



RECEIVED

By Alameda County Environmental Health at 2:09 pm, Apr 30, 2014

Carryl MacLeod
Project Manager
Marketing Business Unit

**Chevron Environmental
Management Company**
6101 Bollinger Canyon Road
San Ramon, CA 94583
Tel (925) 790-6506
cmacleod@chevron.com

April 29, 2014

Alameda County Health Care Services
1131 Harbor Bay Parkway, Suite 250
Alameda, CA 94502-6577

Re: Former Texaco Service Station 307233
2259 First Street
Livermore, California
ACEHS Case RO0002908

I accept the First Quarter 2014 Groundwater Monitoring and Sampling Report.

I agree with the conclusions and recommendations presented in this document. The information included is accurate to the best of my knowledge, and appears to meet local agency and Regional Board guidelines. This first Quarter 2014 Groundwater Monitoring and Sampling Report was prepared by Conestoga Rovers & Associates, upon whose assistance and advice I have relied.

This letter is submitted pursuant to the requirements of California Water Code Section 13267(b)(1) and the regulating implementation entitled Appendix A pertaining thereto.

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

Sincerely,

A handwritten signature in cursive script that reads "Carryl MacLeod".

Carryl MacLeod
Project Manager

Attachment: First Quarter 2014 Groundwater Monitoring and Sampling Report



**CONESTOGA-ROVERS
& ASSOCIATES**

10969 Trade Center Drive
Rancho Cordova, California 95670
Telephone: (916) 889-8900 Fax: (916) 889-8999
<http://www.craworld.com>

April 29, 2014

Reference No. 312264

Mr. Jerry Wickham
Alameda County Environmental Health Services (ACEHS)
1131 Harbor Bay Parkway, Suite 250
Alameda, California 94502-6577

Re: First Quarter 2014
Groundwater Monitoring and Sampling Report
Former Texaco Service Station 307233
2259 First Street
Livermore, California
ACEHS Case RO0002908

Dear Mr. Wickham:

Conestoga-Rovers & Associates (CRA) is submitting this *First Quarter 2014 Groundwater Monitoring and Sampling Report* for the site referenced above (Figure 1) on behalf of Chevron Environmental Management Company (Chevron). Groundwater monitoring and sampling was performed by Gettler-Ryan Inc. (G-R) of Dublin, California and their *Groundwater Monitoring and Sampling Data Package* is included as Attachment A. Current and historical groundwater monitoring and sampling data are presented in Table 1 and current data are shown on Figures 2 and 3. Eurofins Lancaster Laboratories Environmental, LLCs' *Analytical Results* report is included as Attachment B.

RESULTS OF FIRST QUARTER 2014 EVENT

On March 27, 2014, G-R monitored and sampled the site wells per the established schedule.

Results of the current monitoring event indicate the following:

- | | |
|--|---------------------------|
| • Shallow Groundwater Flow Direction | Southwest |
| • Shallow Hydraulic Gradient | 0.3 |
| • Deep Groundwater Flow Direction | West-northwest |
| • Deep Hydraulic Gradient | 0.01 |
| • Approximate Depth to Water - Shallow | 25 to 36 feet below grade |
| • Approximate Depth to Water - Deep | 35 to 37 feet below grade |

Equal
Employment Opportunity
Employer



Results of the current sampling event are presented below in Table A:

TABLE A: GROUNDWATER ANALYTICAL DATA						
<i>Well ID</i>	<i>TPHd*</i> ($\mu\text{g/L}$)	<i>TPHg</i> ($\mu\text{g/L}$)	<i>Benzene</i> ($\mu\text{g/L}$)	<i>Toluene</i> ($\mu\text{g/L}$)	<i>Ethylbenzene</i> ($\mu\text{g/L}$)	<i>Total Xylenes</i> ($\mu\text{g/L}$)
<i>ESLs</i>	100	100	1	40	30	20
MW-1	<50/<50	<50	<0.5	<0.5	<0.5	<0.5
MW-2	91/<50	<50	<0.5	<0.5	<0.5	<0.5
MW-3	660 / <50	<50	<0.5	<0.5	<0.5	<0.5
MW-4	750/530	3,000	2	0.8	4	3
MW-5	<50/<50	<50	<0.5	<0.5	<0.5	<0.5
MW-6	160/160	870	<0.5	<0.5	0.6	<0.5
MW-7	43,000/42,000	18,000	2,900	56	440	250
MW-8	34,000/38,000	6,500	1	1	15	2
MW-9	<50/<50	<50	<0.5	<0.5	<0.5	<0.5
MW-10	2,500/2,400	3,200	<0.5	<0.5	12	3
MW-11	230/77	<50	<0.5	<0.5	<0.5	<0.5
MW-12	1,000/230	2,100	5	2	1	2
ESL	San Francisco Bay Region-Regional Water Quality Control Board, (RWQCB), 2008, <i>Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater</i> , Interim final, May 2013, Table F-1a.					
NA	Not Analyzed					
*	Analyzed without and with 10 gram silica gel cleanup					
Concentrations in BOLD exceed ESLs						

CONCLUSIONS AND RECOMMENDATIONS

The results of ongoing groundwater monitoring and sampling at the site indicate the following:

- TPHd, TPHg, and to a lesser extent, benzene are the primary constituents of concern at the site.
- The highest dissolved concentrations detected in shallow zone wells were in MW-7, MW-8, and MW-10 in the vicinity of the former USTs, and sheen was noted in wells MW-7 and MW-8 during this event.
- Dissolved hydrocarbons concentrations in deep zone wells were primarily limited to wells MW-4 and MW-6 on site.



**CONESTOGA-ROVERS
& ASSOCIATES**

April 29, 2014

Reference No. 312264

- 3 -

As recently installed wells (MW-10 through MW-12) have been monitored and sampled (where there was sufficient water to sample) over the last two years, the monitoring and sampling frequency will be reduced to semi-annual starting with the second quarter 2014 unless otherwise notified by ACEHS. CRA recommends continuing semi-annual monitoring and sampling to evaluate concentration trends over time.

ANTICIPATED FUTURE ACTIVITIES

Groundwater Monitoring

G-R will initiate semi-annual monitoring and sampling of site wells during the third quarter 2014. CRA will submit a groundwater monitoring and sampling report.

Please contact Brian Silva at (916) 889-8908 if you have any questions or require additional information.

Sincerely,

CONESTOGA-ROVERS & ASSOCIATES

Brian Silva

Greg Barclay, PG 6260



BS/aa/31

Encl.



**CONESTOGA-ROVERS
& ASSOCIATES**

April 29, 2014

Reference No. 312264

- 4 -

Figure 1	Vicinity Map
Figure 2	Shallow Zone Groundwater Elevation Contour and Hydrocarbon Concentration Map
Figure 3	Deep Zone Groundwater Elevation Contour and Hydrocarbon Concentration Map
Table 1	Groundwater Monitoring and Sampling Data
Attachment A	Monitoring Data Package
Attachment B	Laboratory Analytical Report
cc:	Ms. Carryl MacLeod, Chevron (<i>electronic copy</i>) Mr. Eric Uranaga, City of Livermore Community Development

FIGURES

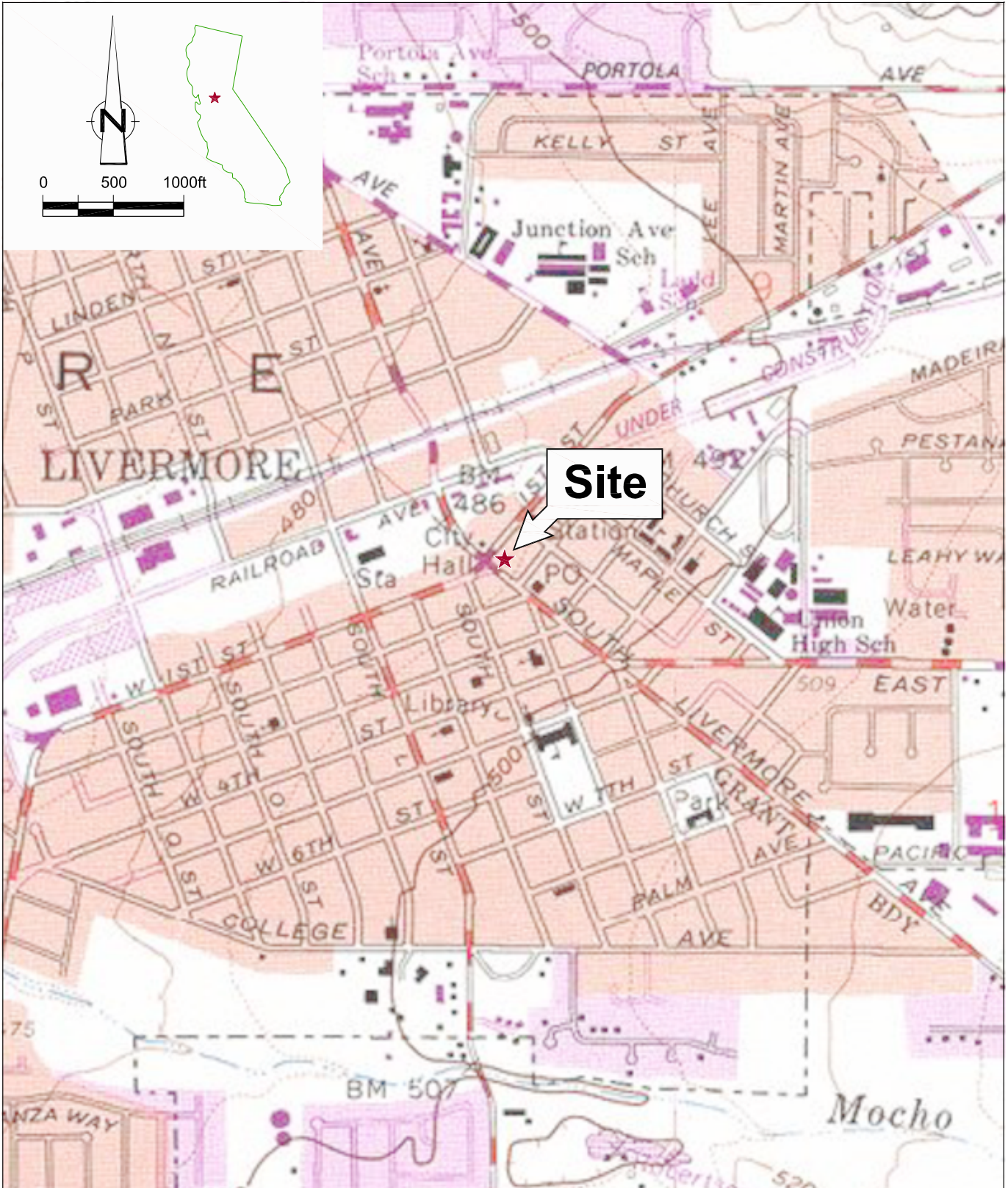


Figure 1
 VICINITY MAP
 FORMER TEXACO STATION (CHEVRON SITE 307233)
 2259 FIRST STREET
 Livermore, California



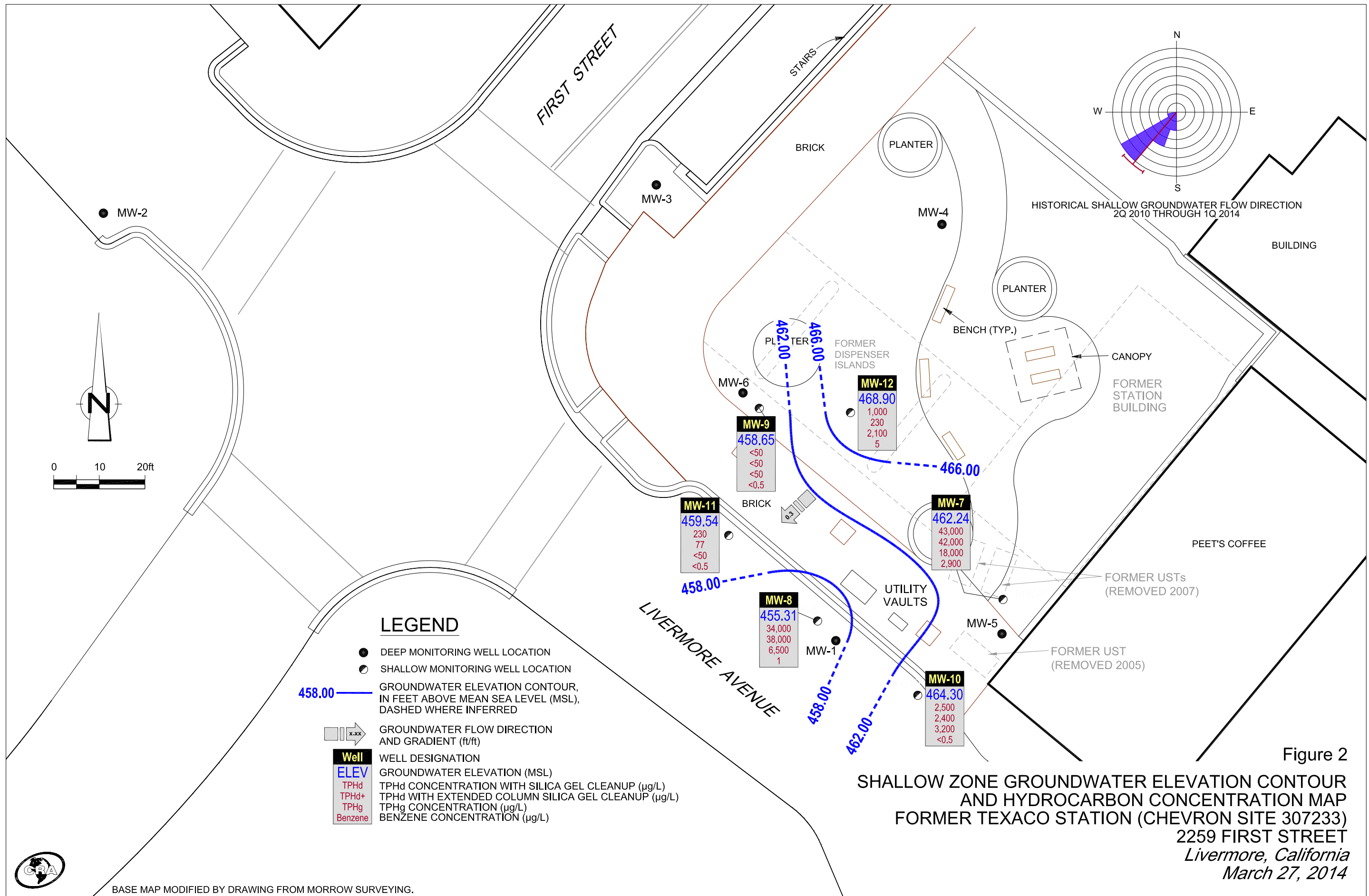
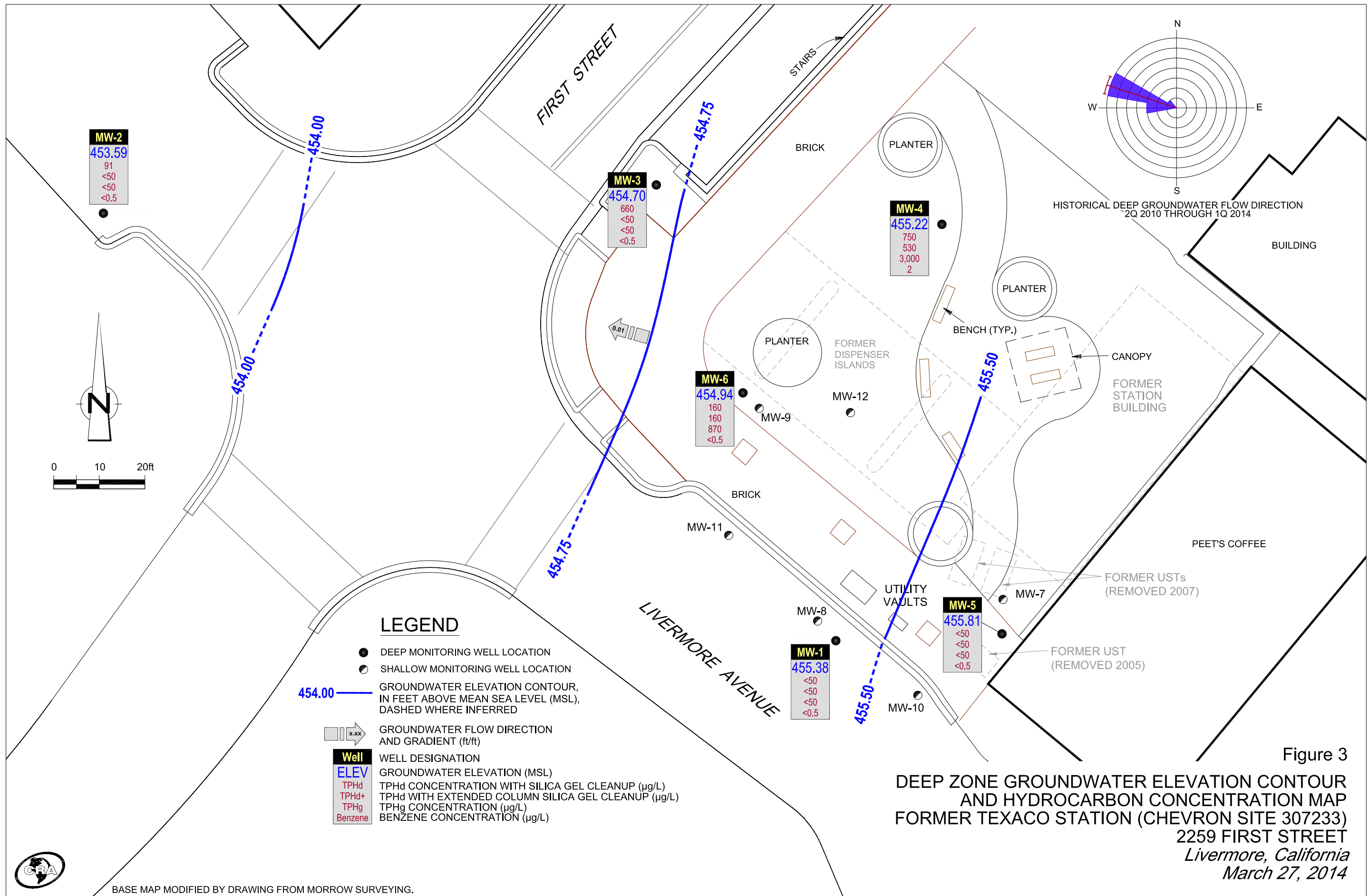


Figure 2
SHALLOW ZONE GROUNDWATER ELEVATION CONTOUR AND HYDROCARBON CONCENTRATION MAP
 FORMER TEXACO STATION (CHEVRON SITE 307233)
 2259 FIRST STREET
 Livermore, California
 March 27, 2014



BASE MAP MODIFIED BY DRAWING FROM MORROW SURVEYING.



MW-2
453.59
91
<50
<50
<0.5

MW-3
454.70
660
<50
<50
<0.5

MW-4
455.22
750
530
3,000
2

MW-6
454.94
160
160
870
<0.5

MW-1
455.38
<50
<50
<50
<0.5

MW-5
455.81
<50
<50
<50
<0.5



BASE MAP MODIFIED BY DRAWING FROM MORROW SURVEYING.

TABLE

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	L-NAPL	L-NAPL REMOVED	TPH-DRO	TPH-DRO ug/Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfite (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium
	Units	ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-1	05/25/2010 ¹	490.86	30.62	460.24	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-1	05/27/2010	490.86	30.65	460.21	0.00	0.00	<50	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	09/13/2010	490.86	36.49	454.37	0.00	0.00	51	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	12/20/2010	490.86	32.24	458.62	0.00	0.00	-	79	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	03/07/2011	490.86	27.86	463.00	0.00	0.00	-	<50	<50	<0.5	<0.5	<0.5	<0.5	6,900	73,600	-	<10	-	-	-	-
MW-1	06/06/2011	490.86	27.10	463.76	0.00	0.00	-	220	<50	<0.5	<0.5	<0.5	<0.5	7,000	71,000	-	<10	-	-	-	-
MW-1	09/19/2011	490.86	31.26	459.60	0.00	0.00	-	450/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	03/09/2012 ⁷	490.86	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-1	03/12/2012 ⁴	490.86	41.35	449.51	0.00	0.00	-	<50/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	06/04/2012 ⁷	490.86	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-1	09/10/2012 ⁴	490.86	40.67	450.19	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	12/10/2012 ⁷	490.86	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-1	03/04/2013 ⁴	490.86	30.35	460.51	0.00	0.00	-	170 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	06/03/2013 ⁷	490.86	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-1	09/09/2013 ⁴	490.86	34.08	456.78	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-1	12/09/2013 ⁷	490.86	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-1	03/27/2014 ⁴	490.86	35.48	455.38	0.00	0.00	-	<50/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	05/25/2010 ¹	489.43	31.18	458.25	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-2	05/27/2010	489.43	31.11	458.32	0.00	0.00	<50	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	09/13/2010	489.43	36.96	452.47	0.00	0.00	<50	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	12/20/2010	489.43	32.62	456.81	0.00	0.00	-	52	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	03/07/2011	489.43	28.26	461.17	0.00	0.00	-	<50	<50	<0.5	<0.5	<0.5	<0.5	3,600	45,900	-	20	-	-	-	-
MW-2	06/06/2011	489.43	27.73	461.70	0.00	0.00	-	220	<50	<0.5	<0.5	<0.5	<0.5	2,900	43,600	-	<10	-	-	-	-
MW-2	09/19/2011	489.43	31.92	457.51	0.00	0.00	-	230/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	03/09/2012 ⁷	489.43	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-2	03/12/2012 ⁴	489.43	41.84	447.59	0.00	0.00	-	<50/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	06/04/2012 ⁷	489.43	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-2	09/10/2012 ⁴	489.43	41.32	448.11	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	12/10/2012 ⁷	489.43	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	L-NAPL	L-NAPL REMOVED	TPH-DRO	TPH-DRO ug/ Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfite (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium
	Units	ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-2	03/04/2013 ⁴	489.43	30.91	458.52	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	06/03/2013 ⁷	489.43	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-2	09/09/2013 ⁴	489.43	34.76	454.67	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-2	12/09/2013 ⁷	489.43	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-2	03/27/2014⁴	489.43	35.84	453.59	0.00	0.00	-	91 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-3	05/25/2010 ¹	490.38	30.17	460.21	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-3	05/27/2010	490.38	30.98	459.40	0.00	0.00	610	-	2,100	2	<0.5	<0.5	0.9	-	-	-	-	-	-	-	-
MW-3	09/13/2010	490.38	36.77	453.61	0.00	0.00	<50	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-3	12/20/2010	490.38	32.41	457.97	0.00	0.00	-	97	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-3	03/07/2011	490.38	28.06	462.32	0.00	0.00	-	<50	<50	<0.5	<0.5	<0.5	<0.5	4,300	70,400	-	53	-	-	-	-
MW-3	06/06/2011	490.38	27.28	463.10	0.00	0.00	-	110	<50	<0.5	<0.5	<0.5	<0.5	3,900	66,400	-	17	-	-	-	-
MW-3	09/19/2011	490.38	31.21	459.17	0.00	0.00	-	170/230	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-3	03/09/2012 ⁷	490.38	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-3	03/12/2012 ⁴	490.38	41.66	448.72	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-3	06/04/2012 ⁷	490.38	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-3	09/10/2012 ⁴	490.38	41.02	449.36	0.00	0.00	-	<50 / <50	<50	<5	<5	<5	<5	-	-	-	-	-	-	-	-
MW-3	12/10/2012 ⁷	490.38	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-3	03/04/2013 ⁴	490.38	30.58	459.80	0.00	0.00	-	360 / 240	1,500	150	3	2	3	-	-	-	-	-	-	-	-
MW-3	06/03/2013 ⁷	490.38	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-3	09/09/2013 ⁴	490.38	34.38	456.00	0.00	0.00	-	250 / 170	910	50	1	0.7	2	-	-	-	-	-	-	-	-
MW-3	12/09/2013 ⁷	490.38	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-3	03/27/2014⁴	490.38	35.68	454.70	0.00	0.00	-	660 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-4	05/25/2010 ¹	492.27	32.21	460.06	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-4	05/27/2010	492.27	32.26	460.01	0.00	0.00	230	-	1,800	1	<0.5	<0.5	0.7	-	-	-	-	-	-	-	-
MW-4	09/13/2010	492.27	38.14	454.13	0.00	0.00	<50	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-4	12/20/2010	492.27	33.80	458.47	0.00	0.00	-	180	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-4	03/07/2011	492.27	29.42	462.85	0.00	0.00	-	<50	<50	<0.5	<0.5	<0.5	<0.5	7,900	72,300	-	15	-	-	-	-
MW-4	06/06/2011	492.27	28.52	463.75	0.00	0.00	-	87	<50	<0.5	<0.5	<0.5	<0.5	7,500	67,700	-	<10	-	-	-	-
MW-4	09/19/2011	492.27	32.78	459.49	0.00	0.00	-	330/140	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	L-NAPL	L-NAPL REMOVED	TPH-DRO	TPH-DRO ug/Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfite (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium
	Units	ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-4	03/09/2012 ⁷	492.27	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-4	03/12/2012 ⁴	492.27	42.99	449.28	0.00	0.00	-	130/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-4	06/04/2012 ⁷	492.27	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-4	09/10/2012 ⁴	492.27	42.30	449.97	0.00	0.00	-	580 / 310	2,400	2	0.7	2	2	-	-	-	-	-	-	-	-
MW-4	12/10/2012 ⁷	492.27	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-4	03/04/2013 ⁴	492.27	31.89	460.38	0.00	0.00	-	170 / 100	350	<0.5	<0.5	0.6	<0.5	-	-	-	-	-	-	-	-
MW-4	06/03/2013 ⁷	492.27	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-4	09/09/2013 ⁴	492.27	35.67	456.60	0.00	0.00	-	76 / 65	190	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-4	12/09/2013 ⁷	492.27	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-4	03/27/2014⁴	492.27	37.05	455.22	0.00	0.00	-	750/530	3,000	2	0.8	4	3	-	-	-	-	-	-	-	-
MW-5	05/25/2010 ¹	491.99	31.39	460.60	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-5	05/27/2010	491.99	31.42	460.57	0.00	0.00	120	-	420	2	<0.5	<0.5	1	-	-	-	-	-	-	-	-
MW-5	09/13/2010	491.99	37.25	454.74	0.00	0.00	700	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	12/20/2010	491.99	33.01	458.98	0.00	0.00	-	74	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	03/07/2011	491.99	28.60	463.39	0.00	0.00	-	93	<50	<0.5	<0.5	<0.5	<0.5	7,900	70,100	-	23	-	-	-	-
MW-5	06/06/2011	491.99	27.71	464.28	0.00	0.00	-	<50	18,000	1,500	45	450	1,700	<250	2,700	-	11	-	-	-	-
MW-5	06/22/2011 ²	491.99	28.90	463.09	0.00	0.00	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	09/19/2011	491.99	31.94	460.05	0.00	0.00	-	240/410	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	03/09/2012 ⁷	491.99	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-5	03/12/2012 ⁴	491.99	42.15	449.84	0.00	0.00	-	95/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	06/4/2012 ⁷	491.99	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-5	09/10/2012 ⁴	491.99	41.39	450.60	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	12/10/2012 ⁷	491.99	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-5	03/04/2013 ⁴	491.99	31.07	460.92	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	06/03/2013 ⁷	491.99	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-5	09/09/2013 ⁴	491.99	34.79	457.20	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-5	12/09/2013 ⁷	491.99	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-5	03/27/2014⁴	491.99	36.18	455.81	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	05/25/2010 ¹	491.52	31.63	459.89	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	L-NAPL	L-NAPL REMOVED	TPH-DRO	TPH-DRO ug/Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfite (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium
	Units	ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-6	05/27/2010	491.52	31.79	459.73	0.00	0.00	1,000	-	3,700	4	<0.5	<0.5	1	-	-	-	-	-	-	-	-
MW-6	09/13/2010	491.52	37.64	453.88	0.00	0.00	68	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	12/20/2010	491.52	33.32	458.20	0.00	0.00	-	140	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	03/07/2011	491.52	28.96	462.56	0.00	0.00	-	63	<50	<0.5	<0.5	<0.5	<0.5	360	55,400	-	33	-	-	-	-
MW-6	06/06/2011	491.52	28.08	463.44	0.00	0.00	-	<50	<50	<0.5	<0.5	<0.5	<0.5	5,300	54,000	-	<10	-	-	-	-
MW-6	09/19/2011	491.52	32.38	459.14	0.00	0.00	-	<50/380	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	03/09/2012 ⁷	491.52	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-6	03/12/2012 ⁴	491.52	42.50	449.02	0.00	0.00	-	54/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	06/4/2012 ⁷	491.52	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-6	09/10/2012 ⁴	491.52	41.82	449.70	0.00	0.00	-	86/<50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	12/10/2012 ⁷	491.52	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-6	03/04/2013 ⁴	491.52	31.45	460.07	0.00	0.00	-	210 / 160	210	0.6	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	06/03/2013 ⁷	491.52	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-6	09/09/2013 ⁴	491.52	35.22	456.30	0.00	0.00	-	120 / 66	110	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-6	12/09/2013 ⁷	491.52	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-6	03/27/2014⁴	491.52	36.58	454.94	0.00	0.00	-	160/160	870	<0.5	<0.5	0.6	<0.5	-	-	-	-	-	-	-	-
MW-7	05/25/2010 ¹	492.29	28.69	463.60	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-7	05/27/2010	492.29	28.61	463.68	0.00	0.00	2,800	-	14,000	1,800	35	320	660	-	-	-	-	-	-	-	-
MW-7	09/13/2010	492.29	31.75	460.54	0.00	0.00	40,000	-	16,000	1,700	33	460	600	-	-	-	-	-	-	-	-
MW-7	12/20/2010	492.29	27.96	464.33	0.00	0.00	-	6,200	15,000	2,800	59	450	530	-	-	-	-	-	-	-	-
MW-7	03/07/2011	492.29	24.98	467.31	0.00	0.00	-	55,000	16,000	1,500	50	470	2,100	<250	2,600	-	2,800	-	-	-	-
MW-7	06/06/2011	492.29	24.12	468.17	0.00	0.00	-	24,000	<50	<0.5	<0.5	<0.5	<0.5	8,000	70,300	-	4,300	-	-	-	-
MW-7	06/22/2011 ²	492.29	26.71	465.58	0.00	0.00	-	-	19,000	1,800	47	490	2,200	-	-	-	-	-	-	-	-
MW-7	09/19/2011 ³	492.29	28.85	463.44	0.12	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-7	03/09/2012	492.29	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-7	03/12/2012 ⁵	492.29	32.38	459.91	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-7	06/04/2012 ^{5,6}	492.29	32.38	459.91	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-7	09/10/2012 ^{5,9}	492.29	32.62	459.67	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-7	12/10/2012 ^{4,9}	492.29	28.77	463.52	0.00	0.00	-	180,000 / 150,000	21,000	2,300	47	400	550	-	250,000	<54	6,000	573,000	-	12,000	179,000
MW-7	03/04/2013 ^{4,9}	492.29	29.63	462.66	0.00	0.00	-	46,000 / 34,000	18,000	1,900	26	370	390	-	221,000	880	6,300	679,000	-	16,000	127,000

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	L-NAPL	L-NAPL REMOVED	TPH-DRO	TPH-DRO ug/Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfite (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium
	Units	ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-7	06/03/2013 ⁹	492.29	31.13	461.16	0.00	0.00	-	-	21,000	1,900	23	310	250	-	159,000	-	-	-	-	9,500	-
MW-7	09/09/2013 ^{5,9}	492.29	32.38	459.91	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-7	12/09/2013 ^{4,8,9}	492.29	31.78	460.51	0.00	0.00	-	94,000 / 82,000	17,000	2,600	22	400	220	-	-	-	-	-	-	-	-
MW-7	03/27/2014^{4,8,9}	492.29	30.05	462.24	0.00	0.00	-	43,000 / 42,000	18,000	2,900	56	440	250	-	72,000	300	9,500	540,000	-	11,000	100,000
MW-8	05/25/2010 ¹	490.89	30.62	460.27	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-8	05/27/2010	490.89	30.78	460.11	0.00	0.00	750	-	3,100	36	3	<0.5	2	-	-	-	-	-	-	-	-
MW-8	09/13/2010	490.89	36.55	454.34	0.00	0.00	590	-	3,400	5	2	<0.5	1	-	-	-	-	-	-	-	-
MW-8	12/20/2010	490.89	31.60	459.29	0.00	0.00	-	750	4,000	0.8	0.7	19	3	-	-	-	-	-	-	-	-
MW-8	03/07/2011	490.89	28.20	462.69	0.00	0.00	-	1,300	2,800	0.9	0.7	12	2	<250	7,000	-	820	-	-	-	-
MW-8	06/06/2011	490.89	27.38	463.51	0.00	0.00	-	4,300	3,100	0.9	0.7	5	1	<250	2,400	-	2,000	-	-	-	-
MW-8	09/19/2011	490.89	31.81	459.08	0.00	0.00	-	6,800/720	4,600	1	0.8	0.5	0.8	-	-	-	-	-	-	-	-
MW-8	03/09/2012	490.89	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-8	03/12/2012 ⁵	490.89	38.48	452.41	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-8	06/04/2012 ^{4,8}	490.89	37.66	453.23	0.00	0.00	-	73,000/68,000	5,700	1	0.8	2	3	-	<1,500	<54	27,100	259,000	<700	2,000	31,200
MW-8	9/10/2012 ⁵	490.89	38.73	452.16	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-8	12/10/2012 ⁴	490.89	31.64	459.25	0.00	0.00	-	4,200 / 3,400	5,600	<3	<3	11	<3	-	<1,500	130	1,600	220,000	-	2,600	18,900
MW-8	03/04/2013 ⁴	490.89	30.85	460.04	0.00	0.00	-	9,400 / 6,300	4,700	<3	<3	<3	<3	-	<1,500	150	2,500	223,000	-	2,700	22,100
MW-8	06/03/2013 ⁴	490.89	33.60	457.29	0.00	0.00	-	1,700 / 1,600	5,000	17	0.9	<0.5	1	-	3,000	<54	5,100	301,000	-	2,500	36,400
MW-8	09/09/2013 ⁴	490.89	34.73	456.16	0.00	0.00	-	21,000 / 15,000	3,900	3	0.6	<0.5	0.6	-	<1,500	<54	7,100	305,000	-	1,000	34,700
MW-8	12/09/2013 ⁴	490.89	33.82	457.07	0.00	0.00	-	19,000 / 13,000	6,800	1	0.7	3	0.9	-	<1,500	220	3,200	219,000	-	2,400	22,000
MW-8	03/27/2014⁴	490.89	35.58	455.31	0.00	0.00	-	34,000 / 38,000	6,500	1	1	15	2	-	<1,500	240	9,600	185,000	-	3,400	31,900
MW-9	05/25/2010 ¹	491.64	29.23	462.41	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-9	05/27/2010	491.64	28.96	462.68	0.00	0.00	<50	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-9	09/13/2010	491.64	31.85	459.79	0.00	0.00	30,000	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-9	12/20/2010	491.64	28.95	462.69	0.00	0.00	-	56	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-9	03/07/2011	491.64	25.67	465.97	0.00	0.00	-	<50	<50	<0.5	<0.5	<0.5	<0.5	<250	172,000	-	48	-	-	-	-
MW-9	06/06/2011	491.64	24.67	466.97	0.00	0.00	-	<50	<50	<0.5	<0.5	<0.5	<0.5	<250	228,000	-	<10	-	-	-	-
MW-9	09/19/2011	491.64	29.46	462.18	0.00	0.00	-	250/<50*	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-9	03/09/2012 ⁷	491.64	-	-	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	LNAPL	LNAPL REMOVED	TPH-DRO	TPH-DRO ug/Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfite (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium
	Units	ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
MW-9	03/12/2012 ⁴	491.64	34.27	457.37	0.00	0.00	-	<50 / <50*	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-9	06/04/2012 ⁷	491.64	35.80	455.84	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-9	9/10/2012 ⁴	491.64	36.53	455.11	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-9	12/10/2012 ¹⁰	491.64	32.80	458.84	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-9	03/04/2013 ⁴	491.64	29.67	461.97	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	135,000	<54	520	342,000	-	15	176,000
MW-9	06/03/2013 ⁴	491.64	31.30	460.34	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	127,000	<54	100	306,000	-	7.9	128,000
MW-9	09/09/2013 ⁴	491.64	35.55	456.09	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	133,000	<54	84	321,000	-	<3.0	74,300
MW-9	12/09/2013 ⁴	491.64	34.81	456.83	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	118,000	<54	<10	299,000	-	<3.0	61,800
MW-9	03/27/2014 ⁴	491.64	32.99	458.65	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	110,000	<54	82	303,000	-	9.2	132,000
MW-10	03/09/2012 ¹	491.15	28.00	463.15	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-10	03/12/2012 ⁴	491.15	28.11	463.04	0.00	0.00	-	440/260	3,100	<1	<1	36	16	-	-	-	-	-	-	-	-
MW-10	06/04/2012 ⁴	491.15	29.49	461.66	0.00	0.00	-	750/640	3,300	0.7	1	36	12	-	-	-	-	-	-	-	-
MW-10	09/10/2012 ⁵	491.15	32.10	459.05	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-10	12/10/2012 ⁴	491.15	26.03	465.12	0.00	0.00	-	240 / 200	950	<0.5	<0.5	2	2	-	-	-	-	-	-	-	-
MW-10	03/04/2013 ⁴	491.15	27.55	463.60	0.00	0.00	-	8,300 / 6,100	1,900	<0.5	<0.5	9	4	-	5,800	110	3,600	273,000	-	2,100	27,400
MW-10	06/03/2013 ⁴	491.15	28.79	462.36	0.00	0.00	-	4,700 / 5,300	4,200	0.9	1	32	15	-	<1,500	<54	9,400	252,000	-	5,200	36,700
MW-10	09/09/2013 ⁵	491.15	31.88	459.27	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-10	12/09/2013 ⁴	491.15	28.18	462.97	0.00	0.00	-	5,100 / 3,400	6,500	0.8	2	49	17	-	6,000	180	2,900	255,000	-	2,500	24,800
MW-10	03/27/2014 ⁴	491.15	26.85	464.30	0.00	0.00	-	2,500 / 2,400	3,200	<0.5	<0.5	12	3	-	8,300	120	2,200	216,000	-	3,000	23,600
MW-11	03/09/2012 ¹	490.59	31.48	459.11	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-11	03/12/2012 ⁴	490.59	33.35	457.24	0.00	0.00	-	160 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-11	06/04/2012 ⁵	490.59	34.22	456.37	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-11	09/10/2012 ⁵	490.59	34.48	456.11	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-11	12/10/2012 ⁴	490.59	32.50	458.09	0.00	0.00	-	55 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-
MW-11	03/04/2013 ⁴	490.59	28.11	462.48	0.00	0.00	-	<50 / <50	<50	<0.5	<0.5	<0.5	<0.5	-	59,600	<54	800	259,000	-	6.9	38,500
MW-11	06/03/2013 ⁴	490.59	31.53	459.06	0.00	0.00	-	690 / 200	<50	<0.5	<0.5	<0.5	<0.5	-	54,400	<54	670	-	-	490	-
MW-11	09/09/2013 ⁵	490.59	34.13	456.46	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-11	12/09/2013 ⁴	490.59	31.38	459.21	0.00	0.00	-	220 / <50	100	<0.5	<0.5	<0.5	<0.5	-	72,100	<54	230	284,000	-	210	43,900
MW-11	03/27/2014 ⁴	490.59	31.05	459.54	0.00	0.00	-	230 / 77	<50	<0.5	<0.5	<0.5	<0.5	-	47,600	<54	280	262,000	-	34	36,200

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	L-NAPL	L-NAPL REMOVED	TPH-DRO	TPH-DRO ug/Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfite (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium	
	Units	ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	
MW-12	03/09/2012 ¹	493.72	25.43	468.29	0.00	0.00	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW-12	03/12/2012 ⁴	493.72	26.97	466.75	0.00	0.00	-	1,100/310	3,000	10	1	19	38	-	-	-	-	-	-	-	-	-
MW-12	06/04/2012 ⁴	493.72	26.54	467.18	0.00	0.00	-	990/510	4,200	15	2	12	23	-	-	-	-	-	-	-	-	-
MW-12	09/10/2012 ⁴	493.72	28.80	464.92	0.00	0.00	-	1,000 / 290	2,500	30	2	2	2	-	-	-	-	-	-	-	-	-
MW-12	12/10/2012 ⁴	493.72	25.36	468.36	0.00	0.00	-	840 / 330	2,500	10	<3	<3	<3	-	-	-	-	-	-	-	-	-
MW-12	03/04/2013 ⁴	493.72	25.61	468.11	0.00	0.00	-	1,800 / 590	3,200	26	2	20	16	-	19,400	<54	4,700	559,000	-	1,100	80,300	
MW-12	06/03/2013 ⁴	493.72	29.50	464.22	0.00	0.00	-	450 / 260	3,000	12	0.8	9	6	-	14,700	<54	3,300	534,000	-	460	73,800	
MW-12	09/09/2013 ⁴	493.72	27.32	466.40	0.00	0.00	-	720 / 280	3,300	33	2	19	14	-	9,500	<54	4,500	559,000	-	960	69,200	
MW-12	12/09/2013 ⁴	493.72	24.68	469.04	0.00	0.00	-	670 / 260	2,500	19	3	2	1	-	14,900	<54	880	577,000	-	890	70,800	
MW-12	03/27/2014⁴	493.72	24.82	468.90	0.00	0.00	-	1,000 / 230	2,100	5	2	1	2	-	3,100	<54	4,300	580,000	-	780	71,800	
QA	05/27/2010	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	09/13/2010	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	12/20/2010	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	03/07/2011	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	06/06/2011	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	06/22/2011	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	09/19/2011	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	03/12/2012	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	06/03/2013	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	09/09/2013	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	12/09/2013	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-
QA	03/27/2014	-	-	-	-	-	-	-	<50	<0.5	<0.5	<0.5	<0.5	-	-	-	-	-	-	-	-	-

Abbreviations and Notes:

TOC = Top of casing

DTW = Depth to water

GWE = Groundwater elevation

(ft-amsl) = Feet above mean sea level

TOC elevations were surveyed on April 19, 2010 by Morrow Surveying. Vertical datum is NAVD 88 from GPS observations

TABLE 1

GROUNDWATER MONITORING AND SAMPLING DATA
 FORMER CHEVRON SERVICE STATION 307233
 2259 FIRST STREET
 LIVERMORE, CALIFORNIA

Location	Date	TOC	DTW	GWE	NAPL	NAPL REMOVED	TPH-DRO	TPH-DRO w/ Si Gel	TPH-GRO	B	T	E	X	Nitrate Nitrogen	Sulfate	Total sulfide (dissolved)	Ferrous Iron	Alkalinity, total (as CaCO3)	Alkalinity, phenolphthalein	Methane	Calcium
Units		ft	ft	ft-amsl	ft	gal	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L

ft = Feet

µg/L = Micrograms per liter

TPH-DRO = Total petroleum hydrocarbons - diesel range organics

TPH-GRO = Total petroleum hydrocarbons - gasoline range organics

VOCS = Volatile organic compounds

B = Benzene

T = Toluene

E = Ethylbenzene

X = Xylenes (Total)

-- = Not available / not applicable

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

- 1 Well development performed.
- 2 Second quarter 2011 resampling event because MW-5 and MW-7 bottles for TPHg and BTEX analysis were switched during the original 6/6/2011 sampling event.
- 3 Monitored only due to the presence of NAPL.
- 4 Silica Gel Cleanup / 10 gram Column Silica Gel Cleanup with Capric Acid Reverse Surrogate.
- 5 Insufficient water to sample.
- 6 Sulfate canister in well
- 7 Monitoring and sampled during the first and third quarters only
- 8 Insufficient water for purging, so a grab-groundwater samples was collected
- 9 Skimmer in well
- 10 Monitored only

ATTACHMENT A

MONITORING DATA PACKAGE



GETTLER-RYAN INC.



TRANSMITTAL

April 7, 2014
G-R #385876

TO: Mr. Brian Silva
Conestoga-Rovers & Associates
10969 Trade Center Drive, Suite 107
Rancho Cordova, California 95670

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

RE: **Former Chevron Service Station
#307233
2259 First Street
Livermore, California**

WE HAVE ENCLOSED THE FOLLOWING:

COPIES	DESCRIPTION
VIA PDF	Groundwater Monitoring and Sampling Data Package First Quarter Event of March 27, 2014

COMMENTS:

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

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

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

trans/9-0271

WELL CONDITION STATUS SHEET

Client/
 Facility #: **Chevron #307233**
 Site Address: **2259 First Street**
 City: **Livermore, CA**

Job #: **385876**
 Event Date: **3/27/14**
 Sampler: **SB**

WELL ID	Vault Frame Condition	Gasket/O-Ring (M) Missing (R) Replaced	Bolts (M) Missing (R) Replaced	Bolt Flanges B=Broken S=Stripped R=Retap	Apron Condition C=Cracked B=Broken G=Gone	Grout Seal (Deficient) Inches from TOC	Casing (Condition prevents tight cap seal)	REPLACE LOCK Y/N	REPLACE CAP Y/N	WELL VAULT Manufacture/Size/ # of Bolts	Pictures Taken Y/N
MW-2	ok							✓	✓	12" emco	✓
MW-3	ok									8" MORRIS	
MW-4	ok										
MW-5	ok									12" emco	
MW-7	ok									8" MORRIS	
MW-12	ok									8" MORRIS	
MW-6	ok										
MW-9	ok										
MW-10	ok								2"		
MW-8	ok							✓	✓	12" emco	
MW-1	ok										
MW-11	ok									8" MORRIS	

Comments _____

STANDARD OPERATING PROCEDURE - GROUNDWATER SAMPLING

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

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

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

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

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

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

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



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233
 Site Address: 2259 First Street
 City: Livermore, CA

Job Number: 385876
 Event Date: 3-27-14 (inclusive)
 Sampler: ML

Well ID: MW-1
 Well Diameter: 2
 Total Depth: 58.84 ft.
 Depth to Water: 35.48 ft.
23.36 x VF = 0.17 = 3.9

Date Monitored: 3-27-14

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

Check if water column is less than 0.50 ft.

Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 40.15

x3 case volume = Estimated Purge Volume: 11.7 gal.

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

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

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

Start Time (purge): 1140 Weather Conditions: CLOUDY
 Sample Time/Date: 1205 13-27-14 Water Color: Clear Odor: Y10
 Approx. Flow Rate: 1 gpm. Sediment Description: None
 Did well de-water? NO If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 37.16

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - µS)	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>1144</u>	<u>4</u>	<u>6.85</u>	<u>0.55</u>	<u>20.2</u>		
<u>1148</u>	<u>8</u>	<u>6.89</u>	<u>0.55</u>	<u>20.3</u>		
<u>1152</u>	<u>12</u>	<u>6.92</u>	<u>0.57</u>	<u>20.5</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-1	<u>6</u> x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	<u>2</u> x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS:

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



GETTLER - RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233 Job Number: 385876
 Site Address: 2259 First Street Event Date: 3/27/14 (inclusive)
 City: Livermore, CA Sampler: JH

Well ID: MW-2 Date Monitored: JH
 Well Diameter: 2
 Total Depth: 58.60 ft.
 Depth to Water: 35.84 ft. Check if water column is less than 0.50 ft.
22.76 x VF .17 = 3.86 x3 case volume = Estimated Purge Volume: 11.60 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 40.39

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

Purge Equipment:

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

Sampling Equipment:

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

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

Start Time (purge): 0635 Weather Conditions: cloudy
 Sample Time/Date: 0705 / 3/27/14 Water Color: cloudy Odor: Y10
 Approx. Flow Rate: 2 gpm. Sediment Description: Loose
 Did well de-water? No If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 36.05

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - 65)	Temperature (° / F)	D.O. (mg/L)	ORP (mV)
<u>0637</u>	<u>4</u>	<u>7.43</u>	<u>690</u>	<u>19.7</u>		
<u>0639</u>	<u>8</u>	<u>7.69</u>	<u>689</u>	<u>19.9</u>		
<u>0641</u>	<u>12</u>	<u>7.72</u>	<u>672</u>	<u>20.2</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
<u>MW-2</u>	<u>6</u> x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	<u>2</u> x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS: 12" cmco

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



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233 Job Number: 385876
 Site Address: 2259 First Street Event Date: 3/27/14 (inclusive)
 City: Livermore, CA Sampler: JH

Well ID: MW-3 Date Monitored: 3/27/14
 Well Diameter: 2
 Total Depth: 59.41 ft.
 Depth to Water: 35.68 ft. Check if water column is less than 0.50 ft.
23.73 xVF .17 = 4.03 x3 case volume = Estimated Purge Volume: 12.10 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 40.42

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

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

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

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

Start Time (purge): 1005 Weather Conditions: cloudy
 Sample Time/Date: 1050 / 3/27/14 Water Color: cloudy Odor: Y18
 Approx. Flow Rate: 1 gpm. Sediment Description: LWB
 Did well de-water? No If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 36.09

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - <u>US</u>)	Temperature (<u>C</u> / F)	D.O. (mg/L)	ORP (mV)
<u>1009</u>	<u>4</u>	<u>7.68</u>	<u>935</u>	<u>19.6</u>		
<u>1018</u>	<u>8</u>	<u>7.24</u>	<u>922</u>	<u>19.3</u>		
<u>1018</u>	<u>12.5</u>	<u>7.51</u>	<u>914</u>	<u>19.2</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-3	6 x vva vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2 x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	x vva vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	x vva vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS: 2xVVA - Chevron study samples

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



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233 Job Number: 385876
 Site Address: 2259 First Street Event Date: 3/27/14 (inclusive)
 City: Livermore, CA Sampler: JH

Well ID: MW-4 Date Monitored: 3/27/14
 Well Diameter: 2
 Total Depth: 58.93 ft.
 Depth to Water: 37.05 ft. Check if water column is less than 0.50 ft.
21.88 xVF .17 = 3.71 x3 case volume = Estimated Purge Volume: 11.15 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 41.42

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

Purge Equipment:

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

Sampling Equipment:

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

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

Start Time (purge): 1105 Weather Conditions: cloudy
 Sample Time/Date: 1150 / 3/27/14 Water Color: cloudy Odor: Y / 0
 Approx. Flow Rate: 1 gpm. Sediment Description: Low
 Did well de-water? N If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 37.68

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - <u>DS</u>)	Temperature (° / F)	D.O. (mg/L)	ORP (mV)
<u>1109</u>	<u>4</u>	<u>7.65</u>	<u>1029</u>	<u>19.7</u>		
<u>1113</u>	<u>8</u>	<u>7.60</u>	<u>1011</u>	<u>19.5</u>		
<u>1117</u>	<u>11.5</u>	<u>7.38</u>	<u>1003</u>	<u>19.2</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
<u>MW-4</u>	<u>6</u> x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	<u>2</u> x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	<u>1</u> x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	<u>1</u> x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	<u>1</u> x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	<u>1</u> x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	<u>1</u> x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	<u>1</u> x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS:

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



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233 Job Number: 385876
 Site Address: 2259 First Street Event Date: 3/27/14 (inclusive)
 City: Livermore, CA Sampler: JH

Well ID: MW-5 Date Monitored: 3/27/14
 Well Diameter: 2
 Total Depth: 59.91 ft.
 Depth to Water: 36.18 ft. Check if water column is less than 0.50 ft.
23.73 xVF .17 = 4.03 x3 case volume = Estimated Purge Volume: 12.10 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 40.92

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

Purge Equipment:

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

Sampling Equipment:

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

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

Start Time (purge): 0755 Weather Conditions: cloudy
 Sample Time/Date: 0830 / 3/27/14 Water Color: cloudy Odor: Y16
 Approx. Flow Rate: 1 gpm. Sediment Description: Loose
 Did well de-water? No If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 36.38

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - <u>CS</u>)	Temperature (<u>G</u> / F)	D.O. (mg/L)	ORP (mV)
<u>0759</u>	<u>4</u>	<u>7.61</u>	<u>702</u>	<u>17.1</u>		
<u>0803</u>	<u>8</u>	<u>7.53</u>	<u>694</u>	<u>17.2</u>		
<u>0807</u>	<u>12</u>	<u>7.46</u>	<u>687</u>	<u>17.0</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-5	6 x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2 x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	x 950ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS:

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



GETTLER - RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233
 Site Address: 2259 First Street
 City: Livermore, CA

Job Number: 385876
 Event Date: 3-27-14 (inclusive)
 Sampler: ML

Well ID: MW-6
 Well Diameter: 2
 Total Depth: 59.09 ft.
 Depth to Water: 36.58 ft.
22.51 x VF .17 = 3.8

Date Monitored: 3-27-14

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

Check if water column is less than 0.50 ft.

x3 case volume = Estimated Purge Volume: 11.4 gal.

Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 41.08

Purge Equipment:

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

Sampling Equipment:

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

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

Start Time (purge): 0715 Weather Conditions: Cloudy
 Sample Time/Date: 0755 3-27-14 Water Color: Cloudy Odor: DIN Light
 Approx. Flow Rate: _____ gpm. Sediment Description: Light
 Did well de-water? NO If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 37.01

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - µS)	Temperature (°C / °F)	D.O. (mg/L)	ORP (mV)
<u>0726</u>	<u>4</u>	<u>7.11</u>	<u>0.57</u>	<u>16.7</u>	_____	_____
<u>0737</u>	<u>8</u>	<u>7.07</u>	<u>0.59</u>	<u>16.8</u>	_____	_____
<u>0747</u>	<u>11.5</u>	<u>7.06</u>	<u>0.59</u>	<u>16.8</u>	_____	_____

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW- <u>6</u>	<u>6</u> x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	<u>2</u> x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS: _____

Add/Replaced Lock: _____

Add/Replaced Plug: _____

Add/Replaced Bolt: _____



GETTLER - RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233 Job Number: 385876
 Site Address: 2259 First Street Event Date: 3/27/14 (inclusive)
 City: Livermore, CA Sampler: JH

Well ID MW-7 Date Monitored: 3/27/14
 Well Diameter 2
 Total Depth 32.70 ft.
 Depth to Water 30.05 ft. Check if water column is less than 0.50 ft.
2.65 xVF .17 = .45 x3 case volume = Estimated Purge Volume: 1.35 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 30.58

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

Purge Equipment:

Disposable Bailer x
 Stainless Steel Bailer _____
 Stack Pump _____
 Suction Pump _____
 Grundfos _____
 Peristaltic Pump _____
 QED Bladder Pump _____
 Other: _____

Sampling Equipment:

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

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

Start Time (purge): 0720 Weather Conditions: cloudy
 Sample Time/Date: 1230 / 3/27/14 Water Color: cloudy Odor: (Y) N Strong
 Approx. Flow Rate: _____ gpm. Sediment Description: None
 Did well de-water? M If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 30.50

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - 68)	Temperature (° / F)	D.O. (mg/L)	ORP (mV)
<u>0724</u>	<u>.5</u>	<u>7.28</u>	<u>1010</u>	<u>18.9</u>		
<u>0730</u>	<u>1.0</u>	<u>7.22</u>	<u>1025</u>	<u>18.8</u>		
<u>0738</u>	<u>1.5</u>	<u>7.13</u>	<u>1031</u>	<u>19.1</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-7	6 x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2 x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
1	2 x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
1	x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
1	x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	3 x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS: Skimmer in well x2 voa C Hevron study samples
Sheen in water during sampling

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



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233
 Site Address: 2259 First Street
 City: Livermore, CA

Job Number: 385876
 Event Date: 3-27-14 (inclusive)
 Sampler: ML

Well ID: MW-8
 Well Diameter: 2
 Total Depth: 38.91 ft.
 Depth to Water: 35.58 ft.

Date Monitored: 3-27-14

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

Depth to Water 3.33 xVF .17 = 0.5 Check if water column is less than 0.50 ft.
 x3 case volume = Estimated Purge Volume: 1.5 gal.

Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 36.24

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

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

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

Start Time (purge): 1045 Weather Conditions: SUNNY
 Sample Time/Date: 1115 3-27-14 Water Color: GRAY Odor: DIRTY
 Approx. Flow Rate: _____ gpm. Sediment Description: Light
 Did well de-water? NO If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 36.01

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm @ 25°C)	Temperature (°F)	D.O. (mg/L)	ORP (mV)
<u>1048</u>	<u>.5</u>	<u>7.17</u>	<u>0.26</u>	<u>20.4</u>		
<u>1051</u>	<u>1</u>	<u>7.21</u>	<u>0.28</u>	<u>20.5</u>		
<u>1054</u>	<u>1.5</u>	<u>7.20</u>	<u>0.28</u>	<u>20.5</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-8	4 x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2 x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	2 x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	1 x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	1 x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	1 x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	1 x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	3 x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS: Sheen

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



GETTLER-RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233
 Site Address: 2259 First Street
 City: Livermore, CA

Job Number: 385876
 Event Date: 3-27-14 (inclusive)
 Sampler: ML

Well ID: MW-9
 Well Diameter: 2
 Total Depth: 39.83 ft.
 Depth to Water: 32.99 ft.

Date Monitored: 3-27-14

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

Check if water column is less than 0.50 ft.

Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 34.35
 $6.84 \times VF .17 = 1.1$ x3 case volume = Estimated Purge Volume: 3.3 gal.

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

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

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

Start Time (purge): 0810 Weather Conditions: Cloud
 Sample Time/Date: 0840 / 3-27-14 Water Color: Brown Odor: Y16
 Approx. Flow Rate: _____ gpm. Sediment Description: Light
 Did well de-water? NO If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 33.17

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - µS)	Temperature (°C / F)	D.O. (mg/L)	ORP (mV)
<u>0814</u>	<u>1</u>	<u>6.83</u>	<u>0.58</u>	<u>17.2</u>	_____	_____
<u>0818</u>	<u>2</u>	<u>6.86</u>	<u>0.60</u>	<u>17.4</u>	_____	_____
<u>0823</u>	<u>3.5</u>	<u>6.87</u>	<u>0.57</u>	<u>17.4</u>	_____	_____

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-9	6 x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	2 x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	1x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	1 x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	1 x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	1 x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	3 x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS: _____

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



GETTLER - RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233 Job Number: 385876
 Site Address: 2259 First Street Event Date: 3-27-14 (inclusive)
 City: Livermore, CA Sampler: ML

Well ID MW- 10

Date Monitored: 3-27-14

Well Diameter 2

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

Total Depth 32.09 ft.

Depth to Water 26.85 ft.

Check if water column is less than 0.50 ft.

5.24 xVF .17 = 0.8 x3 case volume = Estimated Purge Volume: 2.4 gal.

Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 27.89

Purge Equipment:

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

Sampling Equipment:

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

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

Start Time (purge): 0900 Weather Conditions: CLOUDY
 Sample Time/Date: 0930 / 3-27-14 Water Color: CLOUDY Odor: MIN LIGHT
 Approx. Flow Rate: _____ gpm. Sediment Description: Light
 Did well de-water? NO If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 26.96

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - µS)	Temperature (°F)	D.O. (mg/L)	ORP (mV)
<u>0904</u>	<u>1</u>	<u>7.16</u>	<u>0.29</u>	<u>18.5</u>		
<u>0908</u>	<u>2</u>	<u>7.14</u>	<u>0.30</u>	<u>18.6</u>		
<u>0911</u>	<u>2.5</u>	<u>7.17</u>	<u>0.32</u>	<u>18.6</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW- 10	1 x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2 x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	2 x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	1 x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	1 x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	1 x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	1 x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	3 x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS:

Add/Replaced Lock: _____

Add/Replaced Plug: X

Add/Replaced Bolt: X



GETTLER - RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233
 Site Address: 2259 First Street
 City: Livermore, CA

Job Number: 385876
 Event Date: 3-27-14 (inclusive)
 Sampler: ML

Well ID: MW-11
 Well Diameter: 2
 Total Depth: 34.71 ft.
 Depth to Water: 31.05 ft.

Date Monitored: 3-27-14

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

Depth to Water 3.66 xVF .17 = 0.6 Check if water column is less than 0.50 ft.
 x3 case volume = Estimated Purge Volume: 1.8 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 31.78

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

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

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

Start Time (purge): 0955 Weather Conditions: Cloudy
 Sample Time/Date: 1025 3-27-14 Water Color: Clear Odor: YIM
 Approx. Flow Rate: _____ gpm. Sediment Description: None
 Did well de-water? No If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 31.46

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - µS)	Temperature (° / F)	D.O. (mg/L)	ORP (mV)
<u>0958</u>	<u>.75</u>	<u>6.98</u>	<u>0.36</u>	<u>18.1</u>		
<u>1001</u>	<u>1.5</u>	<u>7.07</u>	<u>0.37</u>	<u>18.1</u>		
<u>1004</u>	<u>2</u>	<u>7.04</u>	<u>0.36</u>	<u>18.2</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-11	6 x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2 x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
	2 x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	1 x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
	1 x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	1 x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
	1 x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	3 x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS:

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



GETTLER - RYAN INC.

WELL MONITORING/SAMPLING FIELD DATA SHEET

Client/Facility#: Chevron #307233 Job Number: 385876
 Site Address: 2259 First Street Event Date: 3/27/14 (inclusive)
 City: Livermore, CA Sampler: JH

Well ID: MW-12 Date Monitored: 3/27/14
 Well Diameter: 2
 Total Depth: 34.46 ft.
 Depth to Water: 24.82 ft. Check if water column is less than 0.50 ft.
9.64 xVF .17 = 1.63 x3 case volume = Estimated Purge Volume: 4.91 gal.
 Depth to Water w/ 80% Recharge [(Height of Water Column x 0.20) + DTW]: 26.74

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

Purge Equipment:

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

Sampling Equipment:

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

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

Start Time (purge): 0850 Weather Conditions: cloudy
 Sample Time/Date: 0925 / 3/27/14 Water Color: cloudy Odor: Y10
 Approx. Flow Rate: _____ gpm. Sediment Description: Loose
 Did well de-water? no If yes, Time: _____ Volume: _____ gal. DTW @ Sampling: 24.98

Time (2400 hr.)	Volume (gal.)	pH	Conductivity (µmhos/cm - (S))	Temperature (C / F)	D.O. (mg/L)	ORP (mV)
<u>0855</u>	<u>1.5</u>	<u>7.13</u>	<u>1077</u>	<u>18.2</u>		
<u>0900</u>	<u>3.0</u>	<u>7.02</u>	<u>1089</u>	<u>18.1</u>		
<u>0905</u>	<u>5.0</u>	<u>6.95</u>	<u>1105</u>	<u>18.0</u>		

LABORATORY INFORMATION

SAMPLE ID	(#) CONTAINER	REFRIG.	PRESERV. TYPE	LABORATORY	ANALYSES
MW-12	6 x voa vial	YES	HCL	LANCASTER	TPH-GRO(8015)/BTEX(8260)
	2 x 500ml ambers	YES	NP	LANCASTER	TPH-DRO w/sgc COLUMN/ TPH-DRO w/sgc(8015)
1	2 x voa vial	YES	NP	LANCASTER	SULFATE (EPA 300.0)
	x 250ml clear glass	YES	NaOH	LANCASTER	DISSOLVED SULFIDE (SM20 4500 S2D)
1	x 250ml poly	YES	NP	LANCASTER	TOTAL ALKALINITY (SM20 2320 B)
	x 250ml poly	YES	HNO3	LANCASTER	CALCIUM (6010)
1	x 250ml amber	YES	HCL	LANCASTER	FERROUS IRON (SM20 3500 Fe B)
	3 x voa vial	YES	HCL	LANCASTER	DISSOLVED METHANE (RSK-175)

COMMENTS: _____

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

Chevron California Region Analysis Request/Chain of Custody



Lancaster Laboratories

For Eurofins Lancaster Laboratories use only
 Acct. # _____ Group # _____ Sample # _____
 Instructions on reverse side correspond with circled numbers.

1 Client Information				4 Matrix				5 Analyses Requested					
Facility SS#307233-OML G-R#385876 Global ID#T0600196622				<input type="checkbox"/> Sediment <input checked="" type="checkbox"/> Ground <input type="checkbox"/> Surface <input type="checkbox"/> Potable <input type="checkbox"/> NPDES <input type="checkbox"/> Air	Total Number of Containers BTEX + 8020 8021 <input type="checkbox"/> 8260 <input checked="" type="checkbox"/> TPH-GRO 8015 <input type="checkbox"/> 8260 <input type="checkbox"/> TPH-DRO 8015 <input checked="" type="checkbox"/> Silica Gel Cleanup TPH-DRO 8015 with Silica Gel Cleanup <input checked="" type="checkbox"/> 8020 Sulfate EPA 300.0 Oxygenates Total Alkalinity Method <u>CaCO3 Sm 20 2320D</u> Dissolved Sulfate Method <u>SM 20 4500 S2D</u> Calcium 6010 Ferrrous Iron Sm 20 3500 Fe B Dissolved methine (Rsk-175)								
Site Address 2259 FIRST STREET, LIVERMORE, CA													
Chevron CRASB Lead CRASB													
Consultant Office Grinc-Ryan, Inc., 6805 Sierra Court, Suite G, Dublin, CA 94568													
Consultant Project Mgr. Deanna E. Harding, deanna@grinc.com													
Consultant Phone # (925) 351-7444 x180													
Sampler J. Heron				SCR #: _____									

- Results in Dry Weight
- J value reporting needed
- Must meet lowest detection limits possible for 8260 compounds
- 8021 MTBE Confirmation
- Confirm highest hit by 8260
- Confirm all hits by 8260
- Run _____ oxy's on highest hit
- Run _____ oxy's on all hits

2 Sample Identification	Soil Depth	Collected		3 Grab	Composite	Soil	Water	Oil	Air	Total Number of Containers	5 Analyses Requested										6 Remarks	
		Date	Time								BTEX + 8020 8021	8260	TPH-GRO 8015	TPH-DRO 8015 Silica Gel Cleanup	TPH-DRO 8015 with Silica Gel Cleanup	8020 Sulfate EPA 300.0	Oxygenates	Total Alkalinity Method	Dissolved Sulfate Method	Calcium 6010		Ferrrous Iron Sm 20 3500 Fe B
GA		3/27/14		X			X			2	X	X										Please report DRO w/sgc using 10 grams of silica and also report 1 gram shake results Please forward the lab results directly to the Lead Consultant and cc:
MW-1			1205	X			X			8	X	X	X	X	X							
MW-2			0705	X			X			9	X	X	X	X	X							
MW-3			1050	X			X			9	X	X	X	X	X							
MW-4			1150	X			X			9	X	X	X	X	X							
MW-5			0830	X			X			8	X	X	X	X	X							
MW-6			0755	X			X			8	X	X	X	X	X							
MW-7			1230	X			X			17	X	X	X	X	X	X	X	X	X	X	X	
MW-8			1115	X			X			17	X	X	X	X	X	X	X	X	X	X	X	
MW-9			0840	X			X			17	X	X	X	X	X	X	X	X	X	X	X	
MW-10			0930	X			X			17	X	X	X	X	X	X	X	X	X	X	X	
MW-11			1025	X			X			17	X	X	X	X	X	X	X	X	X	X	X	
MW-12			0925	X			X			17	X	X	X	X	X	X	X	X	X	X	X	

7 Turnaround Time Requested (TAT) (please circle)

<u>Standard</u>	5 day	4 day
72 hour	48 hour	24 hour EDF/EDD

Relinquished by	Date 3/27/14	Time 1405	Received by	Date 3/27/14	Time 1405
Relinquished by _____	Date _____	Time _____	Received by _____	Date _____	Time _____

8 Data Package (circle if required)	Type I - Full	Type VI (Raw Data)	EDD (circle if required)	EDDFLAT (default)	Other: _____	Relinquished by Commercial Carrier:	UPS _____ FedEx _____ Other: _____	Received by _____	Date _____ Time _____	Temperature Upon Receipt _____ °C	Custody Seals Intact? Yes No
--	---------------	--------------------	--------------------------	-------------------	--------------	-------------------------------------	------------------------------------	-------------------	-----------------------	-----------------------------------	------------------------------

Chain-of-Custody-Record

Yes
 No

CHEVRON RTC SAMPLES

Chevron Facility #: 307233 Global ID#: T0600196622
 Facility Address: 2259 First Street, Livermore, CA
 Consultant Project #: 15-385876
 Consultant Name: GETTLER-RYAN INC.
 Address: 6805 SIERRA COURT, SUITE G, DUBLIN, CA 94568
 Project Contact: (Name) DEANNA L. HARDING (deanna@grinc.com)
 (Phone) 925-551-7555 (Fax) 925-551-7888

Chevron Contact: (Name) Rachel Molher
 (Phone) 510-242-4939
 Laboratory Name: Chevron RTC
 Laboratory Service Order: _____
 Laboratory Service Code: _____
 Samples Collected by: (Name) Jim Hearse
 Signature: _____

Sample Number	Number of Containers	Matrix S= Soil A=Air W=Water C=Charcoal	Sample Preservation	Date/Time	CHEVRON STUDY (NON-PRESERVED)	State Method: <input checked="" type="checkbox"/> CA <input type="checkbox"/> OR <input type="checkbox"/> WA <input type="checkbox"/> NW												Series	<input type="checkbox"/> CO	<input type="checkbox"/> UT	<input type="checkbox"/> ID	Remarks
MW-3	2	W	N/D	3/27/14 1050	X																	
MW-7	2	W		1230	X																	
MW-8	2	W		1115	X																	

Relinquished By (Signature) <i>[Signature]</i>	Organization Gettler-Ryan	Date/Time <u>3/27/14 1420</u>	Received By (Signature) <i>[Signature]</i>	Organization	Date/Time <u>3/27/14 2:15 PM</u>	Iced (Y/N)	Turn Around Time (Circle Choice) 24 Hrs. 48 Hrs. 5 Days 10 Days As Contracted
Relinquished By (Signature)	Organization	Date/Time	Received By (Signature)	Organization	Date/Time	Iced (Y/N)	
Relinquished By (Signature)	Organization	Date/Time	Received For Laboratory By (Signature)		Date/Time	Iced (Y/N)	

ATTACHMENT B

LABORATORY ANALYTICAL REPORT

ANALYTICAL RESULTS

Prepared by:

Eurofins Lancaster Laboratories Environmental
2425 New Holland Pike
Lancaster, PA 17601

Prepared for:

Chevron
L4310
6001 Bollinger Canyon Rd.
San Ramon CA 94583

April 14, 2014

Project: 307233

Submittal Date: 03/28/2014

Group Number: 1462904

PO Number: 0015141332

Release Number: HOPKINS/CMACLEO

State of Sample Origin: CA

Client Sample Description

<u>Client Sample Description</u>	<u>Lancaster Labs (LL) #</u>
QA-T-140327 NA Water	7410935
MW-1-W-140327 Grab Groundwater	7410936
MW-1-W-140327 Grab Groundwater	7410937
MW-2-W-140327 Grab Groundwater	7410938
MW-2-W-140327 Grab Groundwater	7410939
MW-3-W-140327 Grab Groundwater	7410940
MW-3-W-140327 Grab Groundwater	7410941
MW-4-W-140327 Grab Groundwater	7410942
MW-4-W-140327 Grab Groundwater	7410943
MW-5-W-140327 Grab Groundwater	7410944
MW-5-W-140327 Grab Groundwater	7410945
MW-6-W-140327 Grab Groundwater	7410946
MW-6-W-140327 Grab Groundwater	7410947
MW-7-W-140327 Grab Groundwater	7410948
MW-7-W-140327 Grab Groundwater	7410949
MW-8-W-140327 Grab Groundwater	7410950
MW-8-W-140327 Grab Groundwater	7410951
MW-9-W-140327 Grab Groundwater	7410952
MW-9-W-140327 Grab Groundwater	7410953
MW-10-W-140327 Grab Groundwater	7410954
MW-10-W-140327 Grab Groundwater	7410955
MW-11-W-140327 Grab Groundwater	7410956
MW-11-W-140327 Grab Groundwater	7410957
MW-12-W-140327 Grab Groundwater	7410958
MW-12-W-140327 Grab Groundwater	7410959

The specific methodologies used in obtaining the enclosed analytical results are indicated on the Laboratory Sample Analysis Record.

ELECTRONIC COPY TO	Gettler-Ryan Inc.	Attn: Gettler Ryan
ELECTRONIC COPY TO	Chevron c/o CRA	Attn: Report Contact
ELECTRONIC COPY TO	Chevron	Attn: Anna Avina
ELECTRONIC COPY TO	CRA	Attn: Brian Silva

Respectfully Submitted,



Amek Carter
Specialist

(717) 556-7252

Sample Description: QA-T-140327 NA Water
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410935
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014

Chevron

Submitted: 03/28/2014 09:25

L4310

Reported: 04/14/2014 12:56

6001 Bollinger Canyon Rd.
San Ramon CA 94583

FSLQA

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	N.D.	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B ug/l ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	N.D.	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 07:44	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 07:44	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 12:05	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 12:05	Marie D Beamenderfer	1

Sample Description: MW-1-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410936
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 12:05 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL01

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	N.D.	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	N.D.	50	1
GC Petroleum SW-846 8015B ug/l					
Hydrocarbons w/Si					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1
The reverse surrogate, capric acid, is present at <1%.					
The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	D140913AA	04/01/2014 22:30	Brett W Kenyon	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	D140913AA	04/01/2014 22:30	Brett W Kenyon	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 12:29	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 12:29	Marie D Beamenderfer	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 16:42	Christine E Dolman	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-1-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410937
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 12:05 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ01

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/02/2014 23:06	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-2-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410938
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 07:05 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL02

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	N.D.	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	N.D.	50	1
GC Petroleum SW-846 8015B ug/l					
Hydrocarbons w/Si					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1
The reverse surrogate, capric acid, is present at <1%.					
The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 08:06	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 08:06	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 12:54	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 12:54	Marie D Beamenderfer	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 17:04	Christine E Dolman	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-2-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410939
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 07:05 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ02

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	91	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/02/2014 23:27	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-3-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410940
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 10:50 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL03

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	N.D.	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B ug/l ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	N.D.	50	1
GC Petroleum SW-846 8015B ug/l ug/l					
Hydrocarbons w/Si					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1
The reverse surrogate, capric acid, is present at <1%.					
The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 09:33	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 09:33	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 13:18	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 13:18	Marie D Beamenderfer	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 17:26	Christine E Dolman	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-3-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410941
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 10:50 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ03

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	660	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/02/2014 23:49	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-4-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410942
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 11:50 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL04

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B					
10943	Benzene	71-43-2	2	0.5	1
10943	Ethylbenzene	100-41-4	4	0.5	1
10943	Toluene	108-88-3	0.8	0.5	1
10943	Xylene (Total)	1330-20-7	3	0.5	1
GC Volatiles SW-846 8015B					
01728	TPH-GRO N. CA water C6-C12	n.a.	3,000	50	1
GC Petroleum SW-846 8015B					
Hydrocarbons w/Si					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	530	50	1
The reverse surrogate, capric acid, is present at <1%.					
The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 09:55	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 09:55	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 19:27	Laura M Krieger	1
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 19:27	Laura M Krieger	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 17:49	Christine E Dolman	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-4-W-140327 Grab Groundwater
 Facility# 307233 Job# 385876 GRD
 2259 First St-Livermore T0600196622

LL Sample # WW 7410943
 LL Group # 1462904
 Account # 10904

Project Name: 307233

Collected: 03/27/2014 11:50 by JH Chevron
 Submitted: 03/28/2014 09:25 L4310
 Reported: 04/14/2014 12:56 6001 Bollinger Canyon Rd.
 San Ramon CA 94583

FSQ04

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	750	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
 All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 00:11	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-5-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410944
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 08:30 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL05

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B			ug/l	ug/l	
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	N.D.	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B			ug/l	ug/l	
01728	TPH-GRO N. CA water C6-C12	n.a.	N.D.	50	1
GC Petroleum SW-846 8015B			ug/l	ug/l	
Hydrocarbons w/Si					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1
The reverse surrogate, capric acid, is present at <1%.					
The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140931AA	04/03/2014 07:56	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140931AA	04/03/2014 07:56	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 13:43	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 13:43	Marie D Beamenderfer	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 18:11	Christine E Dolman	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-5-W-140327 Grab Groundwater
 Facility# 307233 Job# 385876 GRD
 2259 First St-Livermore T0600196622

LL Sample # WW 7410945
 LL Group # 1462904
 Account # 10904

Project Name: 307233

Collected: 03/27/2014 08:30 by JH Chevron
 Submitted: 03/28/2014 09:25 L4310
 Reported: 04/14/2014 12:56 6001 Bollinger Canyon Rd.
 San Ramon CA 94583

FSQ05

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
 All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 00:32	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-6-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410946
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 07:55 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL06

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	0.6	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	870	50	1
GC Petroleum SW-846 8015B ug/l					
Hydrocarbons w/Si					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	160	50	1
The reverse surrogate, capric acid, is present at <1%.					
The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 10:17	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 10:17	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 14:08	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 14:08	Marie D Beamenderfer	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 18:34	Christine E Dolman	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-6-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410947
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 07:55 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ06

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	160	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 00:54	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-7-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410948
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 12:30 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL07

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l ug/l					
10943	Benzene	71-43-2	2,900	50	100
10943	Ethylbenzene	100-41-4	440	5	10
10943	Toluene	108-88-3	56	5	10
10943	Xylene (Total)	1330-20-7	250	5	10
GC Volatiles SW-846 8015B ug/l ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	18,000	500	10
GC Miscellaneous RSKSOP-175 modified ug/l ug/l					
07105	Methane	74-82-8	11,000	300	100
GC Petroleum Hydrocarbons w/Si SW-846 8015B ug/l ug/l					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	42,000	180	5
The reverse surrogate, capric acid, is present at <1%. The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					
Metals SW-846 6010B ug/l ug/l					
01750	Calcium	7440-70-2	100,000	33.4	1
Wet Chemistry EPA 300.0 ug/l ug/l					
00228	Sulfate	14808-79-8	72,000	3,000	10
SM 2320 B-1997 ug/l as CaCO3 ug/l as CaCO3					
12150	Total Alkalinity	n.a.	540,000	700	1
SM 3500-Fe B modified-1997 ug/l ug/l					
08344	Ferrous Iron	n.a.	9,500	250	25
SM 4500-S2 D-2000 ug/l ug/l					
10499	Dissolved Sulfide	n.a.	300	54	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Sample Description: MW-7-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410948
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 12:30 by JH

Chevron

L4310

Submitted: 03/28/2014 09:25

6001 Bollinger Canyon Rd.

Reported: 04/14/2014 12:56

San Ramon CA 94583

FSL07

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 10:39	Anita M Dale	10
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 11:01	Anita M Dale	100
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 10:39	Anita M Dale	10
01163	GC/MS VOA Water Prep	SW-846 5030B	2	F140932AA	04/03/2014 11:01	Anita M Dale	100
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14091A20A	04/02/2014 20:16	Marie D Beamenderfer	10
01146	GC VOA Water Prep	SW-846 5030B	1	14091A20A	04/02/2014 20:16	Marie D Beamenderfer	10
07105	Volatile Headspace Hydrocarbon	RSKSOP-175 modified	1	140930031A	04/04/2014 17:15	Tyler O Griffin	100
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 20:25	Christine E Dolman	5
11180	Low Vol Ext(W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1
01750	Calcium	SW-846 6010B	1	140911848002	04/06/2014 05:59	Tara L Snyder	1
01848	WW SW846 ICP Digest (tot rec)	SW-846 3005A	1	140911848002	04/02/2014 08:57	Micaela L Dishong	1
00228	Sulfate	EPA 300.0	1	14091347901A	04/02/2014 07:36	Sandra J Miller	10
12150	Total Alkalinity	SM 2320 B-1997	1	14091004103A	04/01/2014 21:10	Michele L Graham	1
08344	Ferrous Iron	SM 3500-Fe B modified-1997	1	14090834401A	03/31/2014 19:05	Daniel S Smith	25
10499	Dissolved Sulfide	SM 4500-S2 D-2000	1	14091023002A	04/01/2014 12:15	Susan E Hibner	1

Sample Description: MW-7-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410949
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 12:30 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ07

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	43,000	360	10

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 18:46	Glorines Suarez-Rivera	10
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-8-W-140327 Grab Groundwater
Facility# 307233 **Job#** 385876 GRD
 2259 First St-Livermore T0600196622

LL Sample # WW 7410950
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 11:15 by JH Chevron
 L4310
 Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
 Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL08

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l ug/l					
10943	Benzene	71-43-2	1	0.5	1
10943	Ethylbenzene	100-41-4	15	0.5	1
10943	Toluene	108-88-3	1	0.5	1
10943	Xylene (Total)	1330-20-7	2	0.5	1
GC Volatiles SW-846 8015B ug/l ug/l					
01728	TPH-GRO N. CA water	C6-C12 n.a.	6,500	250	5
GC Miscellaneous RSKSOP-175 modified ug/l ug/l					
07105	Methane	74-82-8	3,400	60	20
GC Petroleum Hydrocarbons w/Si SW-846 8015B ug/l ug/l					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	38,000	170	5
The reverse surrogate, capric acid, is present at <1%. The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					
Metals SW-846 6010B ug/l ug/l					
01750	Calcium	7440-70-2	31,900	33.4	1
Wet Chemistry EPA 300.0 ug/l ug/l					
00228	Sulfate	14808-79-8	N.D.	1,500	5
SM 2320 B-1997 ug/l as CaCO3 ug/l as CaCO3					
12150	Total Alkalinity	n.a.	185,000	700	1
SM 3500-Fe B modified-1997 ug/l ug/l					
08344	Ferrous Iron	n.a.	9,600	250	25
SM 4500-S2 D-2000 ug/l ug/l					
10499	Dissolved Sulfide	n.a.	240	54	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Sample Description: MW-8-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410950
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 11:15 by JH

Chevron

L4310

Submitted: 03/28/2014 09:25

6001 Bollinger Canyon Rd.

Reported: 04/14/2014 12:56

San Ramon CA 94583

FSL08

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 11:23	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 11:23	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14092B20A	04/03/2014 20:49	Marie D Beamenderfer	5
01146	GC VOA Water Prep	SW-846 5030B	1	14092B20A	04/03/2014 20:49	Marie D Beamenderfer	5
07105	Volatile Headspace Hydrocarbon	RSKSOP-175 modified	1	140930031A	04/04/2014 17:32	Elizabeth J Marin	20
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 20:48	Christine E Dolman	5
11180	Low Vol Ext(W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1
01750	Calcium	SW-846 6010B	1	140911848002	04/06/2014 06:03	Tara L Snyder	1
01848	WW SW846 ICP Digest (tot rec)	SW-846 3005A	1	140911848002	04/02/2014 08:57	Micaela L Dishong	1
00228	Sulfate	EPA 300.0	1	14093347601A	04/03/2014 13:58	Sandra J Miller	5
12150	Total Alkalinity	SM 2320 B-1997	1	14091004103A	04/01/2014 21:45	Michele L Graham	1
08344	Ferrous Iron	SM 3500-Fe B modified-1997	1	14090834401A	03/31/2014 19:05	Daniel S Smith	25
10499	Dissolved Sulfide	SM 4500-S2 D-2000	1	14091023002A	04/01/2014 12:15	Susan E Hibner	1

Sample Description: MW-8-W-140327 Grab Groundwater
 Facility# 307233 Job# 385876 GRD
 2259 First St-Livermore T0600196622

LL Sample # WW 7410951
 LL Group # 1462904
 Account # 10904

Project Name: 307233

Collected: 03/27/2014 11:15 by JH Chevron
 Submitted: 03/28/2014 09:25 L4310
 Reported: 04/14/2014 12:56 6001 Bollinger Canyon Rd.
 San Ramon CA 94583

FSQ08

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	34,000	340	10

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
 All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 19:08	Glorines Suarez-Rivera	10
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: **MW-9-W-140327 Grab Groundwater**
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # **WW 7410952**
 LL Group # **1462904**
 Account # **10904**

Project Name: **307233**

Collected: 03/27/2014 08:40 by JH Chevron
 L4310
 Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
 Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL09

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	N.D.	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B ug/l ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	N.D.	50	1
GC Miscellaneous RSKSOP-175 modified ug/l ug/l					
07105	Methane	74-82-8	9.2	3.0	1
GC Petroleum SW-846 8015B ug/l ug/l					
Hydrocarbons w/Si					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1
The reverse surrogate, capric acid, is present at <1%. The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					
Metals SW-846 6010B ug/l ug/l					
01750	Calcium	7440-70-2	132,000	33.4	1
Wet Chemistry EPA 300.0 ug/l ug/l					
00228	Sulfate	14808-79-8	110,000	6,000	20
SM 2320 B-1997 ug/l as CaCO3 ug/l as CaCO3					
12150	Total Alkalinity	n.a.	303,000	700	1
SM 3500-Fe B modified-1997 ug/l ug/l					
08344	Ferrous Iron	n.a.	82	10	1
SM 4500-S2 D-2000 ug/l ug/l					
10499	Dissolved Sulfide	n.a.	N.D.	54	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Sample Description: MW-9-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410952
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 08:40 by JH

Chevron

L4310

Submitted: 03/28/2014 09:25

6001 Bollinger Canyon Rd.

Reported: 04/14/2014 12:56

San Ramon CA 94583

FSL09

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 12:07	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 12:07	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14092B20A	04/03/2014 12:58	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14092B20A	04/03/2014 12:58	Marie D Beamenderfer	1
07105	Volatile Headspace Hydrocarbon	RSKSOP-175 modified	1	140930031A	04/03/2014 21:55	Elizabeth J Marin	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910015A	04/08/2014 18:56	Christine E Dolman	1
11180	Low Vol Ext(W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1
01750	Calcium	SW-846 6010B	1	140911848002	04/06/2014 06:07	Tara L Snyder	1
01848	WW SW846 ICP Digest (tot rec)	SW-846 3005A	1	140911848002	04/02/2014 08:57	Micaela L Dishong	1
00228	Sulfate	EPA 300.0	1	14093347601B	04/05/2014 22:24	Clinton M Wilson	20
12150	Total Alkalinity	SM 2320 B-1997	1	14091004103A	04/01/2014 19:57	Michele L Graham	1
08344	Ferrous Iron	SM 3500-Fe B modified-1997	1	14090834401A	03/31/2014 19:05	Daniel S Smith	1
10499	Dissolved Sulfide	SM 4500-S2 D-2000	1	14091023002A	04/01/2014 12:15	Susan E Hibner	1

Sample Description: MW-9-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410953
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 08:40 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ09

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	N.D.	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 01:16	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-10-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410954
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 09:30 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL10

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	12	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	3	0.5	1
GC Volatiles SW-846 8015B ug/l ug/l					
01728	TPH-GRO N. CA water C6-C12	n.a.	3,200	500	10
GC Miscellaneous RSKSOP-175 modified ug/l ug/l					
07105	Methane	74-82-8	3,000	60	20
GC Petroleum Hydrocarbons w/Si SW-846 8015B ug/l ug/l					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	2,400	50	1
The reverse surrogate, capric acid, is present at <1%. The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					
Metals SW-846 6010B ug/l ug/l					
01750	Calcium	7440-70-2	23,600	33.4	1
Wet Chemistry EPA 300.0 ug/l ug/l					
00228	Sulfate	14808-79-8	8,300	1,500	5
SM 2320 B-1997 ug/l as CaCO3 ug/l as CaCO3					
12150	Total Alkalinity	n.a.	216,000	700	1
SM 3500-Fe B modified-1997 ug/l ug/l					
08344	Ferrous Iron	n.a.	2,200	100	10
SM 4500-S2 D-2000 ug/l ug/l					
10499	Dissolved Sulfide	n.a.	120	54	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Sample Description: MW-10-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410954
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 09:30 by JH

Chevron

L4310

Submitted: 03/28/2014 09:25

6001 Bollinger Canyon Rd.

Reported: 04/14/2014 12:56

San Ramon CA 94583

FSL10

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 12:29	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 12:29	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14092B20A	04/03/2014 21:17	Marie D Beamenderfer	10
01146	GC VOA Water Prep	SW-846 5030B	1	14092B20A	04/03/2014 21:17	Marie D Beamenderfer	10
07105	Volatile Headspace Hydrocarbon	RSKSOP-175 modified	1	140930031A	04/04/2014 17:49	Elizabeth J Marin	20
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	2	140910015A	04/08/2014 19:18	Glorines Suarez-Rivera	1
11180	Low Vol Ext(W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1
01750	Calcium	SW-846 6010B	1	140911848002	04/06/2014 06:11	Tara L Snyder	1
01848	WW SW846 ICP Digest (tot rec)	SW-846 3005A	1	140911848002	04/02/2014 08:57	Micaela L Dishong	1
00228	Sulfate	EPA 300.0	1	14093347601B	04/03/2014 16:24	Sandra J Miller	5
12150	Total Alkalinity	SM 2320 B-1997	1	14091004103A	04/01/2014 19:44	Michele L Graham	1
08344	Ferrous Iron	SM 3500-Fe B modified-1997	1	14090834401A	03/31/2014 19:05	Daniel S Smith	10
10499	Dissolved Sulfide	SM 4500-S2 D-2000	1	14091023002A	04/01/2014 12:15	Susan E Hibner	1

Sample Description: MW-10-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410955
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 09:30 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ10

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	2,500	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 01:37	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-11-W-140327 Grab Groundwater
Facility# 307233 **Job#** 385876 GRD
 2259 First St-Livermore T0600196622

LL Sample # WW 7410956
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 10:25 by JH Chevron
 L4310
 Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
 Reported: 04/14/2014 12:56 San Ramon CA 94583

FSL11

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles SW-846 8260B ug/l ug/l					
10943	Benzene	71-43-2	N.D.	0.5	1
10943	Ethylbenzene	100-41-4	N.D.	0.5	1
10943	Toluene	108-88-3	N.D.	0.5	1
10943	Xylene (Total)	1330-20-7	N.D.	0.5	1
GC Volatiles SW-846 8015B ug/l ug/l					
01728	TPH-GRO N. CA water	C6-C12 n.a.	N.D.	50	1
GC Miscellaneous RSKSOP-175 modified ug/l ug/l					
07105	Methane	74-82-8	34	3.0	1
GC Petroleum Hydrocarbons w/Si SW-846 8015B ug/l ug/l					
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	77	50	1
The reverse surrogate, capric acid, is present at <1%. The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					
Metals SW-846 6010B ug/l ug/l					
01750	Calcium	7440-70-2	36,200	33.4	1
Wet Chemistry EPA 300.0 ug/l ug/l					
00228	Sulfate	14808-79-8	47,600	1,500	5
SM 2320 B-1997 ug/l as CaCO3 ug/l as CaCO3					
12150	Total Alkalinity	n.a.	262,000	700	1
SM 3500-Fe B modified-1997 ug/l ug/l					
08344	Ferrous Iron	n.a.	280	10	1
SM 4500-S2 D-2000 ug/l ug/l					
10499	Dissolved Sulfide	n.a.	N.D.	54	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Sample Description: MW-11-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410956
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 10:25 by JH

Chevron

L4310

Submitted: 03/28/2014 09:25

6001 Bollinger Canyon Rd.

Reported: 04/14/2014 12:56

San Ramon CA 94583

FSL11

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 13:12	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 13:12	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14092B20A	04/03/2014 13:28	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14092B20A	04/03/2014 13:28	Marie D Beamenderfer	1
07105	Volatile Headspace Hydrocarbon	RSKSOP-175 modified	1	140930031A	04/03/2014 22:29	Elizabeth J Marin	1
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	2	140910015A	04/08/2014 19:41	Glorines Suarez-Rivera	1
11180	Low Vol Ext(W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1
01750	Calcium	SW-846 6010B	1	140911848002	04/06/2014 06:21	Tara L Snyder	1
01848	WW SW846 ICP Digest (tot rec)	SW-846 3005A	1	140911848002	04/02/2014 08:57	Micaela L Dishong	1
00228	Sulfate	EPA 300.0	1	14093347601B	04/03/2014 15:35	Sandra J Miller	5
12150	Total Alkalinity	SM 2320 B-1997	1	14091004103A	04/01/2014 19:24	Michele L Graham	1
08344	Ferrous Iron	SM 3500-Fe B modified-1997	1	14090834401A	03/31/2014 19:05	Daniel S Smith	1
10499	Dissolved Sulfide	SM 4500-S2 D-2000	1	14091023002A	04/01/2014 12:15	Susan E Hibner	1

Sample Description: MW-11-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410957
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 10:25 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ11

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	230	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA
All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 01:59	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Sample Description: MW-12-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410958
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 09:25 by JH

Chevron

L4310

Submitted: 03/28/2014 09:25

6001 Bollinger Canyon Rd.

Reported: 04/14/2014 12:56

San Ramon CA 94583

FSL12

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
GC/MS Volatiles					
	SW-846 8260B		ug/l	ug/l	
10943	Benzene	71-43-2	5	0.5	1
10943	Ethylbenzene	100-41-4	1	0.5	1
10943	Toluene	108-88-3	2	0.5	1
10943	Xylene (Total)	1330-20-7	2	0.5	1
GC Volatiles					
	SW-846 8015B		ug/l	ug/l	
01728	TPH-GRO N. CA water C6-C12	n.a.	2,100	50	1
GC Miscellaneous					
	RSKSOP-175 modified		ug/l	ug/l	
07105	Methane	74-82-8	780	15	5
GC Petroleum Hydrocarbons w/Si					
	SW-846 8015B		ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	230	50	1
The reverse surrogate, capric acid, is present at <1%. The LCSD was lost during the initial 10 gram silica gel cleanup. The quick silica gelled LCSD was used to perform the 10gram silica gel cleanup. The LCSD recovery is in spec.					
Metals					
	SW-846 6010B		ug/l	ug/l	
01750	Calcium	7440-70-2	71,800	33.4	1
Wet Chemistry					
	EPA 300.0		ug/l	ug/l	
00228	Sulfate	14808-79-8	3,100	1,500	5
	SM 2320 B-1997		ug/l as CaCO3	ug/l as CaCO3	
12150	Total Alkalinity	n.a.	580,000	700	1
	SM 3500-Fe B modified-1997		ug/l	ug/l	
08344	Ferrous Iron	n.a.	4,300	250	25
	SM 4500-S2 D-2000		ug/l	ug/l	
10499	Dissolved Sulfide	n.a.	N.D.	54	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Sample Description: MW-12-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410958
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 09:25 by JH

Chevron

L4310

Submitted: 03/28/2014 09:25

6001 Bollinger Canyon Rd.

Reported: 04/14/2014 12:56

San Ramon CA 94583

FSL12

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
10943	BTEX 8260B Water	SW-846 8260B	1	F140932AA	04/03/2014 13:34	Anita M Dale	1
01163	GC/MS VOA Water Prep	SW-846 5030B	1	F140932AA	04/03/2014 13:34	Anita M Dale	1
01728	TPH-GRO N. CA water C6-C12	SW-846 8015B	1	14092B20A	04/03/2014 13:56	Marie D Beamenderfer	1
01146	GC VOA Water Prep	SW-846 5030B	1	14092B20A	04/03/2014 13:56	Marie D Beamenderfer	1
07105	Volatile Headspace Hydrocarbon	RSKSOP-175 modified	1	140930031A	04/04/2014 18:06	Elizabeth J Marin	5
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	2	140910015A	04/08/2014 20:03	Glorines Suarez-Rivera	1
11180	Low Vol Ext(W) w/SG	SW-846 3510C	1	140910015A	04/01/2014 22:00	Elaine F Stoltzfus	1
01750	Calcium	SW-846 6010B	1	140911848002	04/06/2014 06:25	Tara L Snyder	1
01848	WW SW846 ICP Digest (tot rec)	SW-846 3005A	1	140911848002	04/02/2014 08:57	Micaela L Dishong	1
00228	Sulfate	EPA 300.0	1	14093347601B	04/03/2014 15:51	Sandra J Miller	5
12150	Total Alkalinity	SM 2320 B-1997	1	14091004103B	04/01/2014 20:56	Michele L Graham	1
08344	Ferrous Iron	SM 3500-Fe B modified-1997	1	14090834401A	03/31/2014 19:05	Daniel S Smith	25
10499	Dissolved Sulfide	SM 4500-S2 D-2000	1	14091023002A	04/01/2014 12:15	Susan E Hibner	1

Sample Description: MW-12-W-140327 Grab Groundwater
Facility# 307233 Job# 385876 GRD
2259 First St-Livermore T0600196622

LL Sample # WW 7410959
LL Group # 1462904
Account # 10904

Project Name: 307233

Collected: 03/27/2014 09:25 by JH Chevron
L4310
Submitted: 03/28/2014 09:25 6001 Bollinger Canyon Rd.
Reported: 04/14/2014 12:56 San Ramon CA 94583

FSQ12

CAT No.	Analysis Name	CAS Number	As Received Result	As Received Method Detection Limit	Dilution Factor
	GC Petroleum Hydrocarbons w/Si	SW-846 8015B	ug/l	ug/l	
06610	TPH-DRO CA C10-C28 w/ Si Gel	n.a.	1,000	50	1

General Sample Comments

CA ELAP Lab Certification No. 2792; CA NELAP Lab Certification No. 10276CA

All QC is compliant unless otherwise noted. Please refer to the Quality Control Summary for overall QC performance data and associated samples.

Laboratory Sample Analysis Record

CAT No.	Analysis Name	Method	Trial#	Batch#	Analysis Date and Time	Analyst	Dilution Factor
06610	TPH-DRO CA C10-C28 w/ Si Gel	SW-846 8015B	1	140910017A	04/03/2014 02:21	Glorines Suarez-Rivera	1
11180	Low Vol Ext (W) w/SG	SW-846 3510C	1	140910017A	04/01/2014 22:00	Elaine F Stoltzfus	1

Quality Control Summary

Client Name: Chevron
Reported: 04/14/14 at 12:56 PM

Group Number: 1462904

Matrix QC may not be reported if insufficient sample or site-specific QC samples were not submitted. In these situations, to demonstrate precision and accuracy at a batch level, a LCS/LCSD was performed, unless otherwise specified in the method.

All Inorganic Initial Calibration and Continuing Calibration Blanks met acceptable method criteria unless otherwise noted on the Analysis Report.

Laboratory Compliance Quality Control

<u>Analysis Name</u>	<u>Blank Result</u>	<u>Blank MDL</u>	<u>Report Units</u>	<u>LCS %REC</u>	<u>LCSD %REC</u>	<u>LCS/LCSD Limits</u>	<u>RPD</u>	<u>RPD Max</u>
Batch number: D140913AA	Sample number(s): 7410936							
Benzene	N.D.	0.5	ug/l	90		78-120		
Ethylbenzene	N.D.	0.5	ug/l	90		79-120		
Toluene	N.D.	0.5	ug/l	96		80-120		
Xylene (Total)	N.D.	0.5	ug/l	92		80-120		
Batch number: F140931AA	Sample number(s): 7410944							
Benzene	N.D.	0.5	ug/l	102		78-120		
Ethylbenzene	N.D.	0.5	ug/l	101		79-120		
Toluene	N.D.	0.5	ug/l	101		80-120		
Xylene (Total)	N.D.	0.5	ug/l	102		80-120		
Batch number: F140932AA	Sample number(s): 7410935, 7410938, 7410940, 7410942, 7410946, 7410948, 7410950, 7410952, 7410954, 7410956, 7410958							
Benzene	N.D.	0.5	ug/l	94		78-120		
Ethylbenzene	N.D.	0.5	ug/l	90		79-120		
Toluene	N.D.	0.5	ug/l	93		80-120		
Xylene (Total)	N.D.	0.5	ug/l	94		80-120		
Batch number: 14091A20A	Sample number(s): 7410935-7410936, 7410938, 7410940, 7410942, 7410944, 7410946, 7410948							
TPH-GRO N. CA water C6-C12	N.D.	50.	ug/l	98	96	80-139	2	30
Batch number: 14092B20A	Sample number(s): 7410950, 7410952, 7410954, 7410956, 7410958							
TPH-GRO N. CA water C6-C12	N.D.	50.	ug/l	113	112	80-139	1	30
Batch number: 140930031A	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958							
Methane	N.D.	3.0	ug/l	105		80-120		
Batch number: 140910015A	Sample number(s): 7410936, 7410938, 7410940, 7410942, 7410944, 7410946, 7410948, 7410950, 7410952, 7410954, 7410956, 7410958							
TPH-DRO CA C10-C28 w/ Si Gel	N.D.	32.	ug/l	86	92	43-120	7	20
Batch number: 140910017A	Sample number(s): 7410937, 7410939, 7410941, 7410943, 7410945, 7410947, 7410949, 7410951, 7410953, 7410955, 7410957, 7410959							
TPH-DRO CA C10-C28 w/ Si Gel	N.D.	32.	ug/l	99	96	43-120	3	20
Batch number: 140911848002	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958							
Calcium	N.D.	33.4	ug/l	101		90-112		
Batch number: 14091347901A	Sample number(s): 7410948							

*- Outside of specification

- (1) The result for one or both determinations was less than five times the LOQ.
- (2) The unspiked result was more than four times the spike added.

Quality Control Summary

Client Name: Chevron Group Number: 1462904
Reported: 04/14/14 at 12:56 PM

<u>Analysis Name</u>	<u>Blank Result</u>	<u>Blank MDL</u>	<u>Report Units</u>	<u>LCS %REC</u>	<u>LCSD %REC</u>	<u>LCS/LCSD Limits</u>	<u>RPD</u>	<u>RPD Max</u>
Sulfate	N.D.	300.	ug/l	103		90-110		
Batch number: 14093347601A Sulfate	Sample number(s): 7410950 N.D. 300. ug/l 92 90-110							
Batch number: 14093347601B Sulfate	Sample number(s): 7410952, 7410954, 7410956, 7410958 N.D. 300. ug/l 92 90-110							
Batch number: 14090834401A Ferrous Iron	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958 N.D. 10. ug/l 99 93-105							
Batch number: 14091004103A Total Alkalinity	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956 N.D. 700. ug/l as 97 90-110 CaCO3							
Batch number: 14091004103B Total Alkalinity	Sample number(s): 7410958 N.D. 700. ug/l as 97 90-110 CaCO3							
Batch number: 14091023002A Dissolved Sulfide	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958 N.D. 54. ug/l 97 90-110							

Sample Matrix Quality Control

Unspiked (UNSPK) = the sample used in conjunction with the matrix spike
Background (BKG) = the sample used in conjunction with the duplicate

<u>Analysis Name</u>	<u>MS %REC</u>	<u>MSD %REC</u>	<u>MS/MSD Limits</u>	<u>RPD</u>	<u>RPD MAX</u>	<u>BKG Conc</u>	<u>DUP Conc</u>	<u>DUP RPD</u>	<u>Dup RPD Max</u>
Batch number: D140913AA	Sample number(s): 7410936 UNSPK: 7410936								
Benzene	103	97	72-134	6	30				
Ethylbenzene	103	97	71-134	5	30				
Toluene	110	104	80-125	6	30				
Xylene (Total)	106	101	79-125	5	30				
Batch number: F140931AA	Sample number(s): 7410944 UNSPK: 7410944								
Benzene	108	106	72-134	2	30				
Ethylbenzene	105	103	71-134	1	30				
Toluene	106	102	80-125	4	30				
Xylene (Total)	106	103	79-125	2	30				
Batch number: F140932AA	Sample number(s): 7410935, 7410938, 7410940, 7410942, 7410946, 7410948, 7410950, 7410952, 7410954, 7410956, 7410958 UNSPK: 7410938								
Benzene	104	101	72-134	2	30				
Ethylbenzene	104	100	71-134	3	30				
Toluene	105	101	80-125	3	30				
Xylene (Total)	103	101	79-125	2	30				
Batch number: 140930031A Methane	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958 UNSPK: 7410948								
	-6461	-5424	35-157	8	20				
	(2)	(2)							

*- Outside of specification

- (1) The result for one or both determinations was less than five times the LOQ.
- (2) The unspiked result was more than four times the spike added.

Quality Control Summary

Client Name: Chevron Group Number: 1462904
Reported: 04/14/14 at 12:56 PM

Sample Matrix Quality Control

Unspiked (UNSPK) = the sample used in conjunction with the matrix spike
Background (BKG) = the sample used in conjunction with the duplicate

Analysis Name	MS %REC	MSD %REC	MS/MSD Limits	RPD RPD	RPD MAX	BKG Conc	DUP Conc	DUP RPD	Dup RPD Max
Batch number: 140911848002	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958 UNSPK: P411496 BKG: P411496								
Calcium	64 (2)	132 (2)	75-125	1	20	221,000	220,000	1	20
Batch number: 14091347901A	Sample number(s): 7410948 UNSPK: P411184 BKG: P411184								
Sulfate	101		90-110			219,000	214,000	2 (1)	20
Batch number: 14093347601A	Sample number(s): 7410950 UNSPK: 7410950 BKG: 7410950								
Sulfate	94		90-110			N.D.	1,500	200* (1)	20
Batch number: 14093347601B	Sample number(s): 7410952, 7410954, 7410956, 7410958 UNSPK: 7410954 BKG: 7410954								
Sulfate	94		90-110			8,300	8,000	3 (1)	20
Batch number: 14090834401A	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958 UNSPK: P410804 BKG: P410804								
Ferrous Iron	99	72*	81-112	23*	6	140	140	4 (1)	5
Batch number: 14091004103A	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956 UNSPK: 7410956 BKG: 7410956								
Total Alkalinity	70		10-159			262,000	266,000	2	5
Batch number: 14091004103B	Sample number(s): 7410958 UNSPK: 7410956 BKG: 7410958								
Total Alkalinity	70		10-159			580,000	585,000	1	5
Batch number: 14091023002A	Sample number(s): 7410948, 7410950, 7410952, 7410954, 7410956, 7410958 UNSPK: P410804 BKG: P410804								
Dissolved Sulfide	56	62	42-131	10	16	N.D.	N.D.	0 (1)	5

Surrogate Quality Control

Surrogate recoveries which are outside of the QC window are confirmed unless attributed to dilution or otherwise noted on the Analysis Report.

Analysis Name: UST VOCs by 8260B - Water

Batch number: D140913AA

	Dibromofluoromethane	1,2-Dichloroethane-d4	Toluene-d8	4-Bromofluorobenzene
7410936	93	97	102	97
Blank	94	99	104	97
LCS	90	97	103	98
MS	91	103	102	99
MSD	90	101	102	99
Limits:	80-116	77-113	80-113	78-113

Analysis Name: UST VOCs by 8260B - Water

Batch number: F140931AA

	Dibromofluoromethane	1,2-Dichloroethane-d4	Toluene-d8	4-Bromofluorobenzene

*- Outside of specification

- (1) The result for one or both determinations was less than five times the LOQ.
- (2) The unspiked result was more than four times the spike added.

Quality Control Summary

Client Name: Chevron
Reported: 04/14/14 at 12:56 PM

Group Number: 1462904

Surrogate Quality Control

7410944	101	100	99	99
Blank	100	98	98	97
LCS	98	99	100	101
MS	100	99	99	100
MSD	99	100	98	100

Limits: 80-116 77-113 80-113 78-113

Analysis Name: UST VOCs by 8260B - Water
Batch number: F140932AA

	Dibromofluoromethane	1,2-Dichloroethane-d4	Toluene-d8	4-Bromofluorobenzene
7410935	100	99	99	98
7410938	100	99	100	99
7410940	100	102	99	97
7410942	98	97	100	102
7410946	100	98	100	101
7410948	100	97	99	99
7410950	99	96	100	106
7410952	99	98	99	97
7410954	99	97	100	102
7410956	101	99	100	99
7410958	98	99	100	106
Blank	100	100	99	96
LCS	103	107	98	102
MS	100	101	98	99
MSD	99	99	101	99

Limits: 80-116 77-113 80-113 78-113

Analysis Name: TPH-GRO N. CA water C6-C12
Batch number: 14091A20A
Trifluorotoluene-F

7410935	82
7410936	80
7410938	78
7410940	78
7410942	135
7410944	79
7410946	92
7410948	96
Blank	83
LCS	87
LCSD	83

Limits: 63-135

Analysis Name: TPH-GRO N. CA water C6-C12
Batch number: 14092B20A
Trifluorotoluene-F

7410950	88
7410952	63
7410954	77
7410956	83

*- Outside of specification

- (1) The result for one or both determinations was less than five times the LOQ.
- (2) The unspiked result was more than four times the spike added.

Quality Control Summary

Client Name: Chevron
Reported: 04/14/14 at 12:56 PM

Group Number: 1462904

Surrogate Quality Control

7410958 119
Blank 83
LCS 85
LCSD 82

Limits: 63-135

Analysis Name: TPH-DRO CA C10-C28 w/ Si Gel
Batch number: 140910015A
Orthoterphenyl

7410936 90
7410938 105
7410940 96
7410942 94
7410944 99
7410946 79
7410948 193*
7410950 145*
7410952 93
7410954 97
7410956 100
7410958 79
Blank 90
LCS 91
LCSD 98

Limits: 46-131

Analysis Name: TPH-DRO CA C10-C28 w/ Si Gel
Batch number: 140910017A
Orthoterphenyl

7410937 105
7410939 104
7410941 104
7410943 105
7410945 101
7410947 101
7410949 275*
7410951 182*
7410953 102
7410955 104
7410957 106
7410959 100
Blank 110
LCS 113
LCSD 106

Limits: 46-131

Analysis Name: Volatile Headspace Hydrocarbon
Batch number: 140930031A
Propene

7410948 93

*- Outside of specification

- (1) The result for one or both determinations was less than five times the LOQ.
- (2) The unspiked result was more than four times the spike added.

Quality Control SummaryClient Name: Chevron
Reported: 04/14/14 at 12:56 PM

Group Number: 1462904

Surrogate Quality Control

7410950	95
7410952	81
7410954	89
7410956	71
7410958	72
Blank	97
LCS	98
MS	71
MSD	68

Limits: 42-131

*- Outside of specification

- (1) The result for one or both determinations was less than five times the LOQ.
- (2) The unspiked result was more than four times the spike added.

Explanation of Symbols and Abbreviations

The following defines common symbols and abbreviations used in reporting technical data:

RL	Reporting Limit	BMQL	Below Minimum Quantitation Level
N.D.	none detected	MPN	Most Probable Number
TNTC	Too Numerous To Count	CP Units	cobalt-chloroplatinate units
IU	International Units	NTU	nephelometric turbidity units
umhos/cm	micromhos/cm	ng	nanogram(s)
C	degrees Celsius	F	degrees Fahrenheit
meq	milliequivalents	lb.	pound(s)
g	gram(s)	kg	kilogram(s)
µg	microgram(s)	mg	milligram(s)
mL	milliliter(s)	L	liter(s)
m³	cubic meter(s)	µL	microliter(s)
		pg/L	picogram/liter

< less than - The number following the sign is the limit of quantitation, the smallest amount of analyte which can be reliably determined using this specific test.

> greater than

ppm parts per million - One ppm is equivalent to one milligram per kilogram (mg/kg), or one gram per million grams. For aqueous liquids, ppm is usually taken to be equivalent to milligrams per liter (mg/l), because one liter of water has a weight very close to a kilogram. For gases or vapors, one ppm is equivalent to one microliter per liter of gas.

ppb parts per billion

Dry weight basis Results printed under this heading have been adjusted for moisture content. This increases the analyte weight concentration to approximate the value present in a similar sample without moisture. All other results are reported on an as-received basis.

Data Qualifiers:

C – result confirmed by reanalysis.

J - estimated value – The result is \geq the Method Detection Limit (MDL) and $<$ the Limit of Quantitation (LOQ).

U.S. EPA CLP Data Qualifiers:

Organic Qualifiers

- A** TIC is a possible aldol-condensation product
- B** Analyte was also detected in the blank
- C** Pesticide result confirmed by GC/MS
- D** Compound quantitated on a diluted sample
- E** Concentration exceeds the calibration range of the instrument
- N** Presumptive evidence of a compound (TICs only)
- P** Concentration difference between primary and confirmation columns $>25\%$
- U** Compound was not detected
- X,Y,Z** Defined in case narrative

Inorganic Qualifiers

- B** Value is $<$ CRDL, but \geq IDL
- E** Estimated due to interference
- M** Duplicate injection precision not met
- N** Spike sample not within control limits
- S** Method of standard additions (MSA) used for calculation
- U** Compound was not detected
- W** Post digestion spike out of control limits
- *** Duplicate analysis not within control limits
- +** Correlation coefficient for MSA <0.995

Analytical test results meet all requirements of NELAC unless otherwise noted under the individual analysis.

Measurement uncertainty values, as applicable, are available upon request.

Tests results relate only to the sample tested. Clients should be aware that a critical step in a chemical or microbiological analysis is the collection of the sample. Unless the sample analyzed is truly representative of the bulk of material involved, the test results will be meaningless. If you have questions regarding the proper techniques of collecting samples, please contact us. We cannot be held responsible for sample integrity, however, unless sampling has been performed by a member of our staff. This report shall not be reproduced except in full, without the written approval of the laboratory.

Times are local to the area of activity. Parameters listed in the 40 CFR part 136 Table II as “analyze immediately” are not performed within 15 minutes.

WARRANTY AND LIMITS OF LIABILITY - In accepting analytical work, we warrant the accuracy of test results for the sample as submitted. THE FOREGOING EXPRESS WARRANTY IS EXCLUSIVE AND IS GIVEN IN LIEU OF ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED. WE DISCLAIM ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING A WARRANTY OF FITNESS FOR PARTICULAR PURPOSE AND WARRANTY OF MERCHANTABILITY. IN NO EVENT SHALL EUROFINS LANCASTER LABORATORIES ENVIRONMENTAL, LLC BE LIABLE FOR INDIRECT, SPECIAL, CONSEQUENTIAL, OR INCIDENTAL DAMAGES INCLUDING, BUT NOT LIMITED TO, DAMAGES FOR LOSS OF PROFIT OR GOODWILL REGARDLESS OF (A) THE NEGLIGENCE (EITHER SOLE OR CONCURRENT) OF EUROFINS LANCASTER LABORATORIES ENVIRONMENTAL AND (B) WHETHER EUROFINS LANCASTER LABORATORIES ENVIRONMENTAL HAS BEEN INFORMED OF THE POSSIBILITY OF SUCH DAMAGES. We accept no legal responsibility for the purposes for which the client uses the test results. No purchase order or other order for work shall be accepted by Eurofins Lancaster Laboratories Environmental which includes any conditions that vary from the Standard Terms and Conditions, and Eurofins Lancaster Laboratories Environmental hereby objects to any conflicting terms contained in any acceptance or order submitted by client.