	<2.5	--	TAMC	6.9	
1/8/2007	P	34.46	11.55	--	22.91	2700	4.6	0.66	35	27	2.1	1.83	TAMC	6.92	
7/10/2007	P	34.46	13.01	SHEEN	21.45	1,800	1.9	<0.50	13	4.8	2.4	2.16	TAMC	7.04	
1/15/2008	P	34.46	10.96	--	23.50	2,900	8.0	4.0	84	87	1.2	0.94	TAMC	7.13	
7/15/2008	P	34.46	13.82	--	20.64	3,200	<0.50	<0.50	8.5	4.8	<0.50	1.20	CEL	7.06	
10/21/2008	P	34.46	14.70	--	19.76	2,300	2.6	<0.50	5.4	2.4	<0.50	1.99	CEL	7.30	
1/6/2009	P	34.46	13.67	--	20.79	2,600	15	1.8	13	3.4	<0.50	0.67	CEL	6.90	
4/21/2009	P	34.46	12.31	--	22.15	1,500	2.0	<0.50	1.7	<0.50	<0.50	1.99	CEL	7.54	
7/21/2009	**P**	**34.46**	**13.85**	**--**	**20.61**	**2,900**	**<0.50**	**<0.50**	**4.6**	**1.2**	**<0.50**	**6.20**	**CEL**	**7.43**	**y**
MW-2															
4/5/1991	--	35.50	16.62	--	18.88	<50	0.6	0.9	<0.3	<0.3	--	--	SUP	--	

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Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
MW-2 Cont.															
4/1/1992	--	35.50	11.25	--	24.25	--	--	--	--	--	--	--	--	--	
4/2/1992	--	35.50	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	APP	--	
7/6/1992	--	35.50	12.72	--	22.78	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
10/7/1992	--	35.50	15.08	--	20.42	<50	<0.5	1.8	<0.5	2.3	--	--	ANA	--	
1/14/1993	--	35.50	9.69	--	25.81	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	m
4/22/1993	--	35.50	10.46	--	25.04	<50	<0.5	<0.5	<0.5	<0.5	30	--	PACE	--	c
7/15/1993	--	35.50	12.02	--	23.48	<50	<0.5	<0.5	<0.5	<0.5	21.7	--	PACE	--	c, m
10/21/1993	--	35.50	13.12	--	22.38	<50	0.7	0.9	<0.5	0.9	14.9	--	PACE	--	m
1/27/1994	--	35.50	12.01	--	23.49	<50	0.6	<0.5	<0.5	<0.5	11.5	--	PACE	--	m
4/21/1994	--	35.50	10.60	--	24.90	<50	<0.5	<0.5	<0.5	<0.5	11.4	1.1	PACE	--	m
9/9/1994	--	35.50	12.42	--	23.08	<50	<0.5	<0.5	<0.5	0.6	--	2.2	PACE	--	m
12/21/1994	--	35.50	10.85	--	24.65	<50	<0.5	<0.5	<0.5	<0.5	<5.0	1.2	PACE	--	m
1/30/1995	--	35.50	8.38	--	27.12	<50	<0.50	<0.50	<0.50	<1.0	--	1.7	ATI	--	
4/10/1995	--	35.50	9.00	--	26.50	<50	<0.50	<0.50	<0.50	<1.0	--	7.8	ATI	--	
6/29/1995	--	35.50	9.91	--	25.59	<50	<0.50	<0.50	<0.50	<1.0	--	9.1	ATI	--	
9/18/1995	--	35.50	10.98	--	24.52	--	--	--	--	--	--	--	--	--	
9/19/1995	--	35.50	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	7.2	ATI	--	
12/7/1995	--	35.50	12.30	--	23.20	<50	<0.50	<0.50	<0.50	<1.0	<5.0	2.4	ATI	--	
3/28/1996	--	35.50	8.57	--	26.93	<50	<0.5	<1	<1	<1	<10	3.2	SPL	--	
6/20/1996	--	35.50	9.77	--	25.73	<50	<0.5	<1	<1	<1	<10	4.2	SPL	--	
10/11/1996	--	35.50	13.32	--	22.18	<50	<0.5	<1.0	<1.0	<1.0	<10	6.3	SPL	--	
1/2/1997	--	35.50	9.60	--	25.90	<50	<0.5	<1.0	<1.0	<1.0	<10	6.7	SPL	--	
4/14/1997	--	35.50	10.93	--	24.57	<50	<0.5	<1.0	<1.0	<1.0	<10	5.7	SPL	--	
7/2/1997	--	35.50	12.57	--	22.93	<50	<0.5	<1.0	<1.0	<1.0	<10	5.9	SPL	--	
9/30/1997	--	35.50	12.91	--	22.59	<50	<0.5	<1.0	<1.0	<1.0	<10	6.3	SPL	--	
1/21/1998	--	35.50	10.12	--	25.38	160	<0.5	<1.0	<1.0	<1.0	100	5.4	SPL	--	
4/9/1998	--	35.50	6.82	--	28.68	--	--	--	--	--	--	--	--	--	
4/10/1998	--	35.50	--	--	--	<50	1	<1.0	<1.0	<1.0	23	5.0	SPL	--	
6/19/1998	--	35.50	9.00	--	26.50	<50	<0.5	<1.0	<1.0	<1.0	<10	4.9	SPL	--	
11/30/1998	--	35.50	9.44	--	26.06	--	--	--	--	--	--	--	--	--	
1/21/1999	--	35.50	8.96	--	26.54	<50	<1.0	<1.0	<1.0	<1.0	1.9	--	SPL	--	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
MW-2 Cont.															
4/30/1999	--	35.50	9.15	--	26.35	--	--	--	--	--	--	--	--	--	
7/9/1999	--	35.50	10.82	--	24.68	--	--	--	--	--	--	--	--	--	
11/3/1999	--	35.50	11.86	--	23.64	--	--	--	--	--	--	--	--	--	
1/12/2000	--	35.50	12.35	--	23.15	<50	<0.5	<0.5	<0.5	<0.5	<0.5	--	PACE	--	
4/13/2000	--	35.50	13.01	--	22.49	--	--	--	--	--	--	--	--	--	
7/26/2000	--	35.50	13.01	--	22.49	--	--	--	--	--	--	--	--	--	
10/24/2000	--	35.50	11.57	--	23.93	--	--	--	--	--	--	--	--	--	
1/19/2001	--	35.50	10.52	--	24.98	--	--	--	--	--	--	--	--	--	
7/24/2001	--	35.50	11.13	--	24.37	--	--	--	--	--	--	--	--	--	
1/18/2002	--	35.50	8.85	--	26.65	--	--	--	--	--	--	--	--	--	
8/1/2002	--	35.50	10.47	--	25.03	--	--	--	--	--	--	--	--	--	
1/14/2003	--	35.50	8.49	--	27.01	--	--	--	--	--	--	--	--	--	
7/7/2003	--	35.50	9.63	--	25.87	--	--	--	--	--	--	--	--	--	
02/05/2004	--	35.50	8.40	--	27.10	--	--	--	--	--	--	--	--	--	
07/01/2004	NP	35.50	9.94	--	25.56	--	--	--	--	--	--	--	--	--	
03/16/2005	P	35.50	8.39	--	27.11	<50	<0.50	<0.50	<0.50	<0.50	<0.50	1.3	SEQM	7.1	
07/22/2005	--	35.50	8.80	--	26.70	--	--	--	--	--	--	--	--	--	
01/25/2006	--	35.50	7.85	--	27.65	--	--	--	--	--	--	--	--	--	
7/6/2006	--	35.50	8.33	--	27.17	--	--	--	--	--	--	--	--	--	
1/8/2007	--	35.50	9.35	--	26.15	--	--	--	--	--	--	--	--	--	
7/10/2007	--	35.50	10.45	--	25.05	--	--	--	--	--	--	--	--	--	
1/15/2008	--	35.50	18.83	--	16.67	--	--	--	--	--	--	--	--	--	
7/15/2008	--	35.50	11.07	--	24.43	--	--	--	--	--	--	--	--	--	
10/21/2008	--	35.50	11.30	--	24.20	--	--	--	--	--	--	--	--	--	
1/6/2009	--	35.50	11.00	--	24.50	--	--	--	--	--	--	--	--	--	
4/21/2009	--	35.50	10.00	--	25.50	--	--	--	--	--	--	--	--	--	
7/21/2009	--	**35.50**	**11.10**	--	**24.40**	--	--	--	--	--	--	--	--	--	
MW-3															
4/5/1991	--	36.53	17.84	--	18.69	<50	<0.3	<0.3	<0.3	<0.3	--	--	SUP	--	
4/1/1992	--	36.53	15.64	--	20.89	--	--	--	--	--	--	--	--	--	

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Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
MW-3 Cont.															
4/2/1992	--	36.53	--	--	--	<50	1.4	<0.5	<0.5	<0.5	--	--	APP	--	
7/6/1992	--	36.53	19.03	--	17.50	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
10/7/1992	--	36.53	21.83	--	14.70	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	
1/14/1993	--	36.53	15.96	--	20.57	350	<0.5	<0.5	<0.5	<0.5	714	--	PACE	--	c, m
4/22/1993	--	36.53	16.20	--	20.33	2,800	<0.5	<0.5	<0.5	<0.5	3,600	--	PACE	--	c, m
7/15/1993	--	36.53	16.82	--	19.71	1,400	1.2	<0.5	2	3.5	2,204	--	PACE	--	c, m
10/21/1993	--	36.53	18.84	--	17.69	370	2.1	2.3	2.3	6	847	--	PACE	--	c, m
1/27/1994	--	36.53	18.00	--	18.53	1,300	6.3	<0.5	<0.5	<0.5	3,892	--	PACE	--	c, m
4/21/1994	--	36.53	16.62	--	19.91	2,000	<0.5	<0.5	<0.5	<0.5	3,864	1.4	PACE	--	c, m
9/9/1994	--	36.53	18.38	--	18.15	1,300	<0.5	<0.5	0.5	1.2	--	3.0	PACE	--	m
12/21/1994	--	36.53	15.28	--	21.25	420	16	0.7	3.5	5.9	800	1.9	PACE	--	m
1/30/1995	--	36.53	12.62	--	23.91	<50	<0.50	<0.50	<0.50	<1.0	--	2.5	ATI	--	
4/10/1995	--	36.53	12.41	--	24.12	150	<0.50	<0.50	<0.50	<1.0	--	6.9	ATI	--	
6/29/1995	--	36.53	14.95	--	21.58	100	<0.50	<0.50	<0.50	<1.0	--	6.4	ATI	--	d (TPH-g)
9/18/1995	--	36.53	15.82	--	20.71	--	--	--	--	--	--	--	--	--	
9/19/1995	--	36.53	--	--	--	82	<0.50	<0.50	<0.50	<1.0	260	7.0	ATI	--	
12/7/1995	--	36.53	17.09	--	19.44	<50	<0.50	<0.50	<0.50	<1.0	91	4.5	ATI	--	
3/28/1996	--	36.53	11.90	--	24.63	<50	<0.5	<1	<1	<1	230	4.2	SPL	--	
6/20/1996	--	36.53	12.66	--	23.87	260	<0.5	<1	<1	<1	370	4.4	SPL	--	
10/11/1996	--	36.53	16.23	--	20.30	330	<0.5	<1.0	<1.0	<1.0	440	5.8	SPL	--	
1/2/1997	--	36.53	12.17	--	24.36	<50	<0.5	<1.0	<1.0	<1.0	140	6.0	SPL	--	
4/14/1997	--	36.53	13.45	--	23.08	--	--	--	--	--	--	--	--	--	
4/15/1997	--	36.53	--	--	--	1,500	<0.5	<1.0	<1.0	<1.0	1,800	5.6	SPL	--	
7/2/1997	--	36.53	15.60	--	20.93	880	<0.5	<1.0	<1.0	<1.0	940	5.3	SPL	--	
9/30/1997	--	36.53	17.16	--	19.37	40,000	13,000	2,400	870	3,100	510	6.6	SPL	--	
1/21/1998	--	36.53	11.77	--	24.76	120	<0.5	<1.0	<1.0	<1.0	98	4.7	SPL	--	
4/9/1998	--	36.53	9.42	--	27.11	950	<0.5	<1.0	<1.0	<1.0	890	5.7	SPL	--	
6/19/1998	--	36.53	15.28	--	21.25	1,800	<0.5	<1.0	<1.0	<1.0	1,900	4.7	SPL	--	
6/19/1998	--	36.53	12.09	--	24.44	1,800	<0.5	<1.0	<1.0	<1.0	1,900	4.7	SPL	--	
1/21/1999	--	36.53	14.67	--	21.86	1,100	<1.0	<1.0	<1.0	<1.0	1,200	--	SPL	--	
4/30/1999	--	36.53	16.00	--	20.53	--	--	--	--	--	--	--	--	--	

Table 1. Summary of Ground-Water Monitoring Data: Relative Water Elevations and Laboratory Analyses

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
MW-3 Cont.															
7/9/1999	--	36.53	14.64	--	21.89	470	<1.0	<1.0	<1.0	<1.0	460/470	--	SPL	--	g
11/3/1999	--	36.53	16.39	--	20.14	--	--	--	--	--	--	--	--	--	
1/12/2000	--	36.53	16.80	--	19.73	<50	<0.5	<0.5	<0.5	<0.5	34	--	PACE	--	
4/13/2000	--	36.53	16.43	--	20.10	--	--	--	--	--	--	--	--	--	
7/26/2000	--	36.53	16.93	--	19.60	<50	<0.5	<0.5	<0.5	<0.5	<0.5	--	PACE	--	
10/24/2000	--	36.53	15.69	--	20.84	--	--	--	--	--	--	--	--	--	
1/19/2001	--	36.53	14.84	--	21.69	<50	<0.5	<0.5	<0.5	1	25.9	--	PACE	--	
7/23/2001	--	36.53	15.11	--	21.42	62	<0.5	<0.5	<0.5	<1.5	28.7	--	PACE	--	
1/18/2002	--	36.53	12.37	--	24.16	<50	<0.5	<0.5	<0.5	<1.0	17.8	--	PACE	--	
8/1/2002	--	36.53	14.44	--	22.09	66	<0.5	<0.5	<0.5	<1.0	<0.5	--	PACE	--	
1/16/2003	--	36.53	12.07	--	24.46	<50	<0.50	<0.50	<0.50	<0.50	20	--	SEQ	--	p
7/7/2003	--	36.53	13.90	--	22.63	<50	<0.50	<0.50	<0.50	<0.50	8.8	--	SEQ	--	q
02/05/2004	--	36.53	12.60	--	23.93	<50	<0.50	<0.50	<0.50	<0.50	4.6	--	SEQM	7.0	
07/01/2004	--	36.53	14.57	--	21.96	<50	<0.50	<0.50	<0.50	<0.50	3.3	--	SEQM	--	
03/16/2005	P	36.53	11.03	--	25.50	<50	<0.50	<0.50	<0.50	<0.50	4.4	1.5	SEQM	6.8	
07/22/2005	P	36.53	12.68	--	23.85	<50	<0.50	<0.50	<0.50	<0.50	4.1	--	SEQM	6.8	
01/25/2006	P	36.53	11.35	--	25.18	81	<0.50	<0.50	<0.50	<0.50	3.0	--	SEQM	6.9	
7/6/2006	P	36.53	11.47	--	25.06	<50	<0.50	<0.50	<0.50	<0.50	3.0	--	TAMC	6.9	
1/8/2007	P	36.53	12.92	--	23.61	<50	<0.50	<0.50	<0.50	<0.50	3.2	2.87	TAMC	7.12	
7/10/2007	P	36.53	14.46	--	22.07	<50	<0.50	<0.50	<0.50	<0.50	2.8	2.87	TAMC	7.25	
1/15/2008	P	36.53	12.99	--	23.54	<50	<0.50	<0.50	<0.50	<0.50	0.88	1.04	TAMC	7.10	
7/15/2008	P	36.53	15.30	--	21.23	<50	<0.50	<0.50	<0.50	<0.50	1.3	1.60	CEL	7.06	
10/21/2008	P	36.53	16.30	--	20.23	<50	<0.50	<0.50	<0.50	<0.50	0.94	2.21	CEL	7.28	
1/6/2009	P	36.53	15.45	--	21.08	<50	<0.50	<0.50	<0.50	<0.50	<0.50	1.02	CEL	6.43	
4/21/2009	P	36.53	13.90	--	22.63	<50	<0.50	<0.50	<0.50	<0.50	<0.50	2.26	CEL	7.59	
7/21/2009	**P**	**36.53**	**15.28**	**--**	**21.25**	**<50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**0.60**	**15.16**	**CEL**	**7.43**	**y**
QC-2															
10/7/1992	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	ANA	--	i
1/14/1993	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	i, m
4/22/1993	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	i, m

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Well and Sample Date	P/NP	TOC Elevation (feet)	Depth to Water (feet bgs)	Product Thickness (feet)	Water Level Elevation (feet)	Concentrations in (µg/L)						DO (mg/L)	Lab	pH	Comments
						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
QC-2 Cont.															
7/15/1993	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	<5.0	--	PACE	--	i, m
10/21/1993	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	i
1/27/1994	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	i
4/21/1994	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	i
9/9/1994	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	i
12/21/1994	--	37.73	--	--	--	<50	<0.5	<0.5	<0.5	<0.5	--	--	PACE	--	i
1/30/1995	--	37.73	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	--	--	ATI	--	i
4/10/1995	--	37.73	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	--	--	ATI	--	i
6/27/1995	--	37.73	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	--	--	ATI	--	i
9/19/1995	--	37.73	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	--	ATI	--	i
12/7/1995	--	37.73	--	--	--	<50	<0.50	<0.50	<0.50	<1.0	<5.0	--	ATI	--	i
3/28/1996	--	37.73	--	--	--	<50	<0.5	<1	<1	<1	<10	--	SPL	--	i
6/20/1996	--	37.73	--	--	--	<50	<0.5	<1	<1	<1	<10	--	SPL	--	i
RW-1															
4/5/1991	--	37.73	--	--	--	--	--	--	--	--	--	--	--	--	
4/1/1992	--	37.73	22.81	--	14.92	--	--	--	--	--	--	--	--	--	
7/6/1992	--	37.73	26.92	--	10.81	--	--	--	--	--	--	--	--	--	
10/7/1992	--	37.73	28.51	--	9.22	--	--	--	--	--	--	--	--	--	
1/14/1993	--	37.73	23.75	--	13.98	--	--	--	--	--	--	--	--	--	
4/22/1993	--	37.73	22.70	--	15.03	--	--	--	--	--	--	--	--	--	
7/15/1993	--	37.73	26.10	--	11.63	--	--	--	--	--	--	--	--	--	
10/21/1993	--	37.73	25.40	--	12.33	--	--	--	--	--	--	--	--	--	
1/27/1994	--	37.73	28.02	--	9.71	--	--	--	--	--	--	--	--	--	
4/21/1994	--	37.73	23.10	--	14.63	--	--	--	--	--	--	--	--	--	
9/9/1994	--	37.73	24.39	--	13.34	--	--	--	--	--	--	--	--	--	
12/21/1994	--	37.73	--	--	--	--	--	--	--	--	--	--	--	--	h
12/7/1995	--	37.73	25.71	--	12.02	150,000	34,000	35,000	4,300	21,000	2,700	--	ATI	--	
3/28/1996	--	37.73	16.75	--	20.98	--	--	--	--	--	--	--	--	--	
6/20/1996	--	37.73	25.10	--	12.63	--	--	--	--	--	--	--	--	--	h
10/11/1996	--	37.73	25.51	--	12.22	130,000	20,000	32,000	2,800	20,700	1400/1200	7.4	SPL	--	g

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						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
RW-1 Cont.															
1/2/1997	--	37.73	24.49	--	13.24	--	--	--	--	--	--	--	--	--	
4/14/1997	--	37.73	23.99	--	13.74	--	--	--	--	--	--	--	--	--	
4/15/1997	--	37.73	--	--	--	1,800,000	38,000	190,000	48,000	281,000	<25000	--	SPL	--	
7/2/1997	--	37.73	16.40	--	21.33	140,000	19,000	55,000	4,400	32,400	<10000	5.7	SPL	--	
7/2/1997	--	37.73	--	--	--	130,000	19,000	54,000	4,700	33,400	<10000	--	SPL	--	e
9/30/1997	--	37.73	27.97	--	9.76	110,000	13,000	22,000	2,000	12,500	1,100	7.0	SPL	--	
9/30/1997	--	37.73	--	--	--	140,000	17,000	29,000	2,500	15,900	1,200	--	SPL	--	e
1/21/1998	--	37.73	14.14	--	23.59	270,000	21,000	48,000	3,500	25,000	1,100	4.8	SPL	--	
4/9/1998	--	37.73	25.01	--	12.72	--	--	--	--	--	--	--	--	--	
4/10/1998	--	37.73	--	--	--	220,000	26,000	46,000	4,400	24,500	<2500	5.1	SPL	--	
6/19/1998	--	37.73	11.43	--	26.30	180,000	19,000	32,000	3,000	17,400	<2500	4.6	SPL	--	
11/30/1998	--	37.73	7.87	--	29.86	--	--	--	--	--	--	--	--	--	
1/21/1999	--	37.73	18.90	--	18.83	260,000	24,000	46,000	5,100	30,000	1,700	--	SPL	--	
7/9/1999	--	37.73	18.58	--	19.15	--	--	--	--	--	--	--	--	--	
11/3/1999	--	37.73	20.85	--	16.88	160,000	19,000	37,000	3,800	25,000	1,500	--	PACE	--	
1/12/2000	--	37.73	21.20	--	16.53	240,000	18,000	46,000	5,800	26,000	2,100	--	PACE	--	
4/13/2000	--	37.73	21.71	--	16.02	120,000	2,100	33,000	2,800	28,000	1,500	--	PACE	--	
5/24/2000	--	37.73	21.89	--	15.84	--	--	--	--	--	--	--	--	--	
6/1/2000	--	37.73	16.30	--	21.43	--	--	--	--	--	--	--	--	--	
6/8/2000	--	37.73	17.88	--	19.85	--	--	--	--	--	--	--	--	--	
6/15/2000	--	37.73	16.72	--	21.01	--	--	--	--	--	--	--	--	--	
6/20/2000	--	37.73	21.04	--	16.69	--	--	--	--	--	--	--	--	--	
7/7/2000	--	37.73	17.21	--	20.52	--	--	--	--	--	--	--	--	--	
7/20/2000	--	37.73	21.87	--	15.86	--	--	--	--	--	--	--	--	--	
7/26/2000	--	37.73	21.45	--	16.28	67,000	160	5,300	2,100	18,000	1,100	--	PACE	--	
7/31/2000	--	37.73	22.11	--	15.62	--	--	--	--	--	--	--	--	--	
8/8/2000	--	37.73	17.80	--	19.93	--	--	--	--	--	--	--	--	--	
8/16/2000	--	37.73	17.92	--	19.81	--	--	--	--	--	--	--	--	--	
8/23/2000	--	37.73	18.11	--	19.62	--	--	--	--	--	--	--	--	--	
10/24/2000	--	37.73	18.93	--	18.80	--	--	--	--	--	--	--	--	--	
10/25/2000	--	37.73	19.04	--	18.69	360,000	18,000	78,000	34,000	180,000	2,100	--	PACE	--	k

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						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
RW-1 Cont.															
1/19/2001	--	37.73	18.19	--	19.54	110,000	9,450	19,600	3,510	21,100	1,270	--	PACE	--	
7/24/2001	--	37.73	17.93	--	19.80	--	--	--	--	--	--	--	--	--	l
1/18/2002	--	37.73	14.87	--	22.86	63,000	2,060	4,370	1,770	13,900	491	--	PACE	--	
8/1/2002	--	37.73	16.84	--	20.89	60,000	1,210	2,200	1,520	10,600	390	--	PACE	--	
1/16/2003	--	37.73	14.42	--	23.31	34,000	2,500	2,700	780	5,300	680	--	SEQ	--	p
7/7/2003	--	37.73	16.11	--	21.62	50,000	640	280	1,600	10,000	<250	--	SEQ	--	q, u
07/01/2004	P	37.73	16.75	--	20.98	47,000	320	87	1,900	7,500	72	--	SEQM	6.7	
03/16/2005	P	37.73	12.48	--	25.25	17,000	28	23	350	590	53	1.0	SEQM	6.8	
07/22/2005	P	37.73	14.40	--	23.33	5,900	50	35	120	220	51	--	SEQM	6.7	u
01/25/2006	P	37.73	12.00	--	25.73	7,000	22	5.9	190	--	34	--	SEQM	7.1	
7/6/2006	P	37.73	13.01	--	24.72	16,000	37	14	470	230	64	--	TAMC	6.8	
1/8/2007	P	37.73	14.75	--	22.98	2400	16	10	56	54	22	3.61	TAMC	6.86	
7/10/2007	P	37.73	16.21	--	21.52	3,800	4.4	2.8	72	22	21	2.65	TAMC	6.98	
1/15/2008	P	37.73	14.63	--	23.10	1,700	21	1.6	45	10	14	1.31	TAMC	6.82	
7/15/2008	P	37.73	17.04	--	20.69	1,600	<0.50	0.66	4.4	3.0	12	1.32	CEL	6.95	
10/21/2008	P	37.73	18.44	--	19.29	3,600	<0.50	1.3	19	10	12	0.79	CEL	7.17	
1/6/2009	P	37.73	17.50	--	20.23	1,300	<0.50	<0.50	1.6	2.7	7.0	1.02	CEL	6.43	
4/21/2009	P	37.73	15.37	--	22.36	2,000	27	1.9	30	16	6.0	0.86	CEL	7.38	x
7/21/2009	**P**	**37.73**	**17.20**	**--**	**20.53**	**870**	**<0.50**	**<0.50**	**<0.50**	**0.57**	**7.0**	**13.31**	**CEL**	**7.35**	**y**
VEW-4															
07/22/2005	P	--	14.04	--	--	680	41	24	20	67	<0.50	--	SEQM	6.8	
1/15/2008	P	--	15.05	--	--	350	19	1.1	5.0	3.3	<0.50	0.54	TAMC	6.99	
7/15/2008	P	--	17.24	--	--	53	<0.50	<0.50	<0.50	<0.50	<0.50	0.59	CEL	6.95	
10/21/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
1/6/2009	--	--	18.00	--	--	--	--	--	--	--	--	--	--	--	
4/21/2009	P	--	15.81	--	--	610	5.9	0.64	4.0	1.9	<0.50	1.99	CEL	7.41	
7/21/2009	**P**	**--**	**17.60**	**--**	**--**	**<50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**8.99**	**CEL**	**7.24**	**y**
VEW-5															
07/22/2005	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v

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						GRO/ TPHg	Benzene	Toluene	Ethyl- Benzene	Total Xylenes	MTBE				
VEW-5 Cont.															
1/15/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
7/15/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
10/21/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
1/6/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
4/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
7/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	**v**
VEW-6															
1/15/2008	--	--	11.83	--	--	--	--	--	--	--	--	--	--	--	
7/15/2008	--	--	14.81	--	--	--	--	--	--	--	--	--	--	--	
10/21/2008	--	--	16.02	--	--	--	--	--	--	--	--	--	--	--	
1/6/2009	--	--	14.70	--	--	--	--	--	--	--	--	--	--	--	
4/21/2009	--	--	13.34	--	--	--	--	--	--	--	--	--	--	--	
7/21/2009	--	--	**14.90**	--	--	--	--	--	--	--	--	--	--	--	
VEW-7															
1/15/2008	--	--	13.24	--	--	--	--	--	--	--	--	--	--	--	
7/15/2008	--	--	15.91	--	--	--	--	--	--	--	--	--	--	--	
10/21/2008	--	--	16.89	--	--	--	--	--	--	--	--	--	--	--	
1/6/2009	--	--	16.00	--	--	--	--	--	--	--	--	--	--	--	
4/21/2009	--	--	14.30	--	--	--	--	--	--	--	--	--	--	--	
7/21/2009	--	--	**15.98**	--	--	--	--	--	--	--	--	--	--	--	
VEW-8															
07/22/2005	P	--	14.24	--	--	<50	<0.50	<0.50	<0.50	<0.50	<0.50	--	SEQM	6.8	
1/15/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
7/15/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
10/21/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
1/6/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
4/21/2009	--	--	16.53	--	--	--	--	--	--	--	--	--	--	--	
7/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	**v**

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						GRO/ TPHg	Benzene	Toluene	Ethyl-Benzene	Total Xylenes	MTBE				
VEW-9															
1/15/2008	--	--	5.31	--	--	--	--	--	--	--	--	--	--	--	
7/15/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
10/21/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
1/6/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	f
4/21/2009	--	--	6.18	--	--	--	--	--	--	--	--	--	--	--	
7/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	**v**
VW-1															
1/15/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
7/15/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
10/21/2008	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
1/6/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
4/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	v
7/21/2009	--	--	--	--	--	--	--	--	--	--	--	--	--	--	**v**
VW-2															
1/15/2008	--	--	0.25	--	--	--	--	--	--	--	--	--	--	--	
7/15/2008	--	--	0.65	--	--	--	--	--	--	--	--	--	--	--	
10/21/2008	--	--	0.68	--	--	--	--	--	--	--	--	--	--	--	
1/6/2009	--	--	0.45	--	--	--	--	--	--	--	--	--	--	--	
4/21/2009	--	--	0.45	--	--	--	--	--	--	--	--	--	--	--	
7/21/2009	--	--	**0.52**	--	--	--	--	--	--	--	--	--	--	--	
VW-3															
1/15/2008	--	--	2.08	--	--	--	--	--	--	--	--	--	--	--	
7/15/2008	--	--	4.10	--	--	--	--	--	--	--	--	--	--	--	
10/21/2008	--	--	4.95	--	--	--	--	--	--	--	--	--	--	--	
1/6/2009	--	--	5.40	--	--	--	--	--	--	--	--	--	--	--	
4/21/2009	--	--	4.57	--	--	--	--	--	--	--	--	--	--	--	
7/21/2009	--	--	**5.22**	--	--	--	--	--	--	--	--	--	--	--	

ABBREVIATIONS & SYMBOLS:
-- = Not analyzed/applicable/measured/available
< = Not detected at or above specified laboratory reporting limit
DO = Dissolved oxygen
DTW = Depth to water in ft bgs
ft bgs = Feet below ground surface
ft MSL = Feet above mean sea level
GRO = Gasoline range organics
GWE = Groundwater elevation in ft MSL
mg/L = Milligrams per liter
MTBE = Methyl tert-butyl ether
NP = Well not purged prior to sampling
P = Well purged prior to sampling
TOC = Top of casing in ft MSL
TPH-g = Total petroleum hydrocarbons as gasoline
µg/L = Micrograms per liter
ANA = Anametrix, Inc.
PACE = Pace, Inc.
ATI = Analytical Technologies, Inc.
CEI = Ceimic Corporation
SPL = Southern Petroleum Laboratories
SEQ/SEQM= Sequoia Analytical/Sequoia Analytical Morgan Hill Laboratories
CEL = CalScience Environmental Laboratories, Inc.

FOOTNOTES:
c = A copy of the documentation for this data is included in Appendix C of Alistoreport 10-025-13-003.
d = MTBE peak. See documentation in Appendix C of Alisto report 10-025-13-003.
e = Blind duplicate.
f = Well inaccessible.
g = EPA Methods 8020/8260 used.
h = Well not monitored and/or sampled due to vapor extraction system.
i = Travel blank.
j = This gasoline does not include MTBE.
k = Well was sampled on a different date from the other wells due to lack of proper equipment.
l = Unable to sample due to nature of product.
m = A copy of the documentation for this data is included in Blaine Tech Services, Inc., Report 010724-B-2. The data for sampling events January 14, 1993 and April 22, 1993 has been destroyed. No chromatograms could be located for samples AW-2 on January 27, 1994, and for samples AW-1, AW-2, AW-3, AW-4, AW-5, AW-6, AW-7, AW-8, MW-2 and MW-3 on September 9, 1994.
n = On June 1, 2001, after reviewing chromatograms, Sequoia reported the value as <5.0.
o = Unable to locate well.
p = TPH-g data analyzed by EPA Method 8015B modified; BTEX and MTBE by EPA Method 8021B
q = TPH-g, BTEX, and MTBE analyzed by EPA method 8260B beginning on the third quarter 2003 sampling event 07/07/03.
r = Discrete peak at C5.
t = Well was not gauged during the quarter due to an oversite by the technician.
u = Sheen in well.
v = Well was dry.
w = Hydrocarbon result partly due to individ. peak(s) in quant. range.
x = Sample taken from VOA vial with air bubble > 6mm diameter.
y = DO value suspect.

NOTES:
Beginning in the fourth quarter 2003, the laboratory modified the reported analyte list. TPH-g was changed to GRO. The resulting data may be impacted by the potential of non-TPH-g analytes within the requested fuel range resulting in a higher concentration being reported.

Beginning in the second quarter 2004, the carbon range for GRO was changed from C6-C10 to C4-C12.

Values for DO and pH were obtained through field measurements.

GWEs adjusted assuming a specific gravity of 0.75 for free product

GRO analysis was completed by EPA method 8260B (C4-C12) for samples collected from the time period April 2006 through February 4, 2008. The analysis for GRO was changed to EPA method 8015B (C6-C12) for samples collected from the time period February 5, 2008 through the present.

Note: The data within this table collected prior to April 2006 was provided to Broadbent & Associates, Inc. by Atlantic Richfield Company and their previous consultants. Broadbent & Associates, Inc. has not verified the accuracy of this information.

Table 2. Summary of Fuel Additives Analytical Data

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	Concentrations in (µg/L)								Comments
	Ethanol	TBA	MTBE	DIPE	ETBE	TAME	1,2-DCA	EDB	
AW-1									
7/7/2003	<5,000	<1,000	1,100	<25	<25	190	--	--	
02/05/2004	<10,000	<2,000	930	<50	<50	160	<50	<50	
07/01/2004	<5,000	<1,000	1,100	<25	<25	170	<25	<25	
03/16/2005	<5,000	<1,000	720	<25	<25	130	<25	<25	
07/22/2005	<1,000	<200	510	<5.0	<5.0	93	31	<5.0	
01/25/2006	<6,000	<400	490	<10	<10	94	21	<10	
7/6/2006	<6,000	<400	270	<10	<10	49	<10	<10	
1/8/2007	<3000	240	380	<5.0	<5.0	64	<5.0	--	
7/10/2007	<6,000	<400	220	<10	<10	36	<10	<10	
1/15/2008	<6,000	<400	230	<10	<10	45	<10	<10	
7/15/2008	<300	<10	<0.50	<0.50	<0.50	15	<0.50	<0.50	
10/21/2008	<3,000	390	120	<5.0	<5.0	22	<5.0	<5.0	
1/6/2009	<3,000	190	170	<5.0	<5.0	28	<5.0	<5.0	
4/21/2009	<6,000	<200	160	<10	<10	27	<10	<10	
7/21/2009	**<6,000**	**<200**	**170**	**<10**	**<10**	**30**	**<10**	**<10**	
AW-2									
02/05/2004	<100	<20	5.1	<0.50	<0.50	<0.50	<0.50	<0.50	
03/16/2005	<100	<20	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
01/25/2006	<600	<40	12	<1.0	<1.0	1.0	<1.0	<1.0	
1/8/2007	<3000	<200	40	<5.0	<5.0	<5.0	<5.0	--	
1/15/2008	<6,000	<400	48	<10	<10	<10	<10	<10	
7/15/2008	<30,000	<1,000	<50	<50	<50	<50	<50	<50	
10/21/2008	<7,500	<250	16	<12	<12	<12	<12	<12	
1/6/2009	<6,000	<200	11	<10	<10	<10	<10	<10	
4/21/2009	<6,000	<200	10	<10	<10	<10	<10	<10	
7/21/2009	**<6,000**	**<200**	**13**	**<10**	**<10**	**<10**	**<10**	**<10**	
AW-3									
03/16/2005	<100	<20	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
AW-4									
7/7/2003	<1,000	<200	56	<5.0	<5.0	<5.0	--	--	

Table 2. Summary of Fuel Additives Analytical Data

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	Concentrations in (µg/L)								Comments
	Ethanol	TBA	MTBE	DIPE	ETBE	TAME	1,2-DCA	EDB	
AW-4 Cont.									
02/05/2004	<200	<40	40	<1.0	<1.0	3.7	<1.0	<1.0	
07/01/2004	<1,000	<200	64	<5.0	<5.0	9.6	<5.0	<5.0	
03/16/2005	<500	<100	23	<2.5	<2.5	<2.5	<2.5	<2.5	
07/22/2005	<2,000	<400	59	<10	<10	<10	<10	<10	
01/25/2006	<3,000	<200	12	<5.0	<5.0	<5.0	<5.0	<5.0	
7/6/2006	<3,000	<5.0	39	<5.0	<5.0	<5.0	<5.0	<5.0	
1/8/2007	<300	<20	38	<0.50	<0.50	6.2	<0.50	--	
7/10/2007	<300	<20	27	<0.50	<0.50	4.2	<0.50	<0.50	
1/15/2008	<300	<20	17	<0.50	<0.50	2.3	<0.50	<0.50	
7/15/2008	<300	<10	25	<0.50	<0.50	3.4	<0.50	<0.50	
10/21/2008	<600	<20	18	<1.0	<1.0	1.9	<1.0	<1.0	
1/6/2009	<300	<10	8.3	<0.50	<0.50	0.81	<0.50	<0.50	
4/21/2009	<300	<10	4.1	<0.50	<0.50	<0.50	<0.50	<0.50	
7/21/2009	**<300**	**<10**	**8.6**	**<0.50**	**<0.50**	**0.89**	**<0.50**	**<0.50**	
AW-5									
7/7/2003	<2,000	1,200	980	<10	<10	210	--	--	
02/05/2004	<2,000	1,200	810	<10	<10	160	<10	<10	
07/01/2004	<1,000	1,600	550	<5.0	<5.0	94	<5.0	<5.0	
03/16/2005	<10,000	2,100	890	<50	<50	190	<50	<50	
07/22/2005	<1,000	370	390	<5.0	<5.0	78	<5.0	<5.0	
01/25/2006	<3,000	580	26	<5.0	<5.0	5.2	<5.0	<5.0	
7/6/2006	<3,000	240	170	<5.0	<5.0	37	<5.0	<5.0	
1/8/2007	<1500	240	220	<2.5	<2.5	51	<2.5	--	
7/10/2007	<1,500	110	360	<2.5	<2.5	92	<2.5	<2.5	
1/15/2008	<300	200	85	<0.50	<0.50	21	<0.50	<0.50	
7/15/2008	<300	100	11	<0.50	<0.50	2.4	<0.50	<0.50	
10/21/2008	<300	130	63	<0.50	<0.50	16	<0.50	<0.50	
1/6/2009	<600	150	26	<1.0	<1.0	5.0	<1.0	<1.0	
4/21/2009	<300	130	5.1	<0.50	<0.50	1.3	<0.50	<0.50	
7/21/2009	**<300**	**110**	**25**	**<0.50**	**<0.50**	**5.2**	**<0.50**	**<0.50**	

Table 2. Summary of Fuel Additives Analytical Data

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	Concentrations in (µg/L)								Comments
	Ethanol	TBA	MTBE	DIPE	ETBE	TAME	1,2-DCA	EDB	
AW-6									
02/05/2004	<10,000	<2,000	5,400	<50	<50	1,800	<50	<50	
07/01/2004	<10,000	<2,000	4,600	<50	<50	1,600	<50	<50	
03/16/2005	<5,000	<1,000	4,400	<25	<25	1,400	<25	<25	
07/22/2005	<10,000	<2,000	5,500	<50	<50	1,400	<50	<50	
01/25/2006	<30,000	<2,000	3,000	<50	<50	940	<50	<50	
7/6/2006	<30,000	<2,000	2,800	<50	<50	780	<50	<50	
1/8/2007	<30000	<2000	7400	<50	<50	1900	<50	--	
7/10/2007	<60,000	<4,000	3,900	<100	<100	890	<100	<100	
1/15/2008	<600	<40	150	<1.0	<1.0	42	<1.0	<1.0	
7/15/2008	<300	20	270	<0.50	<0.50	66	<0.50	<0.50	
10/21/2008	<3,000	<100	160	<5.0	<5.0	37	<5.0	<5.0	
1/6/2009	<3,000	<100	97	<5.0	<5.0	23	<5.0	<5.0	
4/21/2009	<300	26	22	<0.50	<0.50	3.0	<0.50	<0.50	
7/21/2009	**<300**	**<10**	**93**	**<0.50**	**<0.50**	**28**	**<0.50**	**<0.50**	
AW-7									
AW-8									
03/16/2005	<100	<20	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	a
MW-1									
7/7/2003	<1,000	<200	24	<5.0	<5.0	<5.0	--	--	
02/05/2004	<1,000	<200	9.2	<5.0	<5.0	<5.0	<5.0	<5.0	
07/01/2004	<10,000	<2,000	<50	<50	<50	<50	<50	<50	
03/16/2005	<1,000	<200	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	
07/22/2005	<2,000	<400	<10	<10	<10	<10	<10	<10	
01/25/2006	<1,500	<100	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	
7/6/2006	<1,500	<100	<2.5	<2.5	<2.5	<2.5	<2.5	<2.5	
1/8/2007	<300	<20	2.1	<0.50	<0.50	<0.50	<0.50	--	
7/10/2007	<300	<20	2.4	<0.50	<0.50	<0.50	<0.50	<0.50	
1/15/2008	<300	<20	1.2	<0.50	<0.50	<0.50	<0.50	<0.50	
7/15/2008	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
10/21/2008	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	

Table 2. Summary of Fuel Additives Analytical Data

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	Concentrations in (µg/L)								Comments
	Ethanol	TBA	MTBE	DIPE	ETBE	TAME	1,2-DCA	EDB	
MW-1 Cont.									
1/6/2009	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
4/21/2009	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
7/21/2009	**<300**	**<10**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	
MW-2									
03/16/2005	<100	<20	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
MW-3									
7/7/2003	<100	<20	8.8	<0.50	<0.50	0.65	--	--	
02/05/2004	<100	<20	4.6	<0.50	<0.50	<0.50	<0.50	<0.50	
07/01/2004	<100	<20	3.3	<0.50	<0.50	<0.50	<0.50	<0.50	
03/16/2005	<100	<20	4.4	<0.50	<0.50	<0.50	<0.50	<0.50	
07/22/2005	<100	<20	4.1	<0.50	<0.50	<0.50	<0.50	<0.50	
01/25/2006	<300	<20	3.0	<0.50	<0.50	<0.50	<0.50	<0.50	
7/6/2006	<300	<50	3.0	<0.50	<0.50	<0.50	<0.50	<0.50	
1/8/2007	<300	<20	3.2	<0.50	<0.50	<0.50	<0.50	--	
7/10/2007	<300	<20	2.8	<0.50	<0.50	<0.50	<0.50	<0.50	
1/15/2008	<300	<20	0.88	<0.50	<0.50	<0.50	<0.50	<0.50	
7/15/2008	<300	<10	1.3	<0.50	<0.50	<0.50	<0.50	<0.50	
10/21/2008	<300	<10	0.94	<0.50	<0.50	<0.50	<0.50	<0.50	
1/6/2009	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
4/21/2009	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
7/21/2009	**<300**	**<10**	**0.60**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	
RW-1									
7/7/2003	<50,000	<10,000	<250	<250	<250	<250	--	--	
07/01/2004	<10,000	<2,000	72	<50	<50	<50	<50	<50	
03/16/2005	<2,000	<400	53	<10	<10	<10	<10	<10	
07/22/2005	<500	<100	51	<2.5	<2.5	5.6	<2.5	<2.5	
01/25/2006	<3,000	<200	34	<5.0	<5.0	<5.0	<5.0	<5.0	
7/6/2006	<6,000	<400	64	<10	<10	<10	<10	<10	
1/8/2007	<6000	<400	22	<10	<10	<10	<10	--	
7/10/2007	<600	<40	21	<1.0	<1.0	<1.0	<1.0	<1.0	

Table 2. Summary of Fuel Additives Analytical Data

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	Concentrations in (µg/L)								Comments
	Ethanol	TBA	MTBE	DIPE	ETBE	TAME	1,2-DCA	EDB	
RW-1 Cont.									
1/15/2008	<600	<40	14	<1.0	<1.0	1.3	<1.0	<1.0	
7/15/2008	<300	<10	12	<0.50	<0.50	1.0	<0.50	<0.50	
10/21/2008	<300	17	12	<0.50	<0.50	<0.50	<0.50	<0.50	
1/6/2009	<300	14	7.0	<0.50	<0.50	0.63	<0.50	<0.50	
4/21/2009	<300	47	6.0	<0.50	<0.50	0.58	<0.50	<0.50	b
7/21/2009	**<300**	**15**	**7.0**	**<0.50**	**<0.50**	**0.67**	**<0.50**	**<0.50**	
VEW-4									
07/22/2005	<100	<20	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
1/15/2008	<300	<20	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
7/15/2008	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
4/21/2009	<300	<10	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	
7/21/2009	**<300**	**<10**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	
VEW-5									
VEW-8									
07/22/2005	<100	<20	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	

ABBREVIATIONS & SYMBOLS:
-- = Not analyzed/applicable/measured/available
< = Not detected at or above specified laboratory reporting limit
1,2-DCA = 1,2-Dichloroethane
DIPE = Di-isopropyl ether
EDB = 1,2-Dibromoethane
ETBE = Ethyl tert-butyl ether
MTBE = Methyl tert-butyl ether
TAME = tert-Amyl methyl ether
TBA = tert-Butyl alcohol
µg/L = Micrograms per Liter

FOOTNOTES:
a = Calibration verification for ethanol is within method limits but outside contractual limits.
b = Sample taken from VOA vial with air bubble > 6mm diameter.

NOTES:
All volatile organic compounds analyzed using EPA Method 8260B.

Note: The data within this table collected prior to April 2006 was provided to Broadbent & Associates, Inc. by Atlantic Richfield Company and their previous consultants. Broadbent & Associates, Inc. has not verified the accuracy of this information.

Table 3. Historical Ground-Water Flow Direction and Gradient

Station #11133, 2220 98th Ave., Oakland, CA

Date Sampled	Approximate Flow Direction	Approximate Hydraulic Gradient
1/25/2006	Variable: East to Southwest	0.03 to 0.09
7/6/2006	Variable: East to W towards Center	0.04 to 0.05
1/8/2007	Variable: East to W towards Center	0.03 to 0.05
7/10/2007	West	0.01
1/15/2008	West-Southwest	0.006
7/15/2008	West-Southwest	0.01
10/21/2008	West-Southwest	0.01
1/6/2009	West	0.009
4/21/2009	West	0.01
7/21/2009	**West**	**0.01**

Note: The data within this table collected prior to April 2006 was provided to Broadbent & Associates, Inc. by Atlantic Richfield Company and their previous consultants. Broadbent & Associates, Inc. has not verified the accuracy of this information.

Table 4. Bio-Degradation Parameters

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	pH	ORP (mV)	Total Alkalinity (µg/L)	DO (mg/L)	Nitrate NO3 (µg/L)	Sulfate SO4 (µg/L)	Soluble Sulfide (µg/L)	CO2 (µg/L)	Methane (µg/L)	Manganese (µg/L)	Ferrous Iron (mg/L)	Comments
AW-1												
3/16/2005	6.7	-10	420,000	0.8	<500	580	<1,000	81,400	3,290	6,500	3.4	
1/15/2008	6.91	-58	410,000	0.92	<500	1,900	<1,000	190,000	3,200	6,400	3.2	a, b
7/15/2008	6.79	-96.5	488,000	6.0	<100	<1,000	<1,000	400,000	2,090	7,200	6.0	
10/21/2008	7.01	-130.1	498,000	2.40	<100	2,500	<50	178,000	381	8,080	2.0	b, c
1/6/2009	6.09	-128	446,000	1.39	<100	1,400	<50	190,000	593	7,810	3.0	
4/21/2009	7.28	-126.7	456,000	2.29	<100	1,800	<50	189,000	1,650	7,070	3.6	
7/21/2009	**7.23**	**-137.6**	**480,000**	**17.46**	**<100**	**1,800**	**<50**	**278,000**	**1,920**	**7,640**	**2.9**	**a, e**
AW-2												
1/15/2008	6.79	-88	190,000	0.83	4,400	21,000	<1,000	52,000	210	1,100	<0.5	a
7/15/2008	7.05	-190.1	168,000	2.14	440	38,000	<50	100,000	7.42	1,570	0.5	
10/21/2008	7.33	-47.2	176,000	1.65	890	36,000	<50	24,200	111	1,130	0.5	c, d
1/6/2009	6.94	129	168,000	0.84	390	22,000	<50	28,100	50.4	996	0.6	
4/21/2009	7.42	53.3	162,000	1.89	860	22,000	<50	37,600	209	1,240	0.39	
7/21/2009	**7.32**	**97.3**	**144,000**	**9.29**	**160**	**29,000**	**<50**	**38,200**	**174**	**630**	**0.1**	**a, e**
AW-4												
3/16/2005	6.5	10	310,000	0.6	<500	71,000	<1,000	54,200	585	5,600	1.4	
1/15/2008	6.75	-91	390,000	1.30	<500	82,000	<1,000	120,000	610	5,000	1.5	a, b
7/15/2008	6.91	-90.0	598,000	2.64	<100	47,000	<50	354,000	777	7,110	6.0	
10/21/2008	7.25	-123.3	510,000	1.54	<100	61,000	<50	101,000	75.3	8,440	3.0	c, d
1/6/2009	6.31	-29	400,000	0.70	<100	78,000	<50	76,400	148	6,330	0.5	
4/21/2009	7.48	-102.9	328,000	3.51	<100	83,000	<50	77,500	330	4,880	3.4	
7/21/2009	**7.04**	**-159.9**	**414,000**	**6.14**	**<100**	**68,000**	**<50**	**75,300**	**638**	**7,340**	**2.5**	**a, e**
AW-5												
1/15/2008	6.82	-101	230,000	0.90	<500	12,000	<1,000	79,000	120	2,300	1.4	a
7/15/2008	6.85	-97.9	238,000	2.13	<100	12,000	<50	161,000	9.29	2,560	0.5	
10/21/2008	7.10	-84.9	216,000	1.01	<100	14,000	<50	57,800	59.8	1,680	0.5	c, d
1/6/2009	6.22	-79	224,000	0.70	<100	13,000	<50	52,400	106	2,920	0.5	
4/21/2009	7.35	-43.8	216,000	2.09	<100	10,000	<50	57,700	142	2,710	1.5	
7/21/2009	**7.14**	**-139.1**	**226,000**	**6.50**	**<100**	**9,300**	**<50**	**63,700**	**91.3**	**2,430**	**1.1**	**a, e**

Table 4. Bio-Degradation Parameters

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	pH	ORP (mV)	Total Alkalinity (µg/L)	DO (mg/L)	Nitrate NO3 (µg/L)	Sulfate SO4 (µg/L)	Soluble Sulfide (µg/L)	CO2 (µg/L)	Methane (µg/L)	Manganese (µg/L)	Ferrous Iron (mg/L)	Comments
AW-6												
1/15/2008	6.80	-94	150,000	0.58	<500	21,000	<1,000	41,000	50	1,200	<0.1	a
7/15/2008	6.87	-40.8	160,000	2.12	<100	23,000	<50	163,000	1.27	1,370	0.0	
10/21/2008	7.19	-33.9	152,000	1.01	<100	20,000	<50	39,400	104	1,290	0.5	c, d
1/6/2009	6.23	-25	156,000	0.94	<100	21,000	<50	37,500	69.1	1,360	0.5	
4/21/2009	7.38	35.0	166,000	4.29	<100	17,000	<50	46,600	1.12	167	<0.1	
7/21/2009	**7.09**	**-39.9**	**168,000**	**10.79**	**<100**	**16,000**	**<50**	**39,100**	**127**	**2,050**	**<0.1**	**a, e**
MW-1												
3/16/2005	6.9	-175	310,000	0.9	<500	13,000	<1,000	49,900	4,550	7,700	2.7	
1/15/2008	7.13	-150	320,000	0.94	<500	51,000	<1,000	67,000	2,900	8,100	1.3	a
7/15/2008	7.06	-174.7	326,000	1.20	<100	50,000	<50	29,200	1,090	8,390	0.5	
10/21/2008	7.30	-200.0	360,000	1.99	<100	27,000	<50	18,700	303	8,050	4.0	c
1/6/2009	6.90	225	368,000	0.69	<100	59,000	<50	21,300	277	10,100	1.6	
4/21/2009	7.54	-196.9	326,000	1.99	<100	90,000	<50	59,300	839	8,540	1.7	
7/21/2009	**7.43**	**-208.3**	**320,000**	**6.20**	**<100**	**120,000**	**<50**	**67,200**	**1,120**	**9,250**	**0.46**	**a, e**
MW-2												
3/16/2005	7.1	30	85,000	1.3	5,300	38,000	<1,000	7,370	<1.0	2,200	0.7	
MW-3												
1/15/2008	7.10	-128	130,000	1.04	2,500	44,000	<1,000	29,000	<1.0	120	<0.1	a
7/15/2008	7.06	-47.6	112,000	1.60	820	78,000	<50	29,000	<1.0	61.8	0.5	
10/21/2008	7.28	-120.6	92,000	2.21	640	52,000	<50	15,400	<1.0	19.3	0.5	c
1/6/2009	6.43	-22	94,000	1.02	420	38,000	<50	14,000	<1.0	25.5	0.0	
4/21/2009	7.59	-119.9	108,000	2.26	360	44,000	<50	22,400	<1.0	46.9	<0.1	
7/21/2009	**7.43**	**-35.5**	**116,000**	**15.16**	**970**	**48,000**	**<50**	**20,900**	**<1.0**	**153**	**<0.1**	**a, e**
RW-1												
1/15/2008	6.82	-143	350,000	1.31	<500	5,000	<1,000	110,000	1,100	6,100	1.8	a
7/15/2008	6.95	-239.9	358,000	1.32	<100	21,000	<50	212,000	212	7,030	0.5	
10/21/2008	7.17	-188.4	352,000	0.79	<100	10,000	<50	73,500	1,350	6,840	1.0	b, c
1/6/2009	6.43	-279	322,000	0.30	<100	13,000	<50	64,700	279	6,410	1.0	

Table 4. Bio-Degradation Parameters

Station #11133, 2220 98th Ave., Oakland, CA

Well and Sample Date	pH	ORP (mV)	Total Alkalinity (µg/L)	DO (mg/L)	Nitrate NO3 (µg/L)	Sulfate SO4 (µg/L)	Soluble Sulfide (µg/L)	CO2 (µg/L)	Methane (µg/L)	Manganese (µg/L)	Ferrous Iron (mg/L)	Comments
RW-1 Cont.												
4/21/2009	7.38	-159.1	370,000	0.86	<100	5,200	100	77,400	1,270	6,790	0.67	
7/21/2009	**7.35**	**-252.5**	**356,000**	**13.21**	**<100**	**30,000**	**<50**	**62,800**	**479**	**7,380**	**0.13**	**a, e**
VEW-4												
1/15/2008	6.99	-36	210,000	0.54	3,000	31,000	<1,000	50,000	840	880	<0.5	a
7/15/2008	6.95	-29	254,000	0.59	<100	22,000	<50	90,900	174	2,150	2.0	
4/21/2009	7.41	-110.1	254,000	1.99	<100	13,000	<50	44,700	365	2,800	0.2	
7/21/2009	**7.24**	**-40.3**	**254,000**	**8.99**	**<100**	**24,000**	**<50**	**41,100**	**2.07**	**891**	**<0.1**	**a, e**

ABBREVIATIONS AND SYMBOLS:

< = Not detected at or above specified laboratory reporting limit
ORP = Oxygen reduction potential
DO = Dissolved oxygen
CO2 = Carbon dioxide
mV = Millivolts
µg/L = Micrograms per liter
mg/L = Milligrams per liter

FOOTNOTES:

a = Sample received after holding time expired for soluble sulfide and ferrous iron analyses
b = Sample analyzed after holding time expired for nitrate analysis
c = Sample received after holding time expired for dissolved sulfide analysis
d = Sample received after holding time expired for nitrate analysis
e = DO value suspect

Note: The data within this table collected prior to April 2006 was provided to Broadbent & Associates, Inc. by Atlantic Richfield Company and their previous consultants. Broadbent & Associates, Inc. has not verified the accuracy of this information.

APPENDIX A

STRATUS GROUND-WATER SAMPLING DATA PACKAGE
(INCLUDES FIELD DATA SHEETS, LABORATORY REPORT, CHAIN-OF-CUSTODY DOCUMENTATION, NON-HAZARDOUS WASTE DATA FORM, AND FIELD PROCEDURES)

STRATUS
ENVIRONMENTAL, INC.

3330 Cameron Park Drive, Ste 550
Cameron Park, California 95682
(530) 676-6004 ~ Fax: (530) 676-6005

August 5, 2009

Mr. Rob Miller
Broadbent & Associates, Inc.
2000 Kirman Avenue
Reno, NV 89502

Re: Groundwater Sampling Data Package, BP Service Station No. 11133, located at 2220 98th Avenue, Oakland, California

General Information

Data Submittal Prepared / Reviewed by: Carol Huff / Jay Johnson
Phone Number: (530) 676-6000
On-Site Supplier Representative: Jerry Gonzales and Nick Armstrong

Sampling Date: July 21, 2009

Unusual Field Conditions: None noted.

Scope of Work Performed: Quarterly monitoring and sampling.

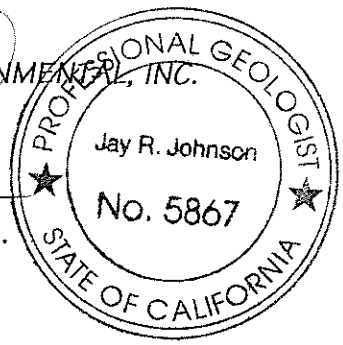
Variations from Work Scope: Well AW-7 could not be located to gauge during this event. A car was parked over well MW-8; therefore it could not be sampled.

This submittal presents the data collected in association with routine groundwater monitoring. The attachments include field data sheets, non-hazardous waste data form, chain of custody documentation, certified analytical results, and field procedures for groundwater sampling. The information is being provided to BP-ARCO's Scoping Supplier for use in preparing a report for regulatory submittal. This submittal is limited to presentation of collected data and does not include data interpretation or conclusions or recommendations.

Any questions concerning this submittal should be addressed to the Preparer/Reviewer identified above.

Sincerely,

STRATUS ENVIRONMENTAL, INC.



Jay R. Johnson, P.G.
Project Manager

Attachments:

- Field Data Sheets
- Non-Hazardous Waste Data Form
- Chain of Custody Documentation
- Certified Analytical Results
- Field Procedures for Groundwater Sampling

CC: Mr. Paul Supple, BP/ARCO

BP Alameda Portfolio

HYDROLOGIC DATA SHEET

AT= 10.00

Gauge Date: 7/21/09 **Project Name:** Oakland - 2220 98th Avenue

Field Technician: Jerry **Project Number:** 11133

TOC = Top of Well Casing Elevation
TOS = Depth to Top of Screen
DTW = Depth to Groundwater Below TOC
DTB = Depth to Bottom of Well Casing Below TOC

DIA = Well Casing Diameter
ELEV = Groundwater Elevation
DUP = Duplicate

WELL OR LOCATION	TIME	MEASUREMENT						PURGE & SAMPLE	SHEEN CONFIRMATION (w/bailer)	COMMENTS
		TOC	TOS	DTW	DTB	DIA	ELEV			
MW-1	1036			13.85	28.18	2"				
MW-2	1033			11.10	31.20	2"				
MW-3	1077			15.28	34.08	2"				
AW-1	11:12			18.72	30.40	2"				
AW-2	1030			18.07	34.77	2"				
AW-3	1033			17.22	35.50	2"				
AW-4	10:15			18.96	32.67	2"				
AW-5	11:16			19.70	42.90	2"				
AW-6	11:23			17.90	34.00	4"				
AW-7									→	Cannot locate well
AW-8										Car parked on well
AW-9	1020			20.00	26.90	2"				
RW-1	10:58			17.20	37.10	6"				
VW-1	1127			Dry	10.17	4"				
VW-2	1053			0.52	3.58	4"				
VW-3	1051			5.22	5.20	4"				
VEW-4	11:07			17.60	18.60	4"				
VEW 5	1120			Dry	16.29	4"				
VEW 6	10:40			14.90	19.21	4"				
VEW 7	1093			15.98	17.44	4"				
VEW 8	1101			Dry	16.89	4"				
VEW 9	11:35			Dry	6.21	4"				

FW = Nico Armstrong

pH/Conductivity/temperature Meter - YSI Model 63

DO Meter - YSI 55 Series (DO is always measured before purge)

Please refer to groundwater sampling field procedures

Calibration Date

pH 7/21/09

Conductivity 7/21/09

DO 7/21/09

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: MW-1
CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: MW-1
LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/21/09 | START (2400hr) 1300 | END (2400hr) 1308
DATE SAMPLED 7/21/09 | SAMPLE TIME (2400hr) 13:07
SAMPLE TYPE: Groundwater x | Surface Water ___ | Treatment Effluent ___ | Other ___

CASING DIAMETER: 2" X | 3" ___ | 4" ___ | 5" ___ | 6" ___ | 8" ___ | Other ___
Casing Volume: (gallons per foot) (0.17) | (0.38) | (0.67) | (1.02) | (1.50) | (2.60) | ( )

DEPTH TO BOTTOM (feet) = 28.18 | CASING VOLUME (gal) = 2.9
DEPTH TO WATER (feet) = 13.85 | CALCULATED PURGE (gal) = 9.3
WATER COLUMN HEIGHT (feet) = 14.3 | ACTUAL PURGE (gal) = MP. 3.0

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	ORP TURBIDITY (NTU)
7/21/09	1301	0.6	20.72	694	7.54	6.20	-208.3
"	1302	1.2	20.54	667	7.48	4.64	-213.2
"	1303	1.8	20.37	643	7.46	3.36	-222.2
"	1304	2.4	20.90	625	7.43	2.89	-221.2
"	1305	3.0					

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 13.91 | SAMPLE TURBIDITY: Clear
80% RECHARGE: X YES ___ NO | ANALYSES: 5 WO
ODOR: Yes | SAMPLE VESSEL / PRESERVATIVE: 12 containers

PURGING EQUIPMENT

___ Bladder Pump | ___ Bailer (Teflon)
___ Centrifugal Pump | ___ Bailer (PVC)
___ Submersible Pump | ___ Bailer (Stainless Steel)
___ Peristalic Pump | ___ Dedicated ___
Other: MP
Pump Depth: 25

SAMPLING EQUIPMENT

___ Bladder Pump | ___ Bailer (Teflon)
___ Centrifugal Pump | ___ Bailer (___ PVC or ___ disposable)
___ Submersible Pump | ___ Bailer (Stainless Steel)
___ Peristalic Pump | ___ Dedicated ___
Other: MP

WELL INTEGRITY: good | LOCK#: Metal
REMARKS: Ferrous Iron - 1.5

SIGNATURE: | Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: MW-3

CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: MW-3

LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/21/09 | START (2400hr) 1328 | END (2400hr) 1331

DATE SAMPLED 7/21/09 | SAMPLE TIME (2400hr) 1330

SAMPLE TYPE: Groundwater x | Surface Water ___ | Treatment Effluent ___ | Other ___

CASING DIAMETER: 2" x (0.17) | 3" ___ (0.38) | 4" ___ (0.67) | 5" ___ (1.02) | 6" ___ (1.50) | 8" ___ (2.60) | Other ___ ( )

Casing Volume: (gallons per foot)

DEPTH TO BOTTOM (feet) = 34.08 | CASING VOLUME (gal) = 31

DEPTH TO WATER (feet) = 15.28 | CALCULATED PURGE (gal) = 9.5

WATER COLUMN HEIGHT (feet) = 18.8 | ACTUAL PURGE (gal) = MP 3

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	orp TURBIDITY (NTU)
7/21/09	1323	0.6	19.26	292	7.60	1516	-35.5
/	1324	1.2	19.26	291	7.55	745	-37.7
/	1325	1.8	19.23	286	7.51	419	-37.2
	1326	2.4	19.26	280	7.48	3.46	-37.0
	1329	3.0	19.21	278	7.43	2.83	-34.6

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 15.32 | SAMPLE TURBIDITY: Clear

80% RECHARGE: X YES ___ NO | ANALYSES: SWD

ODOR: Yes | SAMPLE VESSEL / PRESERVATIVE: 12 containers

PURGING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristaltic Pump
___ Bailer (Teflon)
___ Bailer (PVC)
___ Bailer (Stainless Steel)
___ Dedicated ___

Other: MP

Pump Depth: ___

SAMPLING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristaltic Pump
___ Bailer (Teflon)
___ Bailer (___ PVC or ___ disposable)
___ Bailer (Stainless Steel)
___ Dedicated ___

Other: MP

WELL INTEGRITY: DO 0-0 | LOCK#: Master

REMARKS: Ferrous Iron

SIGNATURE: [signature] | Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: AW-1
CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: AW-1
LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/2/09 | START (2400hr) 1415 | END (2400hr) 1429
DATE SAMPLED 7/2/09 | SAMPLE TIME (2400hr) 1423
SAMPLE TYPE: Groundwater x | Surface Water ___ | Treatment Effluent ___ | Other ___

CASING DIAMETER: 2" X | 3" ___ | 4" ___ | 5" ___ | 6" ___ | 8" ___ | Other ___
Casing Volume: (gallons per foot) (0.17) | (0.38) | (0.67) | (1.02) | (1.50) | (2.60) | ( )

DEPTH TO BOTTOM (feet) = 30.40 | CASING VOLUME (gal) = 1.9
DEPTH TO WATER (feet) = 18.72 | CALCULATED PURGE (gal) = 5.9
WATER COLUMN HEIGHT (feet) = 11.6 | ACTUAL PURGE (gal) = NP 3.0

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	ORP TURBIDITY (NTU)
7/2/09	1416	0.6	20.52	709	7.38	12.46	-137.6
	1417	1.2	20.45	707	7.32	10.70	-149.9
	1418	1.8	20.51	718	7.22	6.61	-154.6
	1419	2.4	20.53	720	7.23	5.94	-159.6
	1420	3.0	20.52	720	7.23	5.68	-163.2

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 18.96 | SAMPLE TURBIDITY: clear

80% RECHARGE: X YES ___ NO | ANALYSES: 5W8
ODOR: Yes | SAMPLE VESSEL / PRESERVATIVE: 12 containers

PURGING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristalic Pump
___ Bailer (Teflon)
___ Bailer (PVC)
___ Bailer (Stainless Steel)
___ Dedicated ___
Other: NP
Pump Depth: —

SAMPLING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristalic Pump
___ Bailer (Teflon)
___ Bailer (___ PVC or ___ disposable)
___ Bailer (Stainless Steel)
___ Dedicated ___
Other: NP

WELL INTEGRITY: good | LOCK#: Master

REMARKS: Ferrous Iron 4.0

SIGNATURE: [signature] | Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: AW-2

CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: AW-2

LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/21/09 | START (2400hr) 12:30 | END (2400hr) 1239

DATE SAMPLED 7/21/09 | SAMPLE TIME (2400hr) 12:38

SAMPLE TYPE: Groundwater x | Surface Water | Treatment Effluent | Other

CASING DIAMETER: 2" X (0.17) | 3" (0.38) | 4" (0.67) | 5" (1.02) | 6" (1.50) | 8" (2.60) | Other ( )

Casing Volume: (gallons per foot)

DEPTH TO BOTTOM (feet) = 34.77 | CASING VOLUME (gal) = 2.8

DEPTH TO WATER (feet) = 18.07 | CALCULATED PURGE (gal) = 8.5

WATER COLUMN HEIGHT (feet) = 16.7 | ACTUAL PURGE (gal) = MIP 3.0

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	ORP TURBIDITY (NTU)
7/21/09	1231	0.6	18.79	225	7.54	9.28	97.3
	1232	1.2	19.09	226	7.50	9.07	96.5
	1233	1.8	19.09	227	7.46	4.76	92.0
	1234	2.4	19.05	230	7.43	3.75	87.4
	1235	3.0	19.07	229	7.32	2.98	48.9

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 18.10 | SAMPLE TURBIDITY: Clear

80% RECHARGE: X YES ___ NO | ANALYSES: 5 WO

ODOR: NO | SAMPLE VESSEL / PRESERVATIVE: 12 Con Tainers

PURGING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristalic Pump
___ Bailer (Teflon)
___ Bailer (PVC)
___ Bailer (Stainless Steel)
___ Dedicated

Other: MP

Pump Depth:

SAMPLING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristalic Pump
___ Bailer (Teflon)
___ Bailer (___ PVC or ___ disposable)
___ Bailer (Stainless Steel)
___ Dedicated

Other: MP

WELL INTEGRITY: Good | LOCK#: Missed

REMARKS:

Ferrous Iron - 0.5

SIGNATURE: | Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: AW-4

CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: AW-4

LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/21/09 | START (2400hr) 1150 | END (2400hr) 1158

DATE SAMPLED 7/21/09 | SAMPLE TIME (2400hr) 1157

SAMPLE TYPE: Groundwater x | Surface Water ___ | Treatment Effluent ___ | Other ___

CASING DIAMETER: 2" X (0.17) | 3" ___ (0.38) | 4" ___ (0.67) | 5" ___ (1.02) | 6" ___ (1.50) | 8" ___ (2.60) | Other ___ ( )

Casing Volume: (gallons per foot)

DEPTH TO BOTTOM (feet) = 32.67 | CASING VOLUME (gal) = 2.6

DEPTH TO WATER (feet) = 18.96 | CALCULATED PURGE (gal) = 7.8

WATER COLUMN HEIGHT (feet) = 13.7 | ACTUAL PURGE (gal) = 3.0 MP

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	orp TURBIDITY (NTU)
7/21/09	1151	0.6	18.97	739	7.15	61.4	-159.8
/	1152	1.2	18.94	735	7.14	55.0	-179.1
/	1153	1.8	18.94	720	7.07	59.4	-203.2
/	1154	2.4	18.94	716	7.02	4.37	-209.4
/	1155	3.0	18.96	768	7.04	4.12	208.4

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 19.04 | SAMPLE TURBIDITY: Clear

80% RECHARGE: X YES ___ NO | ANALYSES: SVO

ODOR: yes | SAMPLE VESSEL / PRESERVATIVE: 12 containers

PURGING EQUIPMENT

___ Bladder Pump | ___ Bailer (Teflon)
___ Centrifugal Pump | ___ Bailer (PVC)
___ Submersible Pump | ___ Bailer (Stainless Steel)
___ Peristalic Pump | ___ Dedicated ___

Other: MP

Pump Depth: —

SAMPLING EQUIPMENT

___ Bladder Pump | ___ Bailer (Teflon)
___ Centrifugal Pump | ___ Bailer (___ PVC or ___ disposable)
___ Submersible Pump | ___ Bailer (Stainless Steel)
___ Peristalic Pump | ___ Dedicated ___

Other: MP

WELL INTEGRITY: good | LOCK#: MG

REMARKS:

Ferrous Iron - 0.0

SIGNATURE: | Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: AW-5
CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: AW-5
LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 2/21/09 | START (2400hr) 14:37 | END (2400hr) 1448
DATE SAMPLED 2/21/09 | SAMPLE TIME (2400hr) 14:45
SAMPLE TYPE: Groundwater x | Surface Water ___ | Treatment Effluent ___ | Other ___

CASING DIAMETER: 2" ___ (0.17) | 3" ___ (0.38) | 4" X (0.67) | 5" ___ (1.02) | 6" ___ (1.50) | 8" ___ (2.60) | Other ___ ( )
Casing Volume: (gallons per foot)

DEPTH TO BOTTOM (feet) = 42.90 | CASING VOLUME (gal) = 16.2
DEPTH TO WATER (feet) = 19.70 | CALCULATED PURGE (gal) = 48.7
WATER COLUMN HEIGHT (feet) = 23.2 | ACTUAL PURGE (gal) = 6.0 MP

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	ORP TURBIDITY (NTU)
2/21/09	1438	1.2	19.90	366	7.29	650	-139.1
	1439	2.4	19.85	369	7.18	4.96	-152.3
	1440	3.6	19.84	369	7.17	4.10	-154.6
	1441	4.8	19.80	371	7.15	3.56	-161.7
	1442	6.0	19.76	371	7.14	3.41	-165.8

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 20.19 | SAMPLE TURBIDITY: Clear

80% RECHARGE: X YES ___ NO | ANALYSES: 5 W 8
ODOR: No | SAMPLE VESSEL / PRESERVATIVE: 12 Con Tainers

PURGING EQUIPMENT

___ Bladder Pump | ___ Bailer (Teflon)
___ Centrifugal Pump | ___ Bailer (PVC)
___ Submersible Pump | ___ Bailer (Stainless Steel)
___ Peristalic Pump | ___ Dedicated ___
Other: MP
Pump Depth: ___

SAMPLING EQUIPMENT

___ Bladder Pump | ___ Bailer (Teflon)
___ Centrifugal Pump | ___ Bailer (___ PVC or ___ disposable)
___ Submersible Pump | ___ Bailer (Stainless Steel)
___ Peristalic Pump | ___ Dedicated ___
Other: MP

WELL INTEGRITY: Good | LOCK#: Master
REMARKS: Ferrous Iron 1.5

SIGNATURE: [signature] | Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: AW-6
CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: AW-6
LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/21/09 | START (2400hr) 1500 | END (2400hr) 1509
DATE SAMPLED 7/21/09 | SAMPLE TIME (2400hr) 1508
SAMPLE TYPE: Groundwater x | Surface Water ___ | Treatment Effluent ___ | Other ___

CASING DIAMETER: 2" ___ (0.17) | 3" ___ (0.38) | 4" X (0.67) | 5" ___ (1.02) | 6" ___ (1.50) | 8" ___ (2.60) | Other ___ ( )
Casing Volume: (gallons per foot)

DEPTH TO BOTTOM (feet) = 39.00 | CASING VOLUME (gal) = 10.7
DEPTH TO WATER (feet) = 17.90 | CALCULATED PURGE (gal) = 32.3
WATER COLUMN HEIGHT (feet) = 16.1 | ACTUAL PURGE (gal) = 6.0

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	ORP TURBIDITY (NTU)
7/21/09	1501	1.2	20.16	304	7.17	10.79	-39.9
/	1502	2.4	20.15	304	7.14	7.61	-40.9
/	1503	3.6	20.18	303	7.11	5.10	-43.8
/	1504	4.8	20.18	303	7.11	4.15	-45.4
/	1505	6.0	20.15	302	7.08	3.51	-45.7

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 17.94 | SAMPLE TURBIDITY: Clear

80% RECHARGE: X YES ___ NO | ANALYSES: 5WD
ODOR: No | SAMPLE VESSEL / PRESERVATIVE: 12 Containers

PURGING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristalic Pump
___ Bailer (Teflon)
___ Bailer (PVC)
___ Bailer (Stainless Steel)
___ Dedicated ___
Other: MP
Pump Depth: MP

SAMPLING EQUIPMENT

___ Bladder Pump
___ Centrifugal Pump
___ Submersible Pump
___ Peristalic Pump
___ Bailer (Teflon)
___ Bailer (___ PVC or ___ disposable)
___ Bailer (Stainless Steel)
___ Dedicated ___
Other: MP

WELL INTEGRITY: Good | LOCK#: None

REMARKS: Ferrous Iron 0.0

SIGNATURE: _____ Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: RW-1

CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: RW-1

LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/21/09 | START (2400hr) 1350 | END (2400hr) 13:59

DATE SAMPLED 7/21/09 | SAMPLE TIME (2400hr) 1358

SAMPLE TYPE: Groundwater x | Surface Water ___ | Treatment Effluent ___ | Other ___

CASING DIAMETER: Casing Volume: (gallons per foot)

2"	3"	4"	5"	6"	8"	Other
(0.17)	(0.38)	(0.67)	(1.02)	X (1.50)	(2.60)	( )

DEPTH TO BOTTOM (feet) = 32.10 | CASING VOLUME (gal) = 29.8

DEPTH TO WATER (feet) = 12.20 | CALCULATED PURGE (gal) = 89.5

WATER COLUMN HEIGHT (feet) = 19.9 | ACTUAL PURGE (gal) = 5.0

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	D.O COLOR (visual)	ORP TURBIDITY (NTU)
7/21/09	1351	1.0	20.40	582	7.44	13.21	-252.5
/	1352	2.0	20.42	583	7.38	560	-258.7
/	1353	3.0	20.41	582	7.39	4.80	-258.1
	1354	4.0	20.38	582	7.36	4.90	-257.3
	1355	5.0	20.42	583	7.35	4.08	-254.8

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 12.49 | SAMPLE TURBIDITY: Clear

80% RECHARGE: X YES ___ NO | ANALYSES: S VO

ODOR: NO | SAMPLE VESSEL / PRESERVATIVE: D Containers

PURGING EQUIPMENT

___ Bladder Pump ___ Bailer (Teflon)
___ Centrifugal Pump ___ Bailer (PVC)
___ Submersible Pump ___ Bailer (Stainless Steel)
___ Peristalic Pump ___ Dedicated ___
Other: MP
Pump Depth: —

SAMPLING EQUIPMENT

___ Bladder Pump ___ Bailer (Teflon)
___ Centrifugal Pump ___ Bailer (___ PVC or ___ disposable)
___ Submersible Pump ___ Bailer (Stainless Steel)
___ Peristalic Pump ___ Dedicated ___
Other: MP

WELL INTEGRITY: | LOCK#: Master

REMARKS: Ferrous Iron 0.7

SIGNATURE: | Page ___ of ___

BP ALAMEDA PORTFOLIO

WATER SAMPLE FIELD DATA SHEET

PROJECT #: 11133 | PURGED BY: JS | WELL I.D.: VEW-4

CLIENT NAME: | SAMPLED BY: JS | SAMPLE I.D.: VEW-4

LOCATION: Oakland - 2220 98th Avenue | QA SAMPLES:

DATE PURGED 7/21/09 | START (2400hr) 15:20 | END (2400hr) 1529

DATE SAMPLED 7/21/09 | SAMPLE TIME (2400hr) 15:28

SAMPLE TYPE: Groundwater x | Surface Water | Treatment Effluent | Other

CASING DIAMETER: 2" | 3" | 4" X | 5" | 6" | 8" | Other

Casing Volume: (gallons per foot) (0.17) | (0.38) | (0.67) | (1.02) | (1.50) | (2.60) | ( )

DEPTH TO BOTTOM (feet) = 18.60 | CASING VOLUME (gal) =

DEPTH TO WATER (feet) = 12.60 | CALCULATED PURGE (gal) =

WATER COLUMN HEIGHT (feet) = | ACTUAL PURGE (gal) = MP 1.5

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (gal)	TEMP. (degrees C)	CONDUCTIVITY (umhos/cm)	pH (units)	DO COLOR (visual)	ORP TURBIDITY (NTU)
7/21/09	1521	0.3	19.95	431	7.28	~~8.25~~	-40.3
	1522	0.6	19.93	430	7.28	8.99	-39.1
	1523	0.9	19.93	432	7.26	7.20	-39.0
	1524	1.2	19.91	432	7.25	4.13	-36.7
	1525	1.5	19.91	434	7.24	7.09	-35.3

SAMPLE INFORMATION

SAMPLE DEPTH TO WATER: 12.97 | SAMPLE TURBIDITY: Clear

80% RECHARGE: ___ YES X NO | ANALYSES: 5 WO

ODOR: No | SAMPLE VESSEL / PRESERVATIVE: 12 containers

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
___ Bladder Pump	___ Bailer (Teflon)	___ Bladder Pump	___ Bailer (Teflon)
___ Centrifugal Pump	___ Bailer (PVC)	___ Centrifugal Pump	___ Bailer (___ PVC or ___ disposable)
___ Submersible Pump	___ Bailer (Stainless Steel)	___ Submersible Pump	___ Bailer (Stainless Steel)
___ Peristaltic Pump	___ Dedicated ___	___ Peristaltic Pump	___ Dedicated ___
Other: MP		Other: MP	
Pump Depth: ___			

WELL INTEGRITY: Good | LOCK#: Master

REMARKS: Ferrous / Rev 0.0

SIGNATURE: | Page ___ of ___

WELLHEAD OBSERVATION FORM

STRATUS ENVIRONMENTAL, INC.

Site Name/Number: 1133 *Date:* 7/21/09 *Technican:* Jerry

Well I.D.	Box in Good Condition? X = Yes Blank = No	Lock Missing? X = Yes (replaced) Blank = No	Water in Wellbox? X = Yes Blank = No	Water Level Relative to Cap? A = Above cap B = Below cap L = Level w/cap	Well Cap? I = Intact M = Missing or Compromised (replaced)	Bolts Missing? X = Yes Blank = No	Bolts Stripped? X = Yes Blank = No	Bolt Holes Stripped? X = Yes Blank = No	Cracked or Broken Lid? X = Yes Blank = No	Cracked or Broken Box? X = Yes Blank = No	Grout Level more than 1ft below TOC? X = Yes Blank = No	Additional Comments (such as missing lid, concrete needs replacement, or other - explain)
MW-1	X				I	NA	NA	NA				NO Bolt-type lid
MW-2	X				I	NA	NA	NA				↓
MW-3	X				I	NA	NA	NA				
AW-1	X				I							
AW-2	X				I							
AW-3	X				I	NA	NA	NA				
AW-4	X				I	NA	NA	NA				No Bolt Type Lid
AW-5	X				I							
AW-6	X				I							
AW-7												Cannot locate
AW-8												car parked over
AW-9	X				I							
RW-1	X				I							Large Lid
VW-1	X				I							↓
VW-2	X	X			I							
VW-3	X				I							

DRUM INVENTORY

Drums on site? (Yes) No (circle)

Type and # Steel: X Plastic: _____

Note whether drums are full or empty, solids or liquids:

1 Drum R Full

Drum label info (description, date, contact info):

SB-1,2,3 / 7/12/09 Stratus

Soil cuttings

GENERAL SITE CONDITIONS

Make notes on housekeeping conditions (such as trash around remediation system enclosure/compound, bent or missing bollards, signs missing from compound fences, graffiti on compound, etc.)

(updated 3-28-08, SS)

WELLHEAD OBSERVATION FORM

Site Name/Number: 11133 *Date:* 7/21/09 *Technican:* Jerry

Well I.D.	Box in Good Condition? X = Yes Blank = No	Lock Missing? X = Yes (replaced) Blank = No	Water in Wellbox? X = Yes Blank = No	Water Level Relative to Cap? A = Above cap B = Below cap L = Level w/cap	Well Cap? I = Intact M = Missing or Compromised (replaced)	Bolts Missing? X = Yes Blank = No	Bolts Stripped? X = Yes Blank = No	Bolt Holes Stripped? X = Yes Blank = No	Cracked or Broken Lid? X = Yes Blank = No	Cracked or Broken Box? X = Yes Blank = No	Grout Level more than 1ft below TOC? X = Yes Blank = No	Additional Comments (such as missing lid, concrete needs replacement, or other - explain)
VEW-4	X				I							Large Lid
VEW-5	X				I							
VEW-6	X				I							
VEW-7	X				I							
VEW-8	X				I							
VEW-9	X				I							

DRUM INVENTORY

Drums on site? Yes No (circle)

Type and # Steel: _____ Plastic: _____

Note whether drums are full or empty, solids or liquids:

_____

_____

Drum label info (description, date, contact info):

_____

_____

GENERAL SITE CONDITIONS

Make notes on housekeeping conditions (such as trash around remediation system enclosure/compound, bent or missing bollards, signs missing from compound fences, graffiti on compound, etc.)

_____

_____

_____

_____

_____

_____

(updated 3-28-08, SS)

NON-HAZARDOUS WASTE DATA FORM

1. BESI #

GENERATOR

2. Generator's Name and Mailing Address	Generator's Site Address (if different than mailing address)
BP WEST COAST PRODUCTS, LLC P.O. BOX [illegible] RANCHO SANTA MARGARITA, CA [illegible]	BP [illegible] [illegible]
Generator's Phone: (949) [illegible]	24-HOUR EMERGENCY PHONE: (949) [illegible]

3. Transporter 1 Company Name	Phone #
Stratus Environmental, Inc.	[illegible]

4. Transporter 2 Company Name	Phone #
Dames Excavating	(707) 374-2361

5. Designated Facility Name and Site Address	Phone #
INTRAT, INC. 1105 AIRPORT RD #C RIO VISTA, CA 94571	[illegible]

6. Waste Shipping Name and Description	7. Containers No.	7. Containers Type	8. Total Quantity	9. Unit Wt/Vol	10. Profile No.
A. NON-HAZARDOUS WATER	1	[illegible]	[illegible]	G	
B.					
C.					
D.					

11. Special Handling Instructions and Additional Information

WEAR ALL APPROPRIATE PROTECTIVE CLOTHING

WELL PURGING / DECON WATER

12. GENERATOR'S CERTIFICATION: I certify the materials described above on this data form are non-hazardous.

Generator's/Offeror's Printed/Typed Name	Signature	Month	Day	Year
[illegible]		[illegible]	[illegible]	[illegible]

TRANSPORTER

13. Transporter Acknowledgment of Receipt of Materials

Transporter 1 Printed/Typed Name	Signature	Month	Day	Year

Transporter 2 Printed/Typed Name	Signature	Month	Day	Year

FACILITY

14. Designated Facility Owner or Operator: Certification of receipt of materials covered by this data form.

Printed/Typed Name	Signature	Month	Day	Year

GENERATOR

Atlantic Richfield Company
A BP affiliated company

Laboratory Management Program LaMP Chain of Custody Record

BP/ARC Project Name: BP 11133
BP/ARC Facility No: 11133
Req Due Date (mm/dd/yy): 14 Day TAT
Rush TAT: Yes ____ No X
Lab Work Order Number:

Lab Name: CalScience	BP/ARC Facility Address: 2220 98th Ave	Consultant/Contractor: Stratus Environmental Inc.
Lab Address: 7440 Lincoln Way, Garden Grove, CA 92841	City, State, ZIP Code: Oakland, CA	Consultant/Contractor Project No:
Lab PM: Richard Villafania	Lead Regulatory Agency: Alameda	Address: 3330 Cameron Park Drive, #550, Cameron Park, CA 95682
Lab Phone: 714-895-5494 Fax: 714-895-7501	California Global ID No.: T0600100210	Consultant/Contractor PM: Jay Johnson
Lab Shipping Accnt:	Enfos Proposal No: 000MY-0005	Phone: 530-676-6000 Fax: 530-676-6005
Lab Bottle Order No:	Accounting Mode: Provision X OOC-BU ____ OOC-RM ____	Email EDD To: chuff@stratusinc.com
Other Info:	Stage: Operate Activity: Monitor	Invoice To: BP/ARC X Contractor ____

BP/ARC EBM: Paul Supple
EBM Phone: (925) 275-3801 FAX (925) 275-3815
EBM Email: paul.supple@bp.com

Lab No.	Sample Description	Date	Time	Matrix: Soil / Solid	Matrix: Water / Liquid	Matrix: Air / Vapor	Matrix:	No. Containers / Preservative: Total Number of Containers	Unpreserved	H_2SO_4	HNO_3	HCl	Methanol	Various	GRO by 8015M	BTEX/5 FO* by 8260B	Ethanol by 8260B	EDB by 8260B	1,2-DCA by 8260B	NO2, SO4 by EPA300	Ferrous Iron and Manganese EPA 200.7	Dissolved Sulfide EPA 376.2	Methane and CO2, RS Kerr 175	Alkalinity EPA 310.1	Report Type & QC Level
	MW-1	7/21/09	1307		X			12						X	X	X	X	X	X	X	X	X	X	X	
	MW-3		1330		X										X	X	X	X	X	X	X	X	X	X	
	AW-1		1423		X										X	X	X	X	X	X	X	X	X	X	
	AW-2		1238		X										X	X	X	X	X	X	X	X	X	X	
	AW-4		1157		X										X	X	X	X	X	X	X	X	X	X	
	AW-5		1447		X										X	X	X	X	X	X	X	X	X	X	
	AW-6		1508		X										X	X	X	X	X	X	X	X	X	X	
	RW-1		1358		X										X	X	X	X	X	X	X	X	X	X	
	~~VW-1~~				~~X~~										~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	JG 7/21
	VEW-4		1528		X										X	X	X	X	X	X	X	X	X	X	

Comments: *Oxy = MTBE, TAME, ETBE, DIPE, TBA

Report Type & QC Level: Standard X; Full Data Package ____

Note: If sample not collected, indicate "No Sample" in comments and single-strike out and initial any preprinted sample description.

Sampler's Name: Jerry Gonzales / Doulos Env.	Relinquished By / Affiliation	Date	Time
Sampler's Company: Stratus Environmental Inc.			
Shipment Method: Ship Date:			
Shipment Tracking No:			

Accepted By / Affiliation	Date	Time

Special Instructions: TB Sample ON HOLD! Cc results to rmiller@broadbentinc.com Please Analyze Even if after Hold Time!

THIS LINE - LAB USE ONLY: Custody Seals In Place: Yes / No | Temp Blank: Yes / No | Cooler Temp on Receipt: ____ °F/C | Trip Blank: Yes / No | MS/MSD Sample Submitted: Yes / No

Atlantic Richfield Company
A BP affiliated company

Laboratory Management Program LaMP Chain of Custody Record

BP/ARC Project Name: BP 11133
BP/ARC Facility No: 11133
Req Due Date (mm/dd/yy): 14 Day TAT
Rush TAT: Yes ___ No X
Lab Work Order Number:

Lab Name: CalScience	BP/ARC Facility Address: 2220 98th Ave	Consultant/Contractor: Stratus Environmental Inc.
Lab Address: 7440 Lincoln Way, Garden Grove, CA 92841	City, State, ZIP Code: Oakland, CA	Consultant/Contractor Project No:
Lab PM: Richard Villafania	Lead Regulatory Agency: Alameda	Address: 3330 Cameron Park Drive, #550, Cameron Park, CA 95682
Lab Phone: 714-895-5494 Fax: 714-895-7501	California Global ID No.: T0600100210	Consultant/Contractor PM: Jay Johnson
Lab Shipping Accnt:	Enfos Proposal No: 000MY-0005	Phone: 530-676-6000 Fax: 530-676-6005
Lab Bottle Order No:	Accounting Mode: Provision X OOC-BU ___ OOC-RM ___	Email EDD To: chuff@stratusinc.com
Other Info:	Stage: Operate Activity: Monitor	Invoice To: BP/ARC X Contractor ___
BP/ARC EBM: Paul Supple		
EBM Phone: (925) 275-3601 FAX (925) 275-3815		
EBM Email: paul.supple@bp.com		

Lab No.	Sample Description	Date	Time	Matrix: Soil / Solid	Matrix: Water / Liquid	Matrix: Air / Vapor	Matrix:	No. Containers / Preservative: Total Number of Containers	Unpreserved	H_2SO_4	HNO_3	HCl	Methanol		Requested Analyses: GRO by 8015M	BTEX/5 FO* by 8260B	Ethanol by 8260B	EDB by 8260B	1,2-DCA by 8260B	NO_2, SO_4 by EPA300	Ferrous Iron and Manganese EPA 200.7	Dissolved Sulfide EPA 376.2	Methane and CO_2, RS Kerr 175	Alkalinity EPA 310.1	Report Type & QC Level
	TB-11133 07212009	7/21/09	500		X			2	2			X													ON HOLD

Standard X
Full Data Package ___

Note: If sample not collected, indicate "No Sample" in comments and single-strike out and initial any preprinted sample description.

Comments

*Oxy = MTBE, TAME, ETBE, DIPE, TBA

Sampler's Name: Jerry Gonzales / Doulos Env.	Relinquished By / Affiliation	Date	Time	Accepted By / Affiliation	Date	Time
Sampler's Company: Stratus Environmental Inc.						
Shipment Method: Ship Date:						
Shipment Tracking No:						

Special Instructions: TB Sample ON HOLD! Cc results to rmiller@broadbentinc.com Please Analyze even if after Hold time!

THIS LINE - LAB USE ONLY: Custody Seals In Place: Yes / No | Temp Blank: Yes / No | Cooler Temp on Receipt: ___ °F/C | Trip Blank: Yes / No | MS/MSD Sample Submitted: Yes / No

Calscience
Environmental
Laboratories, Inc.

August 05, 2009

Jay Johnson
Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Subject: **Calscience Work Order No.:** **09-07-1876**
Client Reference: **BP 11133**

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 7/23/2009 and analyzed in accordance with the attached chain-of-custody.

Unless otherwise noted, all analytical testing was accomplished in accordance with the guidelines established in our Quality Systems Manual, applicable standard operating procedures, and other related documentation. The original report of subcontracted analysis, if any, is provided herein, and follows the standard Calscience data package. The results in this analytical report are limited to the samples tested and any reproduction thereof must be made in its entirety.

If you have any questions regarding this report, please do not hesitate to contact the undersigned.

Sincerely,

Calscience Environmental
Laboratories, Inc.
Richard Villafania
Project Manager

09-07-1876 CASE NARRATIVE

For the Dissolved Sulfide and Ferrous Iron analyses, all samples were received past the required holding times for these tests. Per instructions on the chain of custody to analyze the samples with expired holding times, the tests were performed.

Stratus Environmental confirmed that the Nitrite (NO2) test was erroneously entered on the chain of custody, the required analysis is Nitrate (NO3).

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.	Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No:	09-07-1876
Cameron Park, CA 95682-8861	Preparation:	N/A
	Method:	RSK-175M

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-1	09-07-1876-1-K	07/21/09 13:07	Aqueous	GC 14	N/A	07/24/09 00:00	090724L01

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	67200	17.0	10		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-3	09-07-1876-2-K	07/21/09 13:30	Aqueous	GC 14	N/A	07/24/09 00:00	090724L01

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	20900	17.0	10		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-1	09-07-1876-3-K	07/21/09 14:23	Aqueous	GC 14	N/A	07/24/09 00:00	090724L01

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	278000	170	100		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-2	09-07-1876-4-K	07/21/09 12:38	Aqueous	GC 14	N/A	07/24/09 00:00	090724L01

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	38200	17.0	10		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-4	09-07-1876-5-K	07/21/09 11:57	Aqueous	GC 14	N/A	07/24/09 00:00	090724L01

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	75300	17.0	10		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-5	09-07-1876-6-K	07/21/09 14:47	Aqueous	GC 14	N/A	07/24/09 00:00	090724L01

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	63700	17.0	10		ug/L

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	N/A
		Method:	RSK-175M

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-6	**09-07-1876-7-K**	**07/21/09 15:08**	**Aqueous**	**GC 14**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	39100	17.0	10		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
RW-1	**09-07-1876-8-K**	**07/21/09 13:58**	**Aqueous**	**GC 14**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	62800	17.0	10		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VEW-4	**09-07-1876-9-K**	**07/21/09 15:28**	**Aqueous**	**GC 14**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	41100	17.0	10		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	**099-12-659-67**	**N/A**	**Aqueous**	**GC 14**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Carbon Dioxide	ND	1.70	1		ug/L

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.	Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No:	09-07-1876
Cameron Park, CA 95682-8861	Preparation:	N/A
	Method:	RSK-175M

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-1	**09-07-1876-1-G**	**07/21/09 13:07**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	1120	8.00	8		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-3	**09-07-1876-2-G**	**07/21/09 13:30**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	ND	1.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-1	**09-07-1876-3-G**	**07/21/09 14:23**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	1920	8.00	8		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-2	**09-07-1876-4-G**	**07/21/09 12:38**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	174	1.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-4	**09-07-1876-5-G**	**07/21/09 11:57**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	638	8.00	8		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-5	**09-07-1876-6-G**	**07/21/09 14:47**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	91.3	1.00	1		ug/L

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.	Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No:	09-07-1876
Cameron Park, CA 95682-8861	Preparation:	N/A
	Method:	RSK-175M

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-6	**09-07-1876-7-G**	**07/21/09 15:08**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	127	1.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
RW-1	**09-07-1876-8-G**	**07/21/09 13:58**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	479	8.00	8		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VEW-4	**09-07-1876-9-G**	**07/21/09 15:28**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	2.07	1.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	**099-12-663-671**	**N/A**	**Aqueous**	**GC 33**	**N/A**	**07/24/09 00:00**	**090724L01**

Parameter	Result	RL	DF	Qual	Units
Methane	ND	1.00	1		ug/L

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	N/A
		Method:	EPA 200.7

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-1	**09-07-1876-1-I**	**07/21/09 13:07**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:04**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	9250	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-3	**09-07-1876-2-I**	**07/21/09 13:30**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:09**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	153	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-1	**09-07-1876-3-I**	**07/21/09 14:23**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:13**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	7640	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-2	**09-07-1876-4-I**	**07/21/09 12:38**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:14**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	630	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-4	**09-07-1876-5-I**	**07/21/09 11:57**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:15**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	7340	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-5	**09-07-1876-6-I**	**07/21/09 14:47**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:16**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	2430	5.00	1		ug/L

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	N/A
		Method:	EPA 200.7

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-6	**09-07-1876-7-I**	**07/21/09 15:08**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:18**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	2050	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
RW-1	**09-07-1876-8-I**	**07/21/09 13:58**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:19**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	7380	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VEW-4	**09-07-1876-9-I**	**07/21/09 15:28**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 14:20**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	891	5.00	1		ug/L

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	**097-01-012-3,893**	**N/A**	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09 13:59**	**090723LA7**

Parameter	Result	RL	DF	Qual	Units
Manganese	ND	5.00	1		ug/L

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.	Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No:	09-07-1876
Cameron Park, CA 95682-8861	Preparation:	EPA 5030B
	Method:	EPA 8015B (M)

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-1	**09-07-1876-1-E**	**07/21/09 13:07**	**Aqueous**	**GC 4**	**07/25/09**	**07/25/09 21:04**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	2900	250	5		ug/L
Surrogates:	**REC (%)**	**Control Limits**		**Qual**	
1,4-Bromofluorobenzene	80	38-134			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-3	**09-07-1876-2-E**	**07/21/09 13:30**	**Aqueous**	**GC 4**	**07/25/09**	**07/25/09 22:10**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	ND	50	1		ug/L
Surrogates:	**REC (%)**	**Control Limits**		**Qual**	
1,4-Bromofluorobenzene	77	38-134			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-1	**09-07-1876-3-E**	**07/21/09 14:23**	**Aqueous**	**GC 4**	**07/25/09**	**07/25/09 22:43**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	5900	500	10		ug/L
Surrogates:	**REC (%)**	**Control Limits**		**Qual**	
1,4-Bromofluorobenzene	81	38-134			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-2	**09-07-1876-4-E**	**07/21/09 12:38**	**Aqueous**	**GC 4**	**07/25/09**	**07/25/09 23:16**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	3200	500	10		ug/L
Surrogates:	**REC (%)**	**Control Limits**		**Qual**	
1,4-Bromofluorobenzene	80	38-134			

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.	Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No:	09-07-1876
Cameron Park, CA 95682-8861	Preparation:	EPA 5030B
	Method:	EPA 8015B (M)

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-4	**09-07-1876-5-E**	**07/21/09 11:57**	**Aqueous**	**GC 4**	**07/25/09**	**07/25/09 23:49**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	200	50	1		ug/L
Surrogates:	REC (%)	Control Limits		Qual	
1,4-Bromofluorobenzene	81	38-134			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-5	**09-07-1876-6-E**	**07/21/09 14:47**	**Aqueous**	**GC 4**	**07/25/09**	**07/26/09 00:22**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	83	50	1		ug/L
Surrogates:	REC (%)	Control Limits		Qual	
1,4-Bromofluorobenzene	82	38-134			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-6	**09-07-1876-7-E**	**07/21/09 15:08**	**Aqueous**	**GC 4**	**07/25/09**	**07/26/09 00:55**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	76	50	1		ug/L
Surrogates:	REC (%)	Control Limits		Qual	
1,4-Bromofluorobenzene	82	38-134			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
RW-1	**09-07-1876-8-E**	**07/21/09 13:58**	**Aqueous**	**GC 4**	**07/25/09**	**07/26/09 01:28**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	870	50	1		ug/L
Surrogates:	REC (%)	Control Limits		Qual	
1,4-Bromofluorobenzene	86	38-134			

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.	Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No:	09-07-1876
Cameron Park, CA 95682-8861	Preparation:	EPA 5030B
	Method:	EPA 8015B (M)

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VEW-4	**09-07-1876-9-E**	**07/21/09 15:28**	**Aqueous**	**GC 4**	**07/25/09**	**07/26/09 02:01**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	ND	50	1		ug/L
Surrogates:	**REC (%)**	**Control Limits**		**Qual**	
1,4-Bromofluorobenzene	83	38-134			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	**099-12-695-615**	**N/A**	**Aqueous**	**GC 4**	**07/25/09**	**07/25/09 12:50**	**090725B01**

Parameter	Result	RL	DF	Qual	Units
Gasoline Range Organics (C6-C12)	ND	50	1		ug/L
Surrogates:	**REC (%)**	**Control Limits**		**Qual**	
1,4-Bromofluorobenzene	91	38-134			

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: 07/23/09
Work Order No: 09-07-1876
Preparation: EPA 5030B
Method: EPA 8260B
Units: ug/L

Project: BP 11133

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-1	**09-07-1876-1-A**	**07/21/09 13:07**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 17:15**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	ND	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	ND	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	4.6	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.50	1	
Xylenes (total)	1.2	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	96	80-128			Dibromofluoromethane	103	80-127		
Toluene-d8	100	80-120			1,4-Bromofluorobenzene	105	68-120		

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
MW-3	**09-07-1876-2-A**	**07/21/09 13:30**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 17:44**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	0.60	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	ND	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	ND	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.50	1	
Xylenes (total)	ND	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	103	80-128			Dibromofluoromethane	112	80-127		
Toluene-d8	99	80-120			1,4-Bromofluorobenzene	92	68-120		

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-1	**09-07-1876-3-A**	**07/21/09 14:23**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 18:13**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	560	10	20		Methyl-t-Butyl Ether (MTBE)	170	10	20	
1,2-Dibromoethane	ND	10	20		Tert-Butyl Alcohol (TBA)	ND	200	20	
1,2-Dichloroethane	ND	10	20		Diisopropyl Ether (DIPE)	ND	10	20	
Ethylbenzene	92	10	20		Ethyl-t-Butyl Ether (ETBE)	ND	10	20	
Toluene	ND	10	20		Tert-Amyl-Methyl Ether (TAME)	30	10	20	
Xylenes (total)	10	10	20		Ethanol	ND	6000	20	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	96	80-128			Dibromofluoromethane	104	80-127		
Toluene-d8	99	80-120			1,4-Bromofluorobenzene	99	68-120		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	ug/L
Project: BP 11133			Page 2 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-2	**09-07-1876-4-A**	**07/21/09 12:38**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 18:41**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	550	10	20		Methyl-t-Butyl Ether (MTBE)	13	10	20	
1,2-Dibromoethane	ND	10	20		Tert-Butyl Alcohol (TBA)	ND	200	20	
1,2-Dichloroethane	ND	10	20		Diisopropyl Ether (DIPE)	ND	10	20	
Ethylbenzene	98	10	20		Ethyl-t-Butyl Ether (ETBE)	ND	10	20	
Toluene	150	10	20		Tert-Amyl-Methyl Ether (TAME)	ND	10	20	
Xylenes (total)	220	10	20		Ethanol	ND	6000	20	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	98	80-128			Dibromofluoromethane	105	80-127		
Toluene-d8	99	80-120			1,4-Bromofluorobenzene	96	68-120		

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-4	**09-07-1876-5-A**	**07/21/09 11:57**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 19:10**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	4.8	0.50	1		Methyl-t-Butyl Ether (MTBE)	8.6	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	ND	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	6.9	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	0.89	0.50	1	
Xylenes (total)	2.8	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	101	80-128			Dibromofluoromethane	104	80-127		
Toluene-d8	100	80-120			1,4-Bromofluorobenzene	98	68-120		

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-5	**09-07-1876-6-A**	**07/21/09 14:47**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 19:39**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	25	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	110	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	ND	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	5.2	0.50	1	
Xylenes (total)	ND	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	103	80-128			Dibromofluoromethane	110	80-127		
Toluene-d8	100	80-120			1,4-Bromofluorobenzene	91	68-120		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	ug/L
Project: BP 11133			Page 3 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
AW-6	**09-07-1876-7-A**	**07/21/09 15:08**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 20:08**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	93	2.5	5	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	ND	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	ND	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	28	0.50	1	
Xylenes (total)	ND	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	103	80-128			Dibromofluoromethane	107	80-127		
Toluene-d8	99	80-120			1,4-Bromofluorobenzene	96	68-120		

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
RW-1	**09-07-1876-8-A**	**07/21/09 13:58**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 20:37**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	7.0	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	15	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	ND	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	0.67	0.50	1	
Xylenes (total)	0.57	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	103	80-128			Dibromofluoromethane	111	80-127		
Toluene-d8	100	80-120			1,4-Bromofluorobenzene	102	68-120		

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VEW-4	**09-07-1876-9-A**	**07/21/09 15:28**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 21:05**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	ND	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	ND	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	ND	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.50	1	
Xylenes (total)	ND	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	100	80-128			Dibromofluoromethane	114	80-127		
Toluene-d8	100	80-120			1,4-Bromofluorobenzene	93	68-120		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	ug/L
Project: BP 11133			Page 4 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	**099-12-703-1,006**	**N/A**	**Aqueous**	**GC/MS Z**	**07/31/09**	**07/31/09 11:58**	**090731L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	ND	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	ND	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	ND	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.50	1	
Xylenes (total)	ND	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	105	80-128			Dibromofluoromethane	104	80-127		
Toluene-d8	100	80-120			1,4-Bromofluorobenzene	92	68-120		

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	**099-12-703-1,009**	**N/A**	**Aqueous**	**GC/MS BB**	**08/01/09**	**08/01/09 15:47**	**090801L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.50	1		Methyl-t-Butyl Ether (MTBE)	ND	0.50	1	
1,2-Dibromoethane	ND	0.50	1		Tert-Butyl Alcohol (TBA)	ND	10	1	
1,2-Dichloroethane	ND	0.50	1		Diisopropyl Ether (DIPE)	ND	0.50	1	
Ethylbenzene	ND	0.50	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.50	1	
Toluene	ND	0.50	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.50	1	
Xylenes (total)	ND	0.50	1		Ethanol	ND	300	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,2-Dichloroethane-d4	107	80-128			Dibromofluoromethane	104	80-127		
Toluene-d8	98	80-120			1,4-Bromofluorobenzene	94	68-120		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: 07/23/09
Work Order No: 09-07-1876

Project: BP 11133

Client Sample Number	Lab Sample Number	Date Collected	Matrix
MW-1	**09-07-1876-1**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	120000	2000	2		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	320000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	460	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

MW-3	**09-07-1876-2**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	970	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	48000	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	116000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	ND	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

AW-1	**09-07-1876-3**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	1800	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	480000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	2900	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: 07/23/09
Work Order No: 09-07-1876

Project: BP 11133

Client Sample Number	Lab Sample Number	Date Collected	Matrix
AW-2	**09-07-1876-4**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	160	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	29000	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	144000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	100	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

Client Sample Number	Lab Sample Number	Date Collected	Matrix
AW-4	**09-07-1876-5**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	68000	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	414000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	2500	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

Client Sample Number	Lab Sample Number	Date Collected	Matrix
AW-5	**09-07-1876-6**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	9300	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	226000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	1100	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: 07/23/09
Work Order No: 09-07-1876

Project: BP 11133

Client Sample Number	Lab Sample Number	Date Collected	Matrix
AW-6	**09-07-1876-7**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	16000	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	168000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	ND	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

RW-1	**09-07-1876-8**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	30000	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	356000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	130	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

VEW-4	**09-07-1876-9**	**07/21/09**	**Aqueous**

Comment(s): (*) BV Sample received after holding time expired

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	24000	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	254000	100	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II) (*)	ND	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved (*)	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: 07/23/09
Work Order No: 09-07-1876

Project: BP 11133

Client Sample Number	Lab Sample Number	Date Collected	Matrix
Method Blank		**N/A**	**Aqueous**

Parameter	Result	RL	DF	Qual	Units	Date Prepared	Date Analyzed	Method
Nitrite (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Nitrate (as N)	ND	100	1		ug/L	N/A	07/23/09	EPA 300.0
Sulfate	ND	1000	1		ug/L	N/A	07/23/09	EPA 300.0
Alkalinity, Total (as CaCO3)	ND	1.0	1		ug/L	N/A	07/30/09	SM 2320B
Iron (II)	ND	100	1		ug/L	07/23/09	07/23/09	SM 3500-FeB
Sulfide, Dissolved	ND	50	1		ug/L	07/23/09	07/23/09	SM 4500 S2 - D

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Quality Control - Duplicate

Stratus Environmental, inc.	Date Received: 07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No: 09-07-1876
Cameron Park, CA 95682-8861	Preparation: N/A
	Method: RSK-175M

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared:	Date Analyzed:	Duplicate Batch Number
AW-5	**Aqueous**	**GC 14**	**N/A**	**07/24/09**	**090724D01**

Parameter	Sample Conc	DUP Conc	RPD	RPD CL	Qualifiers
Carbon Dioxide	63700	74000	15	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Duplicate

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	N/A
		Method:	RSK-175M

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared:	Date Analyzed:	Duplicate Batch Number
AW-6	**Aqueous**	**GC 33**	**N/A**	**07/24/09**	**090724D01**

Parameter	Sample Conc	DUP Conc	RPD	RPD CL	Qualifiers
Methane	127	122	4	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	N/A
		Method:	EPA 200.7

Project BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
MW-3	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09**	**090723SA7**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Manganese	99	96	80-120	2	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - PDS / PDSD

Stratus Environmental, inc.		Date Received	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	N/A
		Method:	EPA 200.7

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	PDS/PDSD Batch Number
MW-3	**Aqueous**	**ICP 5300**	**07/23/09**	**07/28/09**	**090723SA7**

Parameter	PDS %REC	PDSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Manganese	97	98	75-125	1	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	EPA 5030B
		Method:	EPA 8015B (M)

Project BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-07-1737-5	Aqueous	GC 4	07/25/09	07/25/09	090725S01

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Gasoline Range Organics (C6-C12)	101	98	38-134	4	0-25	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Stratus Environmental, inc.	Date Received: 07/23/09
3330 Cameron Park Drive, Suite 550	Work Order No: 09-07-1876
Cameron Park, CA 95682-8861	Preparation: EPA 5030B
	Method: EPA 8260B

Project BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-07-1653-1	Aqueous	GC/MS Z	07/31/09	07/31/09	090731S01

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	102	101	76-124	1	0-20	
Carbon Tetrachloride	98	98	74-134	0	0-20	
Chlorobenzene	97	97	80-120	0	0-20	
1,2-Dibromoethane	104	102	80-120	2	0-20	
1,2-Dichlorobenzene	99	99	80-120	0	0-20	
1,1-Dichloroethene	79	78	73-127	1	0-20	
Ethylbenzene	101	101	78-126	0	0-20	
Toluene	101	102	80-120	1	0-20	
Trichloroethene	99	96	77-120	3	0-20	
Vinyl Chloride	76	73	72-126	5	0-20	
Methyl-t-Butyl Ether (MTBE)	96	101	67-121	2	0-49	
Tert-Butyl Alcohol (TBA)	90	104	36-162	5	0-30	
Diisopropyl Ether (DIPE)	103	108	60-138	3	0-45	
Ethyl-t-Butyl Ether (ETBE)	103	108	69-123	5	0-30	
Tert-Amyl-Methyl Ether (TAME)	98	104	65-120	5	0-20	
Ethanol	96	109	30-180	13	0-72	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Stratus Environmental, inc.		Date Received:	07/23/09
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	EPA 5030B
		Method:	EPA 8260B

Project BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-07-1990-8	**Aqueous**	**GC/MS BB**	**08/01/09**	**08/01/09**	**090801S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	104	104	76-124	0	0-20	
Carbon Tetrachloride	95	95	74-134	1	0-20	
Chlorobenzene	100	101	80-120	1	0-20	
1,2-Dibromoethane	96	96	80-120	0	0-20	
1,2-Dichlorobenzene	100	101	80-120	0	0-20	
1,1-Dichloroethene	87	89	73-127	2	0-20	
Ethylbenzene	93	92	78-126	0	0-20	
Toluene	103	102	80-120	0	0-20	
Trichloroethene	101	99	77-120	2	0-20	
Vinyl Chloride	91	97	72-126	6	0-20	
Methyl-t-Butyl Ether (MTBE)	81	81	67-121	1	0-49	
Tert-Butyl Alcohol (TBA)	100	103	36-162	3	0-30	
Diisopropyl Ether (DIPE)	105	103	60-138	2	0-45	
Ethyl-t-Butyl Ether (ETBE)	97	99	69-123	2	0-30	
Tert-Amyl-Methyl Ether (TAME)	90	90	65-120	0	0-20	
Ethanol	96	90	30-180	7	0-72	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: N/A
Work Order No: 09-07-1876

Project: BP 11133

Matrix: Aqueous

Parameter	Method	Quality Control Sample ID	Date Analyzed	Date Extracted	MS% REC	MSD % REC	%REC CL	RPD	RPD CL	Qualifiers
Nitrite (as N)	EPA 300.0	VEW-4	07/23/09	N/A	91	91	80-120	0	0-20	
Nitrate (as N)	EPA 300.0	VEW-4	07/23/09	N/A	105	105	80-120	0	0-20	
Sulfate	EPA 300.0	VEW-4	07/23/09	N/A	102	101	80-120	0	0-20	
Iron (II)	SM 3500-FeB	MW-1	07/23/09	7/23/09	99	96	70-130	2	0-25	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Duplicate

Stratus Environmental, inc.	Date Received:	N/A
3330 Cameron Park Drive, Suite 550	Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		

Project: BP 11133

Matrix: Aqueous

Parameter	Method	QC Sample ID	Date Analyzed	Sample Conc	DUP Conc	RPD	RPD CL	Qualifiers
Alkalinity, Total (as CaCO3)	SM 2320B	MW-1	07/30/09	320000	322000	1	0-25	
Sulfide, Dissolved	SM 4500 S2 - D	MW-1	07/23/09	ND	ND	NA	0-25	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Stratus Environmental, inc.	Date Received: N/A
3330 Cameron Park Drive, Suite 550	Work Order No: 09-07-1876
Cameron Park, CA 95682-8861	Preparation: N/A
	Method: RSK-175M

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-659-67	Aqueous	GC 14	N/A	07/24/09	090724L01

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Carbon Dioxide	93	94	80-120	0	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Stratus Environmental, inc.	Date Received: N/A
3330 Cameron Park Drive, Suite 550	Work Order No: 09-07-1876
Cameron Park, CA 95682-8861	Preparation: N/A
	Method: RSK-175M

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-663-671	Aqueous	GC 33	N/A	07/24/09	090724L01

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Methane	96	96	79-109	0	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Stratus Environmental, inc.		Date Received:	N/A
3330 Cameron Park Drive, Suite 550		Work Order No:	09-07-1876
Cameron Park, CA 95682-8861		Preparation:	N/A
		Method:	EPA 200.7

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
097-01-012-3,893	Aqueous	ICP 5300	07/23/09	07/28/09	090723LA7

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Manganese	100	100	85-115	1	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: N/A
Work Order No: 09-07-1876
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-695-615	Aqueous	GC 4	07/25/09	07/25/09	090725B01

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Gasoline Range Organics (C6-C12)	99	99	78-120	0	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Stratus Environmental, inc.	Date Received: N/A
3330 Cameron Park Drive, Suite 550	Work Order No: 09-07-1876
Cameron Park, CA 95682-8861	Preparation: EPA 5030B
	Method: EPA 8260B

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-703-1,006	Aqueous	GC/MS Z	07/31/09	07/31/09	090731L01

Parameter	LCS %REC	LCSD %REC	%REC CL	ME_CL	RPD	RPD CL	Qualifiers
Benzene	100	100	80-120	73-127	0	0-20	
Carbon Tetrachloride	99	97	74-134	64-144	2	0-20	
Chlorobenzene	100	97	80-120	73-127	2	0-20	
1,2-Dibromoethane	104	104	79-121	72-128	0	0-20	
1,2-Dichlorobenzene	98	100	80-120	73-127	2	0-20	
1,1-Dichloroethene	99	89	78-126	70-134	10	0-28	
Ethylbenzene	102	100	80-120	73-127	2	0-20	
Toluene	101	99	80-120	73-127	2	0-20	
Trichloroethene	102	101	79-127	71-135	1	0-20	
Vinyl Chloride	105	88	72-132	62-142	18	0-20	
Methyl-t-Butyl Ether (MTBE)	104	88	69-123	60-132	16	0-20	
Tert-Butyl Alcohol (TBA)	94	96	63-123	53-133	1	0-20	
Diisopropyl Ether (DIPE)	100	107	59-137	46-150	6	0-37	
Ethyl-t-Butyl Ether (ETBE)	103	106	69-123	60-132	3	0-20	
Tert-Amyl-Methyl Ether (TAME)	103	103	70-120	62-128	0	0-20	
Ethanol	121	98	28-160	6-182	21	0-57	

Total number of LCS compounds : 16
Total number of ME compounds : 0
Total number of ME compounds allowed : 1
LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Stratus Environmental, inc.	Date Received: N/A
3330 Cameron Park Drive, Suite 550	Work Order No: 09-07-1876
Cameron Park, CA 95682-8861	Preparation: EPA 5030B
	Method: EPA 8260B

Project: BP 11133

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-703-1,009	Aqueous	GC/MS BB	08/01/09	08/01/09	090801L01

Parameter	LCS %REC	LCSD %REC	%REC CL	ME_CL	RPD	RPD CL	Qualifiers
Benzene	107	101	80-120	73-127	6	0-20	
Carbon Tetrachloride	102	97	74-134	64-144	5	0-20	
Chlorobenzene	103	98	80-120	73-127	5	0-20	
1,2-Dibromoethane	99	99	79-121	72-128	0	0-20	
1,2-Dichlorobenzene	105	102	80-120	73-127	3	0-20	
1,1-Dichloroethene	92	90	78-126	70-134	2	0-28	
Ethylbenzene	97	92	80-120	73-127	6	0-20	
Toluene	105	100	80-120	73-127	5	0-20	
Trichloroethene	104	103	79-127	71-135	1	0-20	
Vinyl Chloride	106	97	72-132	62-142	8	0-20	
Methyl-t-Butyl Ether (MTBE)	84	83	69-123	60-132	1	0-20	
Tert-Butyl Alcohol (TBA)	91	98	63-123	53-133	7	0-20	
Diisopropyl Ether (DIPE)	105	99	59-137	46-150	6	0-37	
Ethyl-t-Butyl Ether (ETBE)	103	100	69-123	60-132	3	0-20	
Tert-Amyl-Methyl Ether (TAME)	94	90	70-120	62-128	5	0-20	
Ethanol	72	75	28-160	6-182	4	0-57	

Total number of LCS compounds : 16
Total number of ME compounds : 0
Total number of ME compounds allowed : 1
LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: N/A
Work Order No: 09-07-1876

Project: BP 11133

Matrix: Aqueous

Parameter	Method	Quality Control Sample ID	Date Extracted	Date Analyzed	LCS % REC	LCSD % REC	%REC CL	RPD	RPD CL	Qual
Nitrite (as N)	EPA 300.0	099-12-906-358	N/A	07/23/09	98	97	90-110	1	0-15	
Nitrate (as N)	EPA 300.0	099-12-906-358	N/A	07/23/09	104	104	90-110	0	0-15	
Sulfate	EPA 300.0	099-12-906-358	N/A	07/23/09	102	102	90-110	0	0-15	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Laboratory Control Sample

Stratus Environmental, inc.
3330 Cameron Park Drive, Suite 550
Cameron Park, CA 95682-8861

Date Received: N/A
Work Order No: 09-07-1876

Project: BP 11133

Matrix : Aqueous

Parameter	Method	Quality Control Sample ID	Date Analyzed	Date Extracted	Conc Added	Conc Recovered	LCS %Rec	%Rec CL	Qualifiers
Iron (II)	SM 3500-FeB	099-05-111-3,430	07/23/09	07/23/09	1.00	0.980	98	80-120	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Glossary of Terms and Qualifiers

Work Order Number: 09-07-1876

Qualifier	Definition
AX	Sample too dilute to quantify surrogate.
BA	Relative percent difference out of control.
BA,AY	BA = Relative percent difference out of control. AY = Matrix interference suspected.
BB	Sample > 4x spike concentration.
BF	Reporting limits raised due to high hydrocarbon background.
BH	Reporting limits raised due to high level of non-target analytes.
BU	Sample analyzed after holding time expired.
BV	Sample received after holding time expired.
BY	Sample received at improper temperature.
BZ	Sample preserved improperly.
CL	Initial analysis within holding time but required dilution.
CQ	Analyte concentration greater than 10 times the blank concentration.
CU	Surrogate concentration diluted to not detectable during analysis.
DF	Reporting limits elevated due to matrix interferences.
DU	Insufficient sample quantity for matrix spike/dup matrix spike.
ET	Sample was extracted past end of recommended max. holding time.
EY	Result exceeds normal dynamic range; reported as a min est.
GR	Internal standard recovery is outside method recovery limit.
IB	CCV recovery abovelimit; analyte not detected.
IH	Calibrtn. verif. recov. below method CL for this analyte.
IJ	Calibrtn. verif. recov. above method CL for this analyte.
J,DX	J=EPA Flag -Estimated value; DX= Value < lowest standard (MQL), but > than MDL.
LA	Confirmatory analysis was past holding time.
LG,AY	LG= Surrogate recovery below the acceptance limit. AY= Matrix interference suspected.
LH,AY	LH= Surrogate recovery above the acceptance limit. AY= Matrix interference suspected.
LM,AY	LM= MS and/or MSD above acceptance limits. See Blank Spike (LCS). AY= Matrix interference suspected.
LN,AY	LN= MS and/or MSD below acceptance limits. See Blank Spike (LCS). AY= Matrix interference suspected.
LQ	LCS recovery above method control limits.

Work Order Number: 09-07-1876

Qualifier	Definition
LR	LCS recovery below method control limits.
LW	Quantitation of unknown hydrocarbon(s) in sample based on gasoline.
LX	Quantitation of unknown hydrocarbon(s) in sample based on diesel.
MB	Analyte present in the method blank.
PC	Sample taken from VOA vial with air bubble > 6mm diameter.
PI	Primary and confirm results varied by > than 40% RPD.
RB	RPD exceeded method control limit; % recoveries within limits.
SG	A silica gel cleanup procedure was performed.
	Solid - Unless otherwise indicated, solid sample data is reported on a wet weight basis, not corrected for % moisture.

Atlantic Richfield Company
A BP affiliated company

Laboratory Management Program LaMP Chain of Custody Record

1876

BP/ARC Project Name: BP 11133
BP/ARC Facility No: 11133
Req Due Date (mm/dd/yy): 14 Day TAT
Rush TAT: Yes ___ No
Lab Work Order Number:

Lab Name: CalScience	BP/ARC Facility Address: 2220 98th Ave	Consultant/Contractor: Stratus Environmental Inc.
Lab Address: 7440 Lincoln Way, Garden Grove, CA 92841	City, State, ZIP Code: Oakland, CA	Consultant/Contractor Project No:
Lab PM: Richard Villafania	Lead Regulatory Agency: Alameda	Address: 3330 Cameron Park Drive, #550, Cameron Park, CA 95682
Lab Phone: 714-895-5494 Fax: 714-895-7501	California Global ID No.: T0600100210	Consultant/Contractor PM: Jay Johnson
Lab Shipping Accnt:	Enfos Proposal No: 000MY-0005	Phone: 530-676-6000 Fax: 530-676-6005
Lab Bottle Order No:	Accounting Mode: Provision X OOC-BU ___ OOC-RM ___	Email EDD To: chuff@stratusinc.com
Other Info:	Stage: Operate Activity: Monitor	Invoice To: BP/ARC X Contractor ___
BP/ARC EBM: Paul Supple		
EBM Phone: (925) 275-3801 FAX (925) 275-3815		
EBM Email: paul.supple@bp.com		

Lab No.	Sample Description	Date	Time	Matrix: Soil / Solid	Matrix: Water / Liquid	Matrix: Air / Vapor	No. Containers / Preservative: Total Number of Containers	Unpreserved	H_2SO_4	HNO_3	HCl	Methanol	Various	GRO by 8015M	BTEX/5 FO* by 8260B	Ethanol by 8260B	EDB by 8260B	1,2-DCA by 8260B	NO2, SO4 by EPA300	Ferrous Iron and Manganese EPA 200.7	Dissolved Sulfide EPA 376.2	Methane and CO2, RS Kerr 175	Alkalinity EPA 310.1
1	MW-1	7/21/09	1307		X		12						X	X	X	X	X	X	X	X	X	X	X
2	MW-3	"	1330		X		"						"	X	X	X	X	X	X	X	X	X	X
3	AW-1	"	1423		X		"						"	X	X	X	X	X	X	X	X	X	X
4	AW-2	"	1238		X		"						"	X	X	X	X	X	X	X	X	X	X
5	AW-4	"	1157		X		"						"	X	X	X	X	X	X	X	X	X	X
6	AW-5	"	1447		X		"						"	X	X	X	X	X	X	X	X	X	X
7	AW-6	"	1508		X		"						"	X	X	X	X	X	X	X	X	X	X
8	RW-1	"	1358		X		"						"	X	X	X	X	X	X	X	X	X	X
9	~~VW-1~~				X									~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~	~~X~~
9	VEW-4	"	1528		X		"						"	X	X	X	X	X	X	X	X	X	X

Report Type & QC Level: Standard X; Full Data Package ___

Note: If sample not collected, indicate "No Sample" in comments and single-strike out and initial any preprinted sample description.

Comments: *Oxy = MTBE, TAME, ETBE, DIPE, TBA

JG 7/21

Sampler's Name: Jerry Gonzales / Doulos Env.	Relinquished By / Affiliation	Date	Time	Accepted By / Affiliation	Date	Time
Sampler's Company: Stratus Environmental Inc.						
Shipment Method: GSO Ship Date:				Wdeaton QA	7/23/09	1000
Shipment Tracking No:						

Special Instructions: TB Sample ON HOLD! Cc results to rmiller@broadbentinc.com Please Analyze Even if after Hold time!

THIS 106193622 106193617

Temp Blank: Yes / No | Cooler Temp on Receipt: ___ °F/C | Trip Blank: Yes / No | MS/MSD Sample Submitted: Yes / No

Atlantic Richfield Company
A BP affiliated company

Laboratory Management Program LaMP Chain of Custody Record

1876

BP/ARC Project Name: BP 11133
BP/ARC Facility No: 11133
Req Due Date (mm/dd/yy): 14 Day TAT
Rush TAT: Yes ___ No X
Lab Work Order Number:

Lab Name: CalScience	BP/ARC Facility Address: 2220 98th Ave	Consultant/Contractor: Stratus Environmental Inc.
Lab Address: 7440 Lincoln Way, Garden Grove, CA 92841	City, State, ZIP Code: Oakland, CA	Consultant/Contractor Project No:
Lab PM: Richard Villafania	Lead Regulatory Agency: Alameda	Address: 3330 Cameron Park Drive, #550, Cameron Park, CA 95682
Lab Phone: 714-895-5494 Fax: 714-895-7501	California Global ID No.: T0600100210	Consultant/Contractor PM: Jay Johnson
Lab Shipping Accnt:	Enfos Proposal No: 000MY-0005	Phone: 530-676-6000 Fax: 530-676-6005
Lab Bottle Order No:	Accounting Mode: Provision X OOC-BU ___ OOC-RM ___	Email EDD To: chuff@stratusinc.com
Other Info:	Stage: Operate Activity: Monitor	Invoice To: BP/ARC X Contractor ___
BP/ARC EBM: Paul Supple		
EBM Phone: (925) 275-3801 FAX (925) 275-3815		
EBM Email: paul.supple@bp.com		

Lab No.	Sample Description	Date	Time	Matrix: Soil / Solid	Matrix: Water / Liquid	Matrix: Air / Vapor	No. Containers / Preservative: Total Number of Containers	Unpreserved	H_2SO_4	HNO_3	HCl	Methanol	GRO by 8015M	BTEX/5 FO* by 8260B	Ethanol by 8260B	EDB by 8260B	1,2-DCA by 8260B	NO_2, SO_4 by EPA300	Ferrous Iron and Manganese EPA 200.7	Dissolved Sulfide EPA 376.2	Methane and CO_2, RS Kerr 175	Alkalinity EPA 310.1
10	TB-11133 - 07212009	7/21/09	500		X		2	2			X											

Requested Analyses

Report Type & QC Level
Standard X
Full Data Package ___

Note: If sample not collected, indicate "No Sample" in comments and single-strike out and initial any preprinted sample description.

Comments
*Oxy = MTBE, TAME, ETBE, DIPE, TBA

ON HOLD

Sampler's Name: Jerry Gonzales / Doulos Env.	Relinquished By / Affiliation	Date	Time	Accepted By / Affiliation	Date	Time
Sampler's Company: Stratus Environmental Inc.						
Shipment Method: COC Ship Date:				Wabatu CEL	7/23/09	10a
Shipment Tracking No:						

Special Instructions: TB Sample ON HOLD! Cc results to rmiller@broadbentinc.com Please Analyze even if after Hold time!

THIS LINE - LAB USE ONLY: Custody Seals In Place: Yes / No | Temp Blank: Yes / No | Cooler Temp on Receipt: ___ °F/C | Trip Blank: Yes / No | MS/MSD Sample Submitted: Yes / No

Calscience Environmental Laboratories, Inc.

WORK ORDER #: 09-07-1676

SAMPLE RECEIPT FORM

Cooler 1 of 2

CLIENT: STRATUS ENV'L.

DATE: 7 / 23 / 09

TEMPERATURE: (Criteria: 0.0 °C – 6.0 °C, not frozen)

Temperature 2.6 °C - 0.2 °C (CF) = 2.4 °C ☑ Blank ☐ Sample

☐ Sample(s) outside temperature criteria (PM/APM contacted by: _____).

☐ Sample(s) outside temperature criteria but received on ice/chilled on same day of sampling.

☐ **Received at ambient temperature, placed on ice for transport by Courier.**

Ambient Temperature: ☐ Air ☐ Filter ☐ Metals Only ☐ PCBs Only Initial: WB

CUSTODY SEALS INTACT:

☑ Cooler ☐ _____ ☐ No (Not Intact) ☐ Not Present ☐ N/A Initial: WB

☐ Sample ☐ _____ ☐ No (Not Intact) ☑ Not Present Initial: TN

SAMPLE CONDITION:	Yes	No	N/A
Chain-Of-Custody (COC) document(s) received with samples	☑	☐	☐
COC document(s) received complete	☑	☐	☐
☐ Collection date/time, matrix, and/or # of containers logged in based on sample labels.			
☐ COC not relinquished. ☐ No date relinquished. ☐ No time relinquished.			
Sampler's name indicated on COC	☑	☐	☐
Sample container label(s) consistent with COC	☑	☐	☐
Sample container(s) intact and good condition	☑	☐	☐
Correct containers and volume for analyses requested	☑	☐	☐
Analyses received within holding time	☑ WB 7/23/09	☑	☐
Proper preservation noted on COC or sample container	☑	☐	☐
☐ Unpreserved vials received for Volatiles analysis			
Volatile analysis container(s) free of headspace	☑	☐	☐
Tedlar bag(s) free of condensation	☐	☐	☑

CONTAINER TYPE:

Solid: ☐4ozCGJ ☐8ozCGJ ☐16ozCGJ ☐Sleeve ☐EnCores® ☐TerraCores® ☐_____

Water: ☑VOA ☑VOAh ☐VOAna_2 ☐125AGB ☐125AGBh ☐125AGBp ☐1AGB ☐1AGBna_2 ☐1AGBs ☐500AGB ☐500AGJ ☐500AGJs ☐250AGB ☐250CGB ☐250CGBs ☑1PB ☐500PB ☐500PBna ☐250PB ☑250PBn ☐125PB ☐125PBznna ☐100PJ ☐100PJna_2 ☐_____ ☐_____ ☐_____

Air: ☐Tedlar® ☐Summa® ☐_____ **Other:** ☐_____ Checked/Labeled by: TN

Container: C: Clear A: Amber P: Plastic G: Glass J: Jar B: Bottle Z: Ziploc/Resealable Bag E: Envelop Reviewed by: WB

Preservative: h: HCL n: HNO3 na_2:$Na_2S_2O_3$ Na: NaOH p: H_3PO_4 s: H_2SO_4 znna: $ZnAc_2$+NaOH f: Field-filtered Scanned by: WB

Calscience Environmental Laboratories, Inc.

WORK ORDER #: 09-07-1 8 7 6

SAMPLE RECEIPT FORM

Cooler 2 of 2

CLIENT: STRATUS ENV'L.

DATE: 7 / 23 / 09

TEMPERATURE: (Criteria: 0.0 °C – 6.0 °C, not frozen)

Temperature 2.7 °C - 0.2 °C (CF) = 2.5 °C ☑ Blank ☐ Sample

☐ Sample(s) outside temperature criteria (PM/APM contacted by: _____).

☐ Sample(s) outside temperature criteria but received on ice/chilled on same day of sampling.

☐ **Received at ambient temperature, placed on ice for transport by Courier.**

Ambient Temperature: ☐ Air ☐ Filter ☐ Metals Only ☐ PCBs Only **Initial:** WB

CUSTODY SEALS INTACT:

☑ Cooler ☐_____ ☐ No (Not Intact) ☐ Not Present ☐ N/A **Initial:** WB

☐ Sample ☐_____ ☐ No (Not Intact) ☑ Not Present **Initial:** TN

SAMPLE CONDITION:	Yes	No	N/A
Chain-Of-Custody (COC) document(s) received with samples	☑	☐	☐
COC document(s) received complete	☑	☐	☐
☐ Collection date/time, matrix, and/or # of containers logged in based on sample labels.			
☐ COC not relinquished. ☐ No date relinquished. ☐ No time relinquished.			
Sampler's name indicated on COC	☑	☐	☐
Sample container label(s) consistent with COC	☑	☐	☐
Sample container(s) intact and good condition	☑	☐	☐
Correct containers and volume for analyses requested	☑	☐	☐
Analyses received within holding time	☑	☐	☐
Proper preservation noted on COC or sample container	☑	☐	☐
☐ Unpreserved vials received for Volatiles analysis			
Volatile analysis container(s) free of headspace	☑	☐	☐
Tedlar bag(s) free of condensation	☐	☐	☑

CONTAINER TYPE:

Solid: ☐4ozCGJ ☐8ozCGJ ☐16ozCGJ ☐Sleeve ☐EnCores® ☐TerraCores® ☐_____

Water: ☑VOA ☑VOAh ☐VOA**na$_2$** ☐125AGB ☐125AGBh ☐125AGBp ☐1AGB ☐1AGB**na$_2$** ☐1AGBs ☐500AGB ☐500AGJ ☐500AGJs ☐250AGB ☐250CGB ☐250CGBs ☑1PB ☐500PB ☐500PBna ☐250PB ☑250PBn ☐125PB ☐125PB**znna** ☐100PJ ☐100PJ**na$_2$** ☐_____ ☐_____ ☐_____

Air: ☐Tedlar® ☐Summa® ☐_____ **Other:** ☐_____ **Checked/Labeled by:** TN

Container: C: Clear A: Amber P: Plastic G: Glass J: Jar B: Bottle Z: Ziploc/Resealable Bag E: Envelop **Reviewed by:** WB

Preservative: h: HCL n: HNO3 na$_2$: $Na_2S_2O_3$ Na: NaOH p: H_3PO_4 s: H_2SO_4 znna: $ZnAc_2$+NaOH f: Field-filtered **Scanned by:** WB

Calscience Environmental Laboratories, Inc.

WORK ORDER #: 09-07-1876

SAMPLE ANOMALY FORM

SAMPLES - CONTAINERS & LABELS:

- ☐ **Samples NOT RECEIVED but listed on COC**
- ☐ **Samples received but NOT LISTED on COC**
- ☑ **Holding time expired** – list sample ID(s) and test
- ☐ **Insufficient quantities for analysis** – list test
- ☐ **Improper container(s)/preservative used** – list test
- ☐ **No preservative noted on COC or label** – list test & notify lab
- ☐ **Sample labels illegible** – note test/container type
- ☐ **Sample labels do not match COC** – Note in comments
  - ☐ **Sample ID**
  - ☐ **Date and/or Time Collected**
  - ☐ **Project Information**
  - ☐ **# of Containers**
  - ☐ **Analysis**
- ☐ **Sample containers compromised** – Note in comments
  - ☐ **Leaking**
  - ☐ **Broken**
  - ☐ **Without Labels**
- ☐ **Air sample containers compromised** – Note in comments
  - ☐ **Flat**
  - ☐ **Very low in volume**
  - ☐ **Leaking (transferred into Calscience Tedlar® Bag*)**
  - ☐ **Leaking (transferred into Client's Tedlar® Bag*)**
- ☐ **Other:** _____

Comments:

(1-9) FERROUS IRON + DISSOLVED SULFIDE RECEIVED EXPIRED.

HEADSPACE – Containers with Bubble > 6mm or ¼ inch:

Sample #	Container ID(s)	# of Vials Received	Sample #	Container ID(s)	# of Vials Received	Sample #	Container ID(s)	# of RSK or CO_2 or DO Received

Comments: _____

*Transferred at Client's request.

Initial / Date WB 7/23/09

ATTACHMENT

FIELD PROCEDURES FOR GROUNDWATER SAMPLING

The sampling procedures for groundwater monitoring events are contained in this appendix.

Groundwater and Liquid-Phase Petroleum Hydrocarbon Depth Assessment

Prior to measuring the depth to liquid in the well, the well caps are removed and the liquid level allowed to stabilize. A water/hydrocarbon interface probe is used to assess the liquid-phase petroleum hydrocarbon (LPH) thickness, if present, and a water level indicator is used to measure the groundwater depth in monitoring wells that do not contain LPH. Depth to groundwater or LPH is measured from a datum point at the top of each monitoring well casing. The datum point is typically a notch cut in the north side of the casing edge. If a water level indicator is used, the tip is subjectively analyzed for hydrocarbon sheen.

Subjective Analysis of Groundwater

Prior to purging, a water sample is collected from the monitoring well for subjective assessment. The sample is retrieved by gently lowering a clean, disposable bailer to approximately one-half the bailer length past the air/liquid interface. The bailer is then retrieved, and the sample contained within the bailer is examined for floating LPH and the appearance of a LPH sheen.

Monitoring Well Sampling

In many cases, determining whether to purge or not to purge wells prior to sample collection is made in the field and is often based on depth to water relative to the screen interval of the well. Site-specific field data sheets present details associated with the purge method and equipment used.

Monitoring wells, when purged, use a pump or bailer until pH, temperature, and conductivity of the purge water has stabilized and a minimum of three well volumes of water has been removed. Field measuring equipment is calibrated and maintained according to the manufacturer's instructions. If three well volumes cannot be removed in one half hour's time the well is allowed to recharge to 80% of original level. After recharging, a groundwater sample is then collected from each of the wells using disposable bailers.

A Teflon bailer, electric submersible or bladder pump will be the only equipment used for well sampling. When samples for volatile organic analysis are being collected, the pump flow will be regulated at approximately 100 milliliters per minute to minimize pump effluent turbulence and aeration. Glass bottles of at least 40-milliliters volume and fitted with Teflon-lined septa will be used in sampling for volatile organics. These

bottles will be filled completely to prevent air accumulation in the bottle. A positive meniscus forms when the bottle is completely full. A convex Teflon septum will be placed over the positive meniscus to eliminate air. After the bottle is capped, it is inverted and tapped to verify that it contains no air bubbles. The sample containers for other parameters will be filled, filtered as required, and capped. Glass and plastic bottles used by Stratus to collect groundwater samples are supplied by the laboratory.

Groundwater Sample Labeling and Preservation

Samples are collected in appropriate containers supplied by the laboratory. All required chemical preservation is added to the bottles prior to delivery to Stratus. Sample label information includes a unique sample identification number, job identification number, date, and time. After labeling, all groundwater samples are placed in a Ziploc® type bag and placed in an ice chest cooled to approximately 4° Celsius. Upon arriving at Stratus' office the samples are transferred to a locked refrigerator cooled to approximately 4° Celsius. Chemical preservation is controlled by the required analysis and is noted on the chain-of-custody form. Trip and temperature blanks supplied by the laboratory accompany the groundwater sample containers and groundwater samples.

Sample Identification and Chain-of-Custody Procedures

Sample identification and chain-of-custody procedures document sample possession from the time of collection to ultimate disposal. Each sample container submitted for analysis has a label affixed to identify the job number, sampler, date and time of sample collection, and a sample number unique to that sample. This information, in addition to a description of the sample, field measurements made, sampling methodology, names of on-site personnel, and any other pertinent field observations, is recorded in the field records. The samples are analyzed by a California-certified laboratory.

A chain-of-custody form is used to record possession of the sample from time of collection to its arrival at the laboratory. When the samples are shipped, the person in custody of them relinquishes the samples by signing the chain-of-custody form and noting the time. The sample-control officer at the laboratory verifies sample integrity and confirms that the samples are collected in the proper containers, preserved correctly, and contain adequate volumes for analysis. These conditions are noted on a Laboratory Sample Receipt Checklist that becomes part of the laboratory report upon request.

If these conditions are met, each sample is assigned a unique log number for identification throughout analysis and reporting. The log number is recorded on the chain-of-custody form and in the legally-required log book maintained by the laboratory. The sample description, date received, client's name, and other relevant information is also recorded.

Equipment Cleaning

All reusable sampling equipments are cleaned using phosphate-free detergents and rinsed with de-ionized water.

APPENDIX B

GEOTRACKER UPLOAD CONFIRMATION

STATE WATER RESOURCES CONTROL BOARD

GEOTRACKER ESI

UPLOADING A GEO_WELL FILE

SUCCESS

Processing is complete. No errors were found!
Your file has been successfully submitted!

Submittal Type:	**GEO_WELL**
Submittal Title:	**3Q09 GEO_WELL 11133**
Facility Global ID:	**T0600100210**
Facility Name:	**BP #11133**
File Name:	**GEO_WELL.zip**
Organization Name:	**Broadbent & Associates, Inc.**
Username:	**BROADBENT-C**
IP Address:	**67.118.40.90**
Submittal Date/Time:	**9/17/2009 11:26:19 AM**
Confirmation Number:	**5988686680**

STATE WATER RESOURCES CONTROL BOARD

GEOTRACKER ESI

UPLOADING A EDF FILE

SUCCESS

Processing is complete. No errors were found!
Your file has been successfully submitted!

Submittal Type:	**EDF - Monitoring Report - Quarterly**
Submittal Title:	**3Q09 GW Monitoring**
Facility Global ID:	**T0600100210**
Facility Name:	**BP #11133**
File Name:	**09071876.zip**
Organization Name:	**Broadbent & Associates, Inc.**
Username:	**BROADBENT-C**
IP Address:	**67.118.40.90**
Submittal Date/Time:	**9/17/2009 11:29:28 AM**
Confirmation Number:	**8002084195**

VIEW QC REPORT

VIEW DETECTIONS REPORT