SEMS-RM DOCID # 1167273

SECOR

SECOR INTERNATIONAL INCORPORATED

www.secor.com
290 Conejo Ridge Avenue
Thousand Oaks, CA 91361
805-230-1266 TEL
805-230-1277 FAX

ATLANTIC RICHFIELD COMPANY SITE CONCEPTUAL MODEL UPDATE

FIRST QUARTER

APRIL 15, 2007

Station No.: 5110 Address: 5731 East Firestone Blvd, South Gate
Atlantic Richfield Company Environmental Engineer/Phone No.: Mr. Darrell Fah / (714) 670-5228
Consulting Co./Contact Person/Phone No.: SECOR/Tony Wong / (805) 546-0455
SECOR Project No.: 37BP.05110.40
Primary Agency/Regulatory ID No.: LARWQCB Mr. Harry Nguyen/Case No. I-12074
Other Agencies to Receive Copies: None

WORK PERFORMED THIS QUARTER [First Quarter 2007]:

1. Conducted quarterly groundwater sampling and prepared SCMU Report.
2. Conducted operations and maintenance (O&M) on soil vapor extraction (SVE) and air sparge (AS) systems.
3. Convert the existing catalytic oxidizer to a carbon absorption system.
4. Changed the carbon from the vessels.
5. Proposed oxygen diffusion in off-Site wells A2 and A5, and onsite wells MW-20, MW-A4, MW-A3, and possibly MW-19.

WORK PROPOSED NEXT QUARTER [Second Quarter 2007]:

1. Conduct quarterly groundwater sampling and prepare SCMU Report.
2. Conduct SVE and AS system operations and maintenance.
3. Install oxygen diffusion system into wells A2 and A5, and onsite wells MW-20, MW-A4, MW-A3, and possibly MW-19.

SUMMARY OF SCMU UPDATES [First Quarter 2007]:

The following Figures have been updated this quarter:

1. Figures 10 through 14 and 16 have been updated with First Quarter 2007 monitoring and analytical data.
2. New Figure 17 has been added to show ISOC™ Vault Construction Detail.

The following Tables have been updated this quarter:

1. Tables 2 and 6 through 12 a, b, and c have been updated with First Quarter 2007 monitoring and analytical data.

The following Graphs have been updated this quarter:

1. All Graphs have been updated are included in the Graphs Section.

The following Appendices have been updated this quarter:

1. Appendix G has been updated with First Quarter 2007 monitoring and analytical data.
2. Appendix I has been updated with First Quarter 2007 remediation system data and proposed oxygen diffusion installation.
3. Appendix M presents First Quarter 2007 laboratory reports and chain of custody.
4. Appendix N presents First Quarter 2007 groundwater sampling field data sheets
5. Appendix O includes First Quarter 2007 waste disposal documentation.

SUMMARY OF SCMU DATA [First Quarter 2007]:

Current Phase of Project:	Remediation	(Assmnt, Remed. etc)
Frequency of Sampling:	AS/SVE Monthly/GW Quarterly	(Quarterly, etc.)
Frequency of Monitoring:	AS/SVE Monthly/GW Quarterly	(Monthly, etc.)
Separate Phase Hydrocarbons	No	(Yes/No)
Cumulative SPH Recovered to Date:	None	(gallons)
SPH Recovered This Quarter:	None	(gallons)
Bulk Soil Removed to Date:	~1,422	(cubic yards)
Bulk Soil Removed This Quarter:	None	(cubic yards)
Water Wells or Surface Waters (4000-ft) radius) Radius & Their Respective Directions:	02S/12W-31Q03 1800'SW 02S/12W-31Q02 1800' SW	(Distance and Direction)
Current Remediation Techniques:	AS/SVE	(SVES, SPH
Permits for Discharge:	N/A	(NPDES, POTW, etc.)
Approximate Depth to Groundwater:	Range: 49.40 to 51.90	(Measured Feet)
Groundwater Gradient:	South – Southeast	(Direction)
	0.003 feet/foot	(Magnitude)
Wells Purged and Sampled	11	
Total Number of Wells on-Site	5	
Monitored / Purged / Sampled	11 / 11 / 11	
Date of groundwater monitoring/sampling	February 13, 2007	
GRO Concentration Range:	34 J to 22,000	µg/L
Well with highest GRO Concentration:	MW-A4	
Benzene Concentration Range:	2.7 to 8,800	µg/L
Well with highest Benzene Concentration:	MW-A4	
MTBE Concentration Range:	1.2 to 390	µg/L
Well with highest MTBE Concentration:	MW-A3	
TBA Concentration Range:	17 J to 4,000	µg/L
Well with highest TBA Concentration:	MW-20	
Ethanol Concentration Range:	<3,000	µg/L
Well with highest Ethanol Concentration:	N/A	

Cumulative Hydrocarbon Removed Via AS/SVE system	50,283	(pounds)
Hydrocarbons Removed Via AS/SVE this Quarter	0	(pounds)
AS/SVE System Operation / Up-Time	1,704	(hours)
Percent Up- Time this Quarter	0	(percentage)
Co-mingled Plume	N/A	(Site I.D.)

Agency Directive Requirement: LARWQCB letter, Implementation of Final Draft Guidelines for Investigation and Cleanup of MTBE and Other Oxygenates, dated February 28, 2003 and August 27, 2003.+

Prepared By:

Jennifer Osborne
Staff Geologist

Approved By:

for Tony Wong
Associate Scientist

Approved By:

John R. Bollier
National Account Manager
P.G. 6099

PROFESSIONAL GEOLOGIST
JOHN R. BOLLIER
No. 6099
STATE OF CALIFORNIA

ATTACHED:

Figures
Figure 1 – Site Location Map Showing Identified Wells Within a One-Mile Radius
Figure 2 – Site Vicinity Map
Figure 3 – Site Map Showing Soil Boring and Remedial Well Locations
Figure 4 – Site Map Showing New UST, Shoring Boring, and Soil Stockpile Locations
Figure 5 – Site Map Showing Former UST, Product Piping, and Dispenser Sample Locations
Figure 6 – Site Map Showing Hydrocarbon Concentrations in Soil
Figure 7 – Site Map Showing Cross-Section Index
Figure 8 – Cross-Section A-A'
Figure 9 – Cross-Section B-B'
Figure 10 – Groundwater Contour and Hydrocarbon Concentration Map
Figure 11 – GRO Isoconcentration Map
Figure 12 – Benzene Isoconcentration Map
Figure 13 – MTBE Isoconcentration Map
Figure 14 – TBA Isoconcentration Map
Figure 15 – AS/SVE Well Locations and Theoretical Radius of Influence for SVE
Figure 16 – Cumulative Pounds of Gasoline Range Organics Removed
Figure 17 – Typical ISOC™ Vault Construction Detail

Tables
Table 1 – Historical Soil Analytical Results
Table 2 – Summary of Groundwater Analytical & Elevation Data
Table 3 – Well Construction Details
Table 4 – Summary of Wells Identified Within a One-Mile Radius
Table 5 – Summary of Monthly EFR Events (Discontinued)
Table 6 – SVE Operation Report

Table 7 – Summary of SVE Operation Data
Table 8 – Summary of Process Vapor Sampling Results
Table 9 – Summary of Individual Well Vapor Sample Analytical Results
Table 10 – Individual Soil Vapor Extraction Well Field Monitoring Data
Table 11 – Individual Air Sparge Well Monitoring Data
Table 12a, b, c – Daily Operation Logs

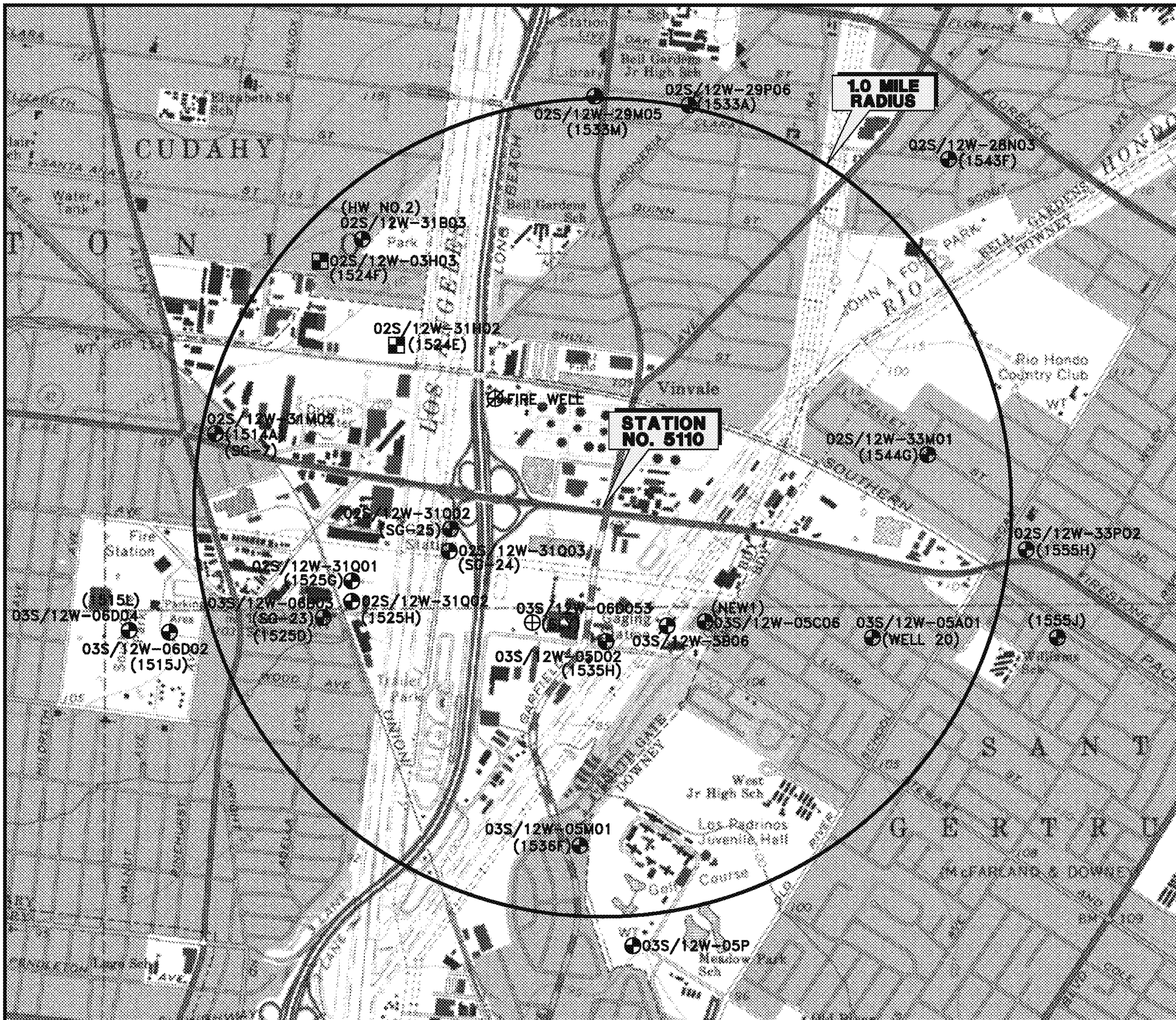
Graphs

Groundwater Well Hydrographs

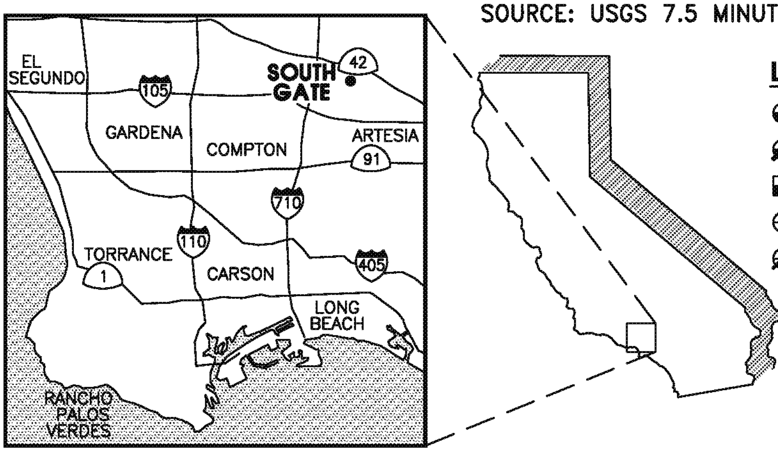
Appendices

Appendix A – Introduction and Site Description
Appendix B – Site Background
Appendix C – Historic Figures
Appendix D – Geology and Hydrogeology
Appendix E – Municipal Well Survey
Appendix F – Hydrocarbon Impacted Soil
Appendix G – Hydrocarbon Impacted Groundwater
Appendix H – Plume Travel Time Estimate
Appendix I – Historic Source Removal and Remediation Activities
Appendix J – Conclusions and Data Gaps
Appendix K – Standard Limitations
Appendix L – References
Appendix M – Agency Correspondence
Appendix N – Laboratory Reports and Chain of Custody
Appendix O – Groundwater Sampling Field Data Sheets
Appendix P – Waste Disposal Documents

FIGURES



SOURCE: USGS 7.5 MINUTE TOPOGRAPHIC MAP, SOUTH GATE QUADRANGLE, 1964 PHOTOREVISED 1981



LEGEND

- PUBLIC SUPPLY WELL
- PUBLIC SUPPLY WELL (ABANDONED)
- OBSERVATION WELL
- WELL
- WELL (ABANDONED)

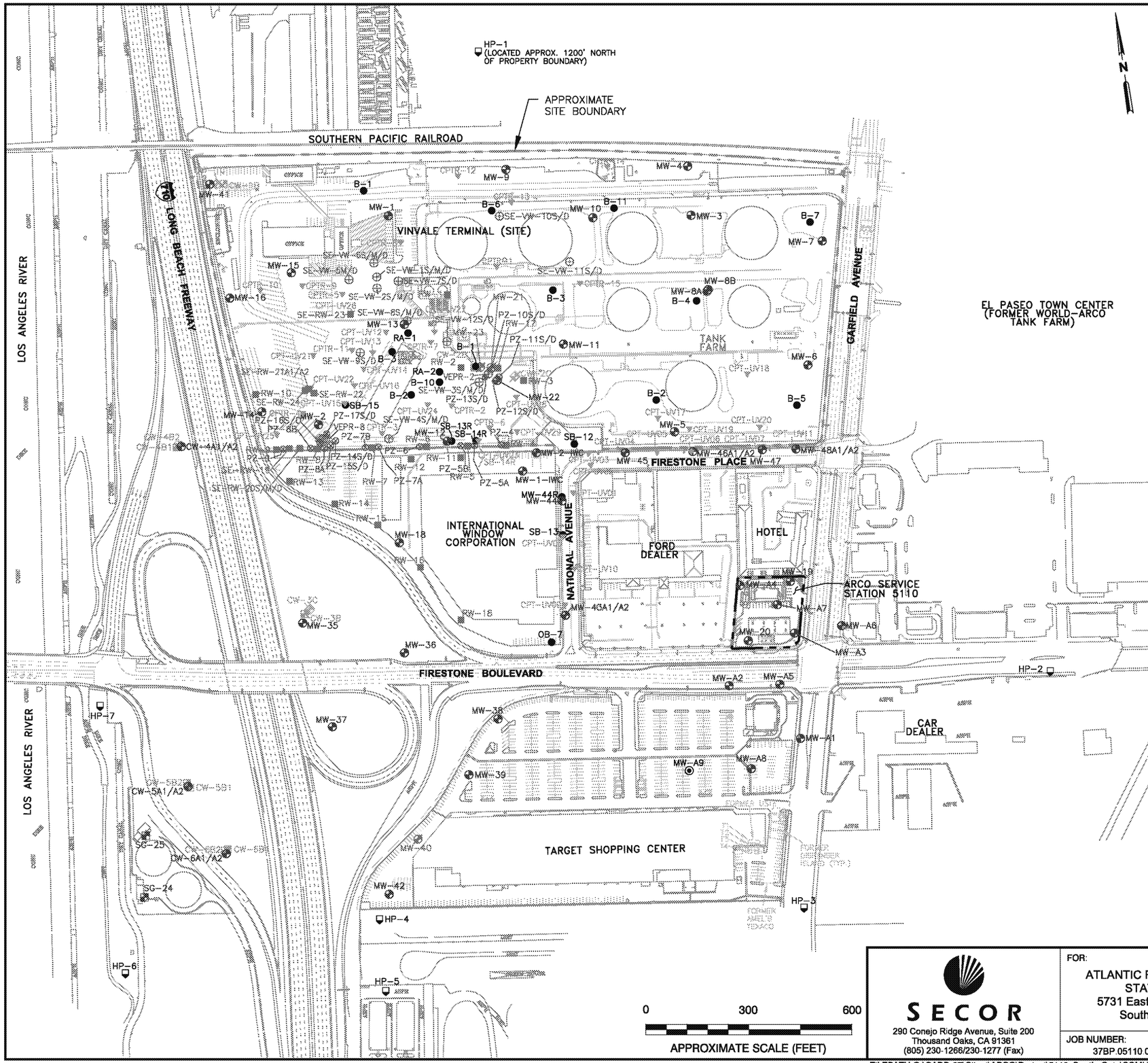
N

0 2000 4000

APPROXIMATE SCALE (FEET)

SECOR 290 Conejo Ridge Avenue, Suite 200 Thousand Oaks, CA 91361 (805) 230-1266/230-1277 (Fax)	FOR: ATLANTIC RICHFIELD COMPANY STATION NO. 5110 5731 East Firestone Boulevard South Gate, California		SITE LOCATION MAP SHOWING IDENTIFIED WELLS WITHIN A ONE-MILE RADIUS	FIGURE: 1
	JOB NUMBER: 37BP.05110.40.0336	DRAWN BY: R. Roman	CHECKED BY: D. Jain / APPROVED BY: T. Wong	DATE: 04/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\5110-GW\dwg\2007-Q1\BP5110-SLMR.dwg|jbarboza|Apr 12, 2007 at 12:18|Layout: SLMR_FIG1



SITE MAP LEGEND

- APPROXIMATE SITE BOUNDARY
- GROUNDWATER MONITORING WELL (SHALLOW HYDROSTRATIGRAPHIC ZONE & SHALLOW UNSATURATED ZONE)
- GROUNDWATER MONITORING WELL (MIDDLE HYDROSTRATIGRAPHIC ZONE)
- GROUNDWATER MONITORING WELL (DEEP HYDROSTRATIGRAPHIC ZONE)
- FLUID RECOVERY WELL (SHALLOW HYDROSTRATIGRAPHIC ZONE)
- PIEZOMETER WELL (SHALLOW HYDROSTRATIGRAPHIC ZONE)
- VAPOR/FLUID EXTRACTION WELL (SHALLOW UNSATURATED ZONE)
- CPT/ROST LOCATIONS AND DESIGNATION (SHALLOW UNSATURATED ZONE)
- CITY OF SOUTH GATE MUNICIPAL SUPPLY WELL
- ABANDONED GROUNDWATER MONITORING WELL LOCATION AND DESIGNATION
- SOIL BORING LOCATION AND DESIGNATION
- HYDROPUNCH SAMPLE LOCATION AND DESIGNATION
- PROPOSED GROUNDWATER MONITORING WELL LOCATION (SHALLOW HYDROSTRATIGRAPHIC ZONE)

GENERAL SITE NOTES:

1. MAP REFERENCES; BASED ON ORTHOGRAPHICALLY RECTIFIED AERIAL PHOTOGRAPH BY I.K. CURTIS SERVICES INC., DATED MARCH 18, 2003. HISTORICAL DIGITAL DATA FILES FROM PACIFIC ENVIRONMENTAL GROUP INC., DATED AUGUST 10, 1999 AND SLS ASSOCIATES INC., DATED SEPTEMBER 25, 1995. 710 INTERSTATE FREEWAY REFERENCED FROM IWA ENGINEERS, DATED APRIL 4, 1996.
2. GROUNDWATER MONITORING WELLS, VAPOR EXTRACTION WELLS, ON-SITE AND OFF-SITE RECOVERY WELLS, AND PIEZOMETER LOCATIONS SURVEYED BY WM HOLDINGS INC., DATED MARCH 25, 2003, DECEMBER 3, 2004, JANUARY 27, 2005, MAY 2, 2005, JULY 6, 2005, AND OCTOBER 12, 2005. HORIZONTAL DATUM NAD 83 CALIFORNIA STATE PLANE ZONE 5 (FT.), VERTICAL DATUM NAVD 88, SITE FEATURES AND LOCATIONS ARE APPROXIMATE.

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

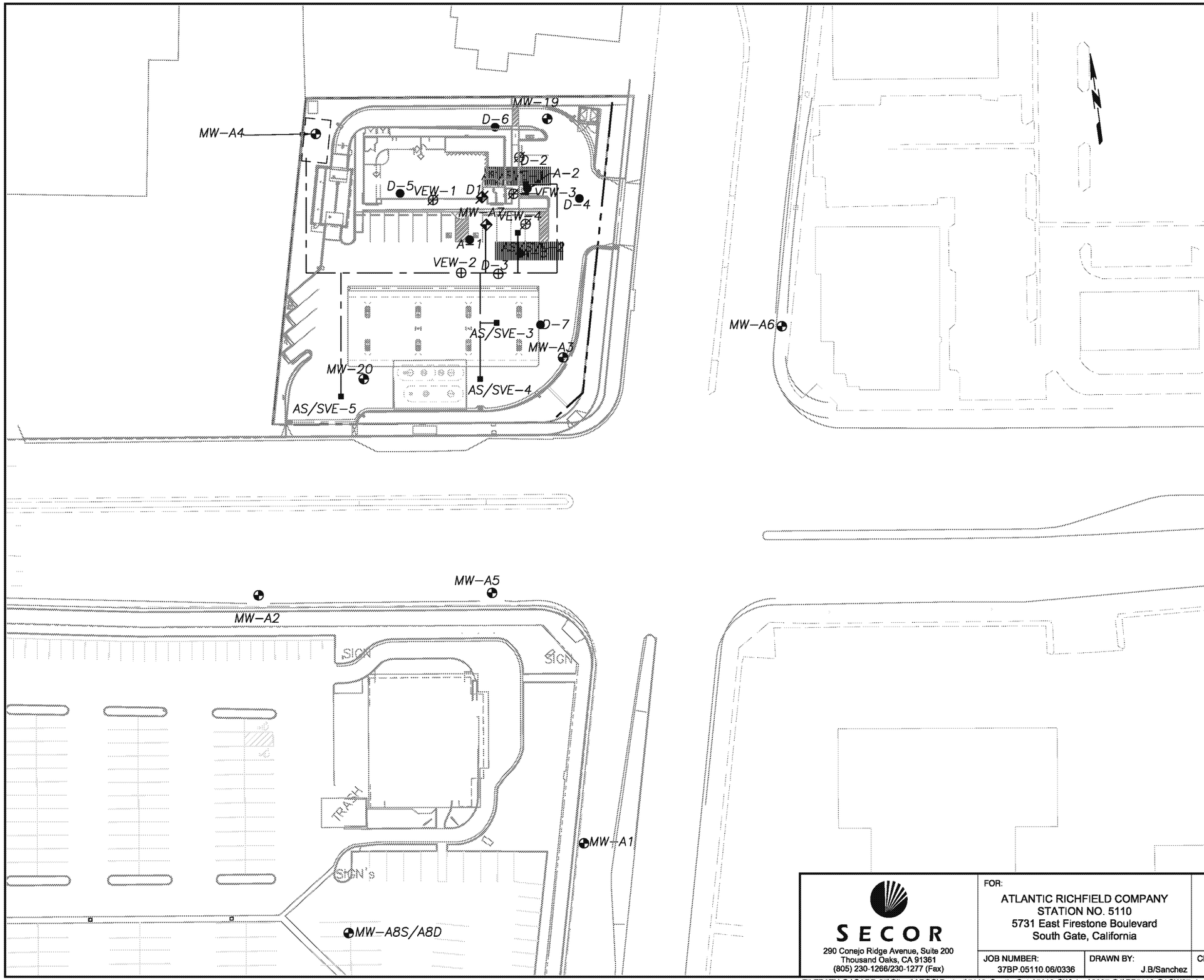
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

SITE VICINITY MAP

FIGURE: **2**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.00	R. Roman	D. Jain	G. Roberts	10/15/06

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\SCMU\2006-Q3\5110-SVM2.dwg | troman | Oct 11, 2006 at 8:20 | Layout: SVM



LEGEND

— — — —	APPROXIMATE SITE PROPERTY LINE
MW-20	GROUNDWATER MONITORING WELL LOCATIONS
MW-A7	DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATIONS
VEW-4	SOIL VAPOR EXTRACTION WELL LOCATIONS
D1	ABANDONED DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATION
VEW-1	ABANDONED SOIL VAPOR EXTRACTION WELL LOCATIONS
AS/SVE-1	18" DIAMETER VAULT/NESTED AIR SPARGE/SOIL VAPOR EXTRACTION WELL LOCATIONS

NOTES:

1. SOURCE OF MAP: PACIFIC ENVIRONMENTAL GROUP, INC.
2. SITE FEATURES AND LOCATIONS ARE APPROXIMATE.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 60 120

APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

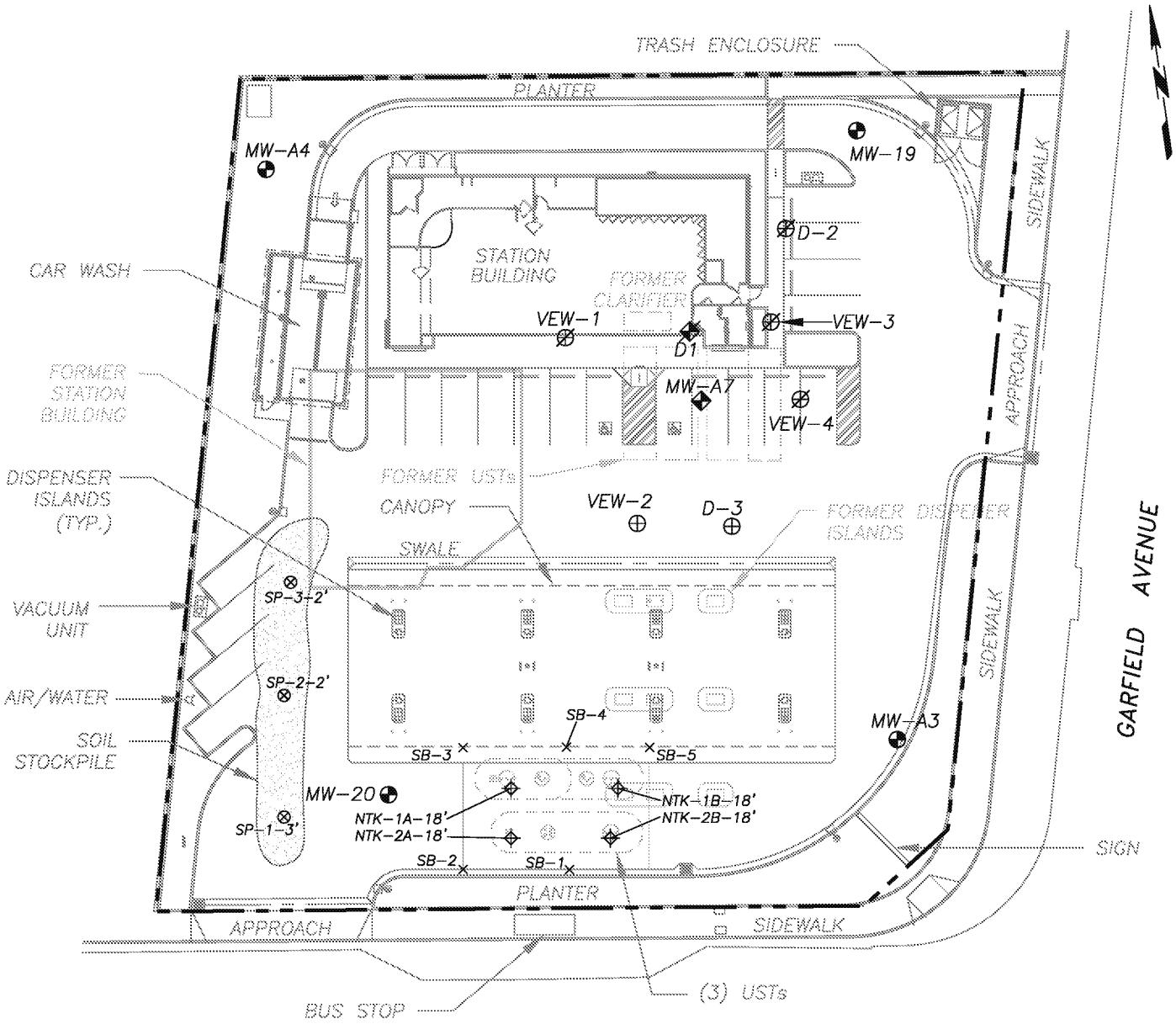
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

SITE MAP SHOWING BORING & REMEDIAL WELL LOCATIONS

FIGURE: **3**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.06/0336	J.B/Sanchez	A. Folwler	A. Folwler	1/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\5110-GW\dwg\2007-Q1\BP5110-Q1GW07.dwg | jbarboza | Apr 12, 2007 at 12:15 | Layout: SM_FIG3



LEGEND

— — — —	APPROXIMATE SITE PROPERTY LINE
MW-20	GROUNDWATER MONITORING WELL LOCATIONS
MW-A7	DUAL COMPLETION GROUNDWATER MONITORING/ SOIL VAPOR EXTRACTION WELL LOCATIONS
VEW-4	SOIL VAPOR EXTRACTION WELL LOCATIONS
D-1	ABANDONED DUAL COMPLETION GROUNDWATER MONITORING/ SOIL VAPOR EXTRACTION WELL LOCATION
VEW-1	ABANDONED SOIL VAPOR EXTRACTION WELL LOCATIONS
NTK-1A-18'	NEW UST ENCLOSURE SAMPLE LOCATIONS
SB-1	SHORING SAMPLE LOCATIONS
SP-1-3'	SOIL STOCKPILE SAMPLE LOCATIONS

NOTES:

1. SOURCE OF BASE MAP: FRED FIEDLER AND ASSOCIATES, DATED AUGUST 28, 2001.
2. SITE FEATURES AND LOCATIONS ARE APPROXIMATE.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 40 80

APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

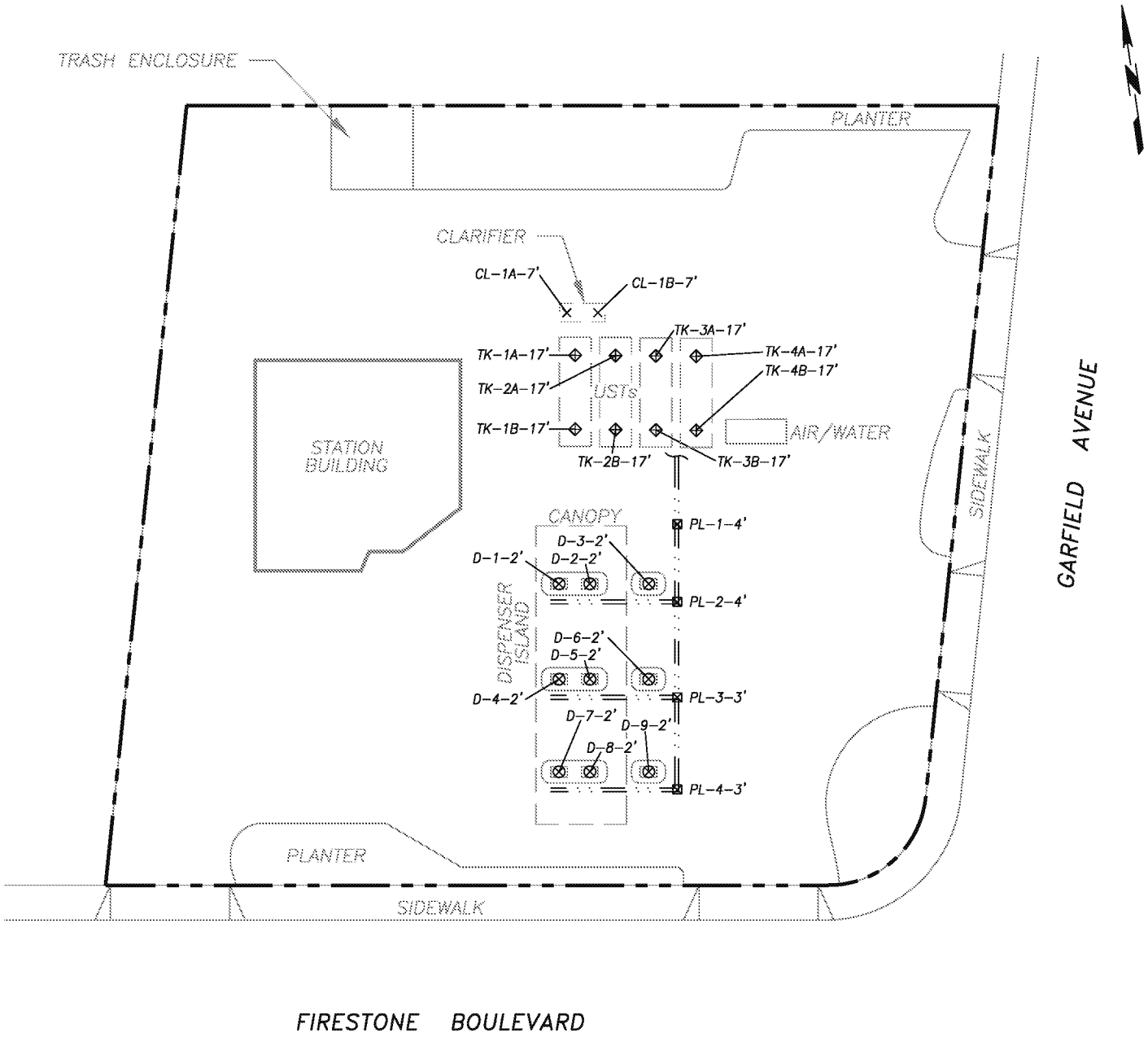
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

SITE MAP SHOWING NEW UST, SHORING BORING, AND SOIL STOCKPILE SAMPLE LOCATIONS

FIGURE: **4**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.04	R. Roman	P. Lam	G. Roberts	01/15/06

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\SCMU\2006-Q3\5110-SMPL.dwg | troman | Oct 11, 2006 at 8:09 | Layout: SMPL_FIG4



LEGEND

- APPROXIMATE SITE PROPERTY LINE
- PRODUCT PIPING LOCATIONS
- D-1-2' DISPENSER SAMPLE LOCATIONS
- PL-1-4' PRODUCT LINE SAMPLE LOCATIONS
- TK-1A-17' USTs SAMPLE LOCATIONS
- CL-1A-7' CLARIFIER SAMPLE LOCATIONS

NOTES:

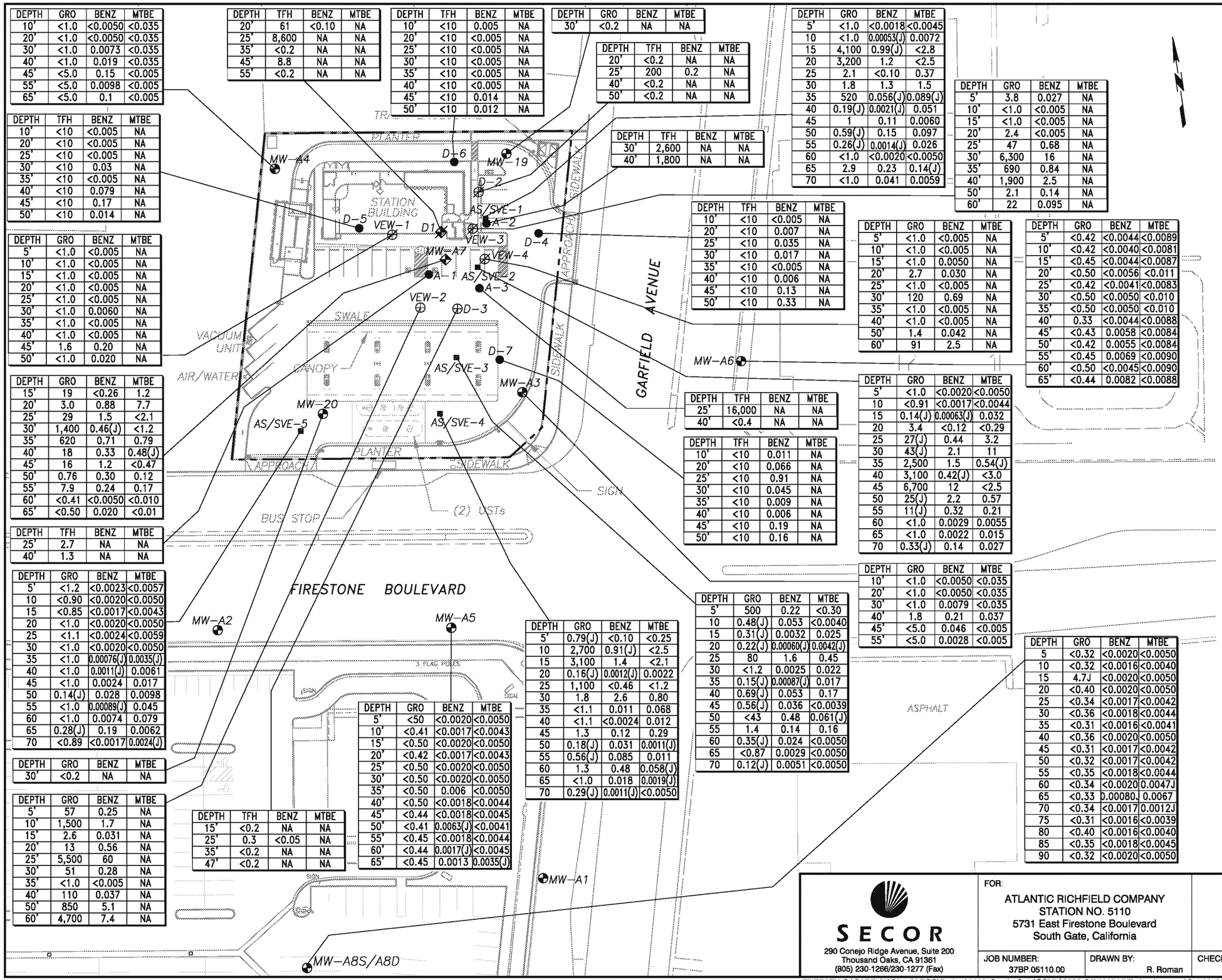
1. NOT A SURVEYED MAP, SITE FEATURES AND LOCATIONS ARE APPROXIMATE.

0 40 80

APPROXIMATE SCALE IN FEET

SECOR 290 Conejo Ridge Avenue, Suite 200 Thousand Oaks, CA 91361 (805) 230-1266/230-1277 (Fax)	FOR: ATLANTIC RICHFIELD COMPANY STATION NO. 5110 5731 East Firestone Boulevard South Gate, California		SITE MAP SHOWING FORMER UST, PRODUCT PIPING, AND DISPENSER SAMPLE LOCATIONS		FIGURE: 5
	JOB NUMBER: 37BP.05110.04	DRAWN BY: R. Roman	CHECKED BY: P. Lam	APPROVED BY: G. Roberts	DATE: 01/15/06

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\SCMU\2006-Q3\5110-FASM.dwg | troman | Oct 11, 2006 at 8:02 | Layout: FASM_FIG5



DEPTH	GRO	BENZ	MTBE
10'	<1.0	<0.0050	<0.035
20'	<1.0	<0.0050	<0.035
30'	<1.0	0.0073	<0.035
40'	<1.0	0.019	<0.035
45'	<5.0	0.15	<0.005
55'	<5.0	0.0098	<0.005
65'	<5.0	0.1	<0.005

DEPTH	TFH	BENZ	MTBE
10'	<10	<0.005	NA
20'	<10	<0.005	NA
25'	<10	<0.005	NA
30'	<10	0.03	NA
35'	<10	<0.005	NA
40'	<10	0.079	NA
45'	<10	0.17	NA
50'	<10	0.014	NA

DEPTH	GRO	BENZ	MTBE
5'	<1.0	<0.005	NA
10'	<1.0	<0.005	NA
15'	<1.0	<0.005	NA
20'	<1.0	<0.005	NA
25'	<1.0	<0.005	NA
30'	<1.0	0.0060	NA
35'	<1.0	<0.005	NA
40'	<1.0	<0.005	NA
45'	1.6	0.20	NA
50'	<1.0	0.020	NA

DEPTH	GRO	BENZ	MTBE
15'	19	<0.26	1.2
20'	3.0	0.88	7.7
25'	29	1.5	<2.1
30'	1,400	0.46(J)	<1.2
35'	620	0.71	0.79
40'	18	0.33	0.48(J)
45'	16	1.2	<0.47
50'	0.76	0.30	0.12
55'	7.9	0.24	0.17
60'	<0.41	<0.0050	<0.010
65'	<0.50	0.020	<0.01

DEPTH	TFH	BENZ	MTBE
25'	2.7	NA	NA
40'	1.3	NA	NA

DEPTH	GRO	BENZ	MTBE
5'	<1.2	<0.0023	<0.0057
10	<0.90	<0.0020	<0.0050
15	<0.85	<0.0017	<0.0043
20	<1.0	<0.0020	<0.0050
25	<1.1	<0.0024	<0.0059
30	<1.0	<0.0020	<0.0050
35	<1.0	0.00076(J)	0.0035(J)
40	<1.0	0.0011(J)	0.0061
45	<1.0	0.0024	0.017
50	0.14(J)	0.028	0.0098
55	<1.0	0.00089(J)	0.045
60	<1.0	0.0074	0.079
65	0.28(J)	0.19	0.0062
70	<0.89	<0.0017	0.0024(J)

DEPTH	GRO	BENZ	MTBE
30'	<0.2	NA	NA

DEPTH	GRO	BENZ	MTBE
5'	57	0.25	NA
10'	1,500	1.7	NA
15'	2.6	0.031	NA
20'	13	0.56	NA
25'	5,500	60	NA
30'	51	0.28	NA
35'	<1.0	<0.005	NA
40'	110	0.037	NA
50'	850	5.1	NA
60'	4,700	7.4	NA

DEPTH	TFH	BENZ	MTBE
20'	61	<0.10	NA
25'	8,600	NA	NA
35'	<0.2	NA	NA
45'	8.8	NA	NA
55'	<0.2	NA	NA

DEPTH	TFH	BENZ	MTBE
10'	<10	0.005	NA
20'	<10	<0.005	NA
25'	<10	<0.005	NA
30'	<10	<0.005	NA
35'	<10	<0.005	NA
40'	<10	<0.005	NA
45'	<10	0.014	NA
50'	<10	0.012	NA

DEPTH	GRO	BENZ	MTBE
30'	<0.2	NA	NA

DEPTH	TFH	BENZ	MTBE
20'	<0.2	NA	NA
25'	200	0.2	NA
40'	<0.2	NA	NA
50'	<0.2	NA	NA

DEPTH	TFH	BENZ	MTBE
30'	2,600	NA	NA
40'	1,800	NA	NA

DEPTH	TFH	BENZ	MTBE
10'	<10	<0.005	NA
20'	<10	0.007	NA
25'	<10	0.035	NA
30'	<10	0.017	NA
35'	<10	<0.005	NA
40'	<10	0.006	NA
45'	<10	0.13	NA
50'	<10	0.33	NA

DEPTH	TFH	BENZ	MTBE
25'	16,000	NA	NA
40'	<0.4	NA	NA

DEPTH	TFH	BENZ	MTBE
10'	<10	0.011	NA
20'	<10	0.066	NA
25'	<10	0.91	NA
30'	<10	0.045	NA
35'	<10	0.009	NA
40'	<10	0.006	NA
45'	<10	0.19	NA
50'	<10	0.16	NA

DEPTH	GRO	BENZ	MTBE
5'	500	0.22	<0.30
10	0.48(J)	0.053	<0.0040
15	0.31(J)	0.0032	0.025
20	0.22(J)	0.00060(J)	0.0042(J)
25	80	1.6	0.45
30	<1.2	0.0025	0.022
35	0.15(J)	0.00087(J)	0.017
40	0.69(J)	0.053	0.17
45	0.56(J)	0.036	<0.0039
50	<43	0.48	0.061(J)
55	1.4	0.14	0.16
60	0.35(J)	0.024	<0.0050
65	<0.87	0.0029	<0.0050
70	0.12(J)	0.0051	<0.0050

DEPTH	GRO	BENZ	MTBE
5'	<50	<0.0020	<0.0050
10'	<0.41	<0.0017	<0.0043
15'	<0.50	<0.0020	<0.0050
20'	<0.42	<0.0017	<0.0043
25'	<0.50	<0.0020	<0.0050
30'	<0.50	<0.0020	<0.0050
35'	<0.50	0.006	<0.0050
40'	<0.50	<0.0018	<0.0044
45'	<0.44	<0.0018	<0.0045
50'	<0.41	0.0063(J)	<0.0041
55'	<0.45	<0.0018	<0.0044
60'	<0.44	0.0017(J)	<0.0045
65'	<0.45	0.0013	0.0035(J)

DEPTH	TFH	BENZ	MTBE
15'	<0.2	NA	NA
25'	0.3	<0.05	NA
35'	<0.2	NA	NA
47'	<0.2	NA	NA

DEPTH	GRO	BENZ	MTBE
5'	0.79(J)	<0.10	<0.25
10	2,700	0.91(J)	<2.5
15	3,100	1.4	<2.1
20	0.16(J)	0.0012(J)	0.0022
25	1,100	<0.46	<1.2
30	1.8	2.6	0.80
35	<1.1	0.011	0.068
40	<1.1	<0.0024	0.012
45	1.3	0.12	0.29
50	0.18(J)	0.031	0.0011(J)
55	0.56(J)	0.085	0.011
60	1.3	0.48	0.058(J)
65	<1.0	0.018	0.0019(J)
70	0.29(J)	0.0011(J)	<0.0050

DEPTH	GRO	BENZ	MTBE
5'	<1.0	<0.0018	<0.0045
10	<1.0	0.00053(J)	0.0072
15	4,100	0.99(J)	<2.8
20	3,200	1.2	<2.5
25	2.1	<0.10	0.37
30	1.8	1.3	1.5
35	520	0.056(J)	0.089(J)
40	0.19(J)	0.0021(J)	0.051
45	1	0.11	0.0060
50	0.59(J)	0.15	0.097
55	0.26(J)	0.0014(J)	0.026
60	<1.0	<0.0020	<0.0050
65	2.9	0.23	0.14(J)
70	<1.0	0.041	0.0059

DEPTH	GRO	BENZ	MTBE
5'	3.8	0.027	NA
10'	<1.0	<0.005	NA
15'	<1.0	<0.005	NA
20'	2.4	<0.005	NA
25'	47	0.68	NA
30'	6,300	16	NA
35'	690	0.84	NA
40'	1,900	2.5	NA
50'	2.1	0.14	NA
60'	22	0.095	NA

DEPTH	GRO	BENZ	MTBE
5'	<1.0	<0.005	NA
10'	<1.0	<0.005	NA
15'	<1.0	0.0050	NA
20'	2.7	0.030	NA
25'	<1.0	<0.005	NA
30'	120	0.69	NA
35'	<1.0	<0.005	NA
40'	<1.0	<0.005	NA
50'	1.4	0.042	NA
60'	91	2.5	NA

DEPTH	GRO	BENZ	MTBE
5'	<0.42	<0.0044	<0.0089
10'	<0.42	<0.0040	<0.0081
15'	<0.45	<0.0044	<0.0087
20'	<0.50	<0.0056	<0.011
25'	<0.42	<0.0041	<0.0083
30'	<0.50	<0.0050	<0.010
35'	<0.50	<0.0050	<0.010
40'	0.33	<0.0044	<0.0088
45'	<0.43	0.0058	<0.0084
50'	<0.42	0.0055	<0.0084
55'	<0.45	0.0069	<0.0090
60'	<0.50	<0.0045	<0.0090
65'	<0.44	0.0082	<0.0088

DEPTH	GRO	BENZ	MTBE
5'	<1.0	<0.0020	<0.0050
10	<0.91	<0.0017	<0.0044
15	0.14(J)	0.00063(J)	0.032
20	3.4	<0.12	<0.29
25	27(J)	0.44	3.2
30	43(J)	2.1	11
35	2,500	1.5	0.54(J)
40	3,100	0.42(J)	<3.0
45	6,700	12	<2.5
50	25(J)	2.2	0.57
55	11(J)	0.32	0.21
60	<1.0	0.0029	0.0055
65	<1.0	0.0022	0.015
70	0.33(J)	0.14	0.027

DEPTH	GRO	BENZ	MTBE
10'	<1.0	<0.0050	<0.035
20'	<1.0	<0.0050	<0.035
30'	<1.0	0.0079	<0.035
40'	1.8	0.21	0.037
45'	<5.0	0.046	<0.005
55'	<5.0	0.0028	<0.005

DEPTH	GRO	BENZ	MTBE
5	<0.32	<0.0020	<0.0050
10	<0.32	<0.0016	<0.0040
15	4.7J	<0.0020	<0.0050
20	<0.40	<0.0020	<0.0050
25	<0.34	<0.0017	<0.0042
30	<0.36	<0.0018	<0.0044
35	<0.31	<0.0016	<0.0041
40	<0.36	<0.0020	<0.0050
45	<0.31	<0.0017	<0.0042
50	<0.32	<0.0017	<0.0042
55	<0.35	<0.0018	<0.0044
60	<0.34	<0.0020	0.0047J
65	<0.33	0.00080J	0.0067
70	<0.34	<0.0017	0.0012J
75	<0.31	<0.0016	<0.0039
80	<0.40	<0.0016	<0.0040
85	<0.35	<0.0018	<0.0045
90	<0.32	<0.0020	<0.0050

LEGEND

- APPROXIMATE SITE PROPERTY LINE
- MW-20 — GROUNDWATER MONITORING WELL LOCATIONS
- MW-A7 — DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATIONS
- VEW-4 — SOIL VAPOR EXTRACTION WELL LOCATIONS
- D1 — ABANDONED DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATION
- VEW-1 — ABANDONED SOIL VAPOR EXTRACTION WELL LOCATIONS

DEPTH	TFH	BENZ	MTBE

SOIL SAMPLE DEPTH WITH CORRESPONDING TOTAL FUEL HYDROCARBONS, BENZENE, AND MTBE CONCENTRATIONS IN MILLIGRAMS PER KILOGRAM (mg/kg)

DEPTH	GRO	BENZ	MTBE

SOIL SAMPLE DEPTH WITH CORRESPONDING GASOLINE RANGE ORGANICS (C4-C12), BENZENE, AND MTBE CONCENTRATIONS IN MILLIGRAMS PER KILOGRAM (mg/kg)

NA — NOT AVAILABLE

(J) — ESTIMATED VALUE BELOW THE REPORTING LIMIT

NOTES:

1. SOURCE OF MAP: F. F. AND ASSOCIATES, DATED AUGUST 28, 2001.
2. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002. SITE FEATURES AND LOCATIONS ARE APPROXIMATE.

0 80 120

APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

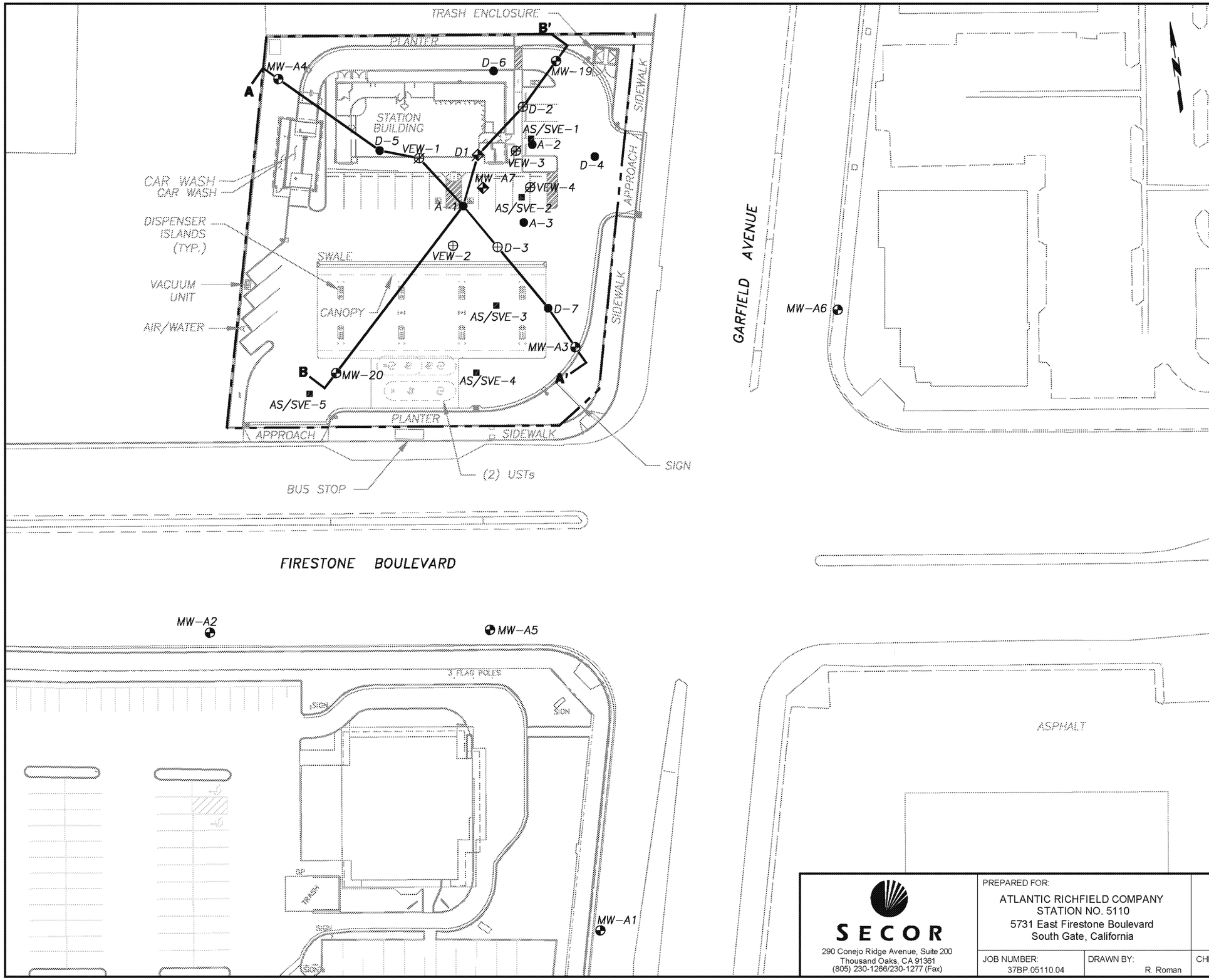
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

SITE MAP SHOWING HYDROCARBON CONCENTRATIONS IN SOIL

FIGURE: 6

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.00	R. Roman	C. O'Neil	G. Roberts	10/15/06

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\SCMU\2006-Q3\5110-HYD.dwg | troman | Oct 11, 2006 at 8:24 | Layout: HYD_FIG6



NOTES:

1. SOURCE OF MAP: F. F. AND ASSOCIATES, DATED AUGUST 28, 2001.
2. SITE FEATURES AND LOCATIONS ARE APPROXIMATE.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

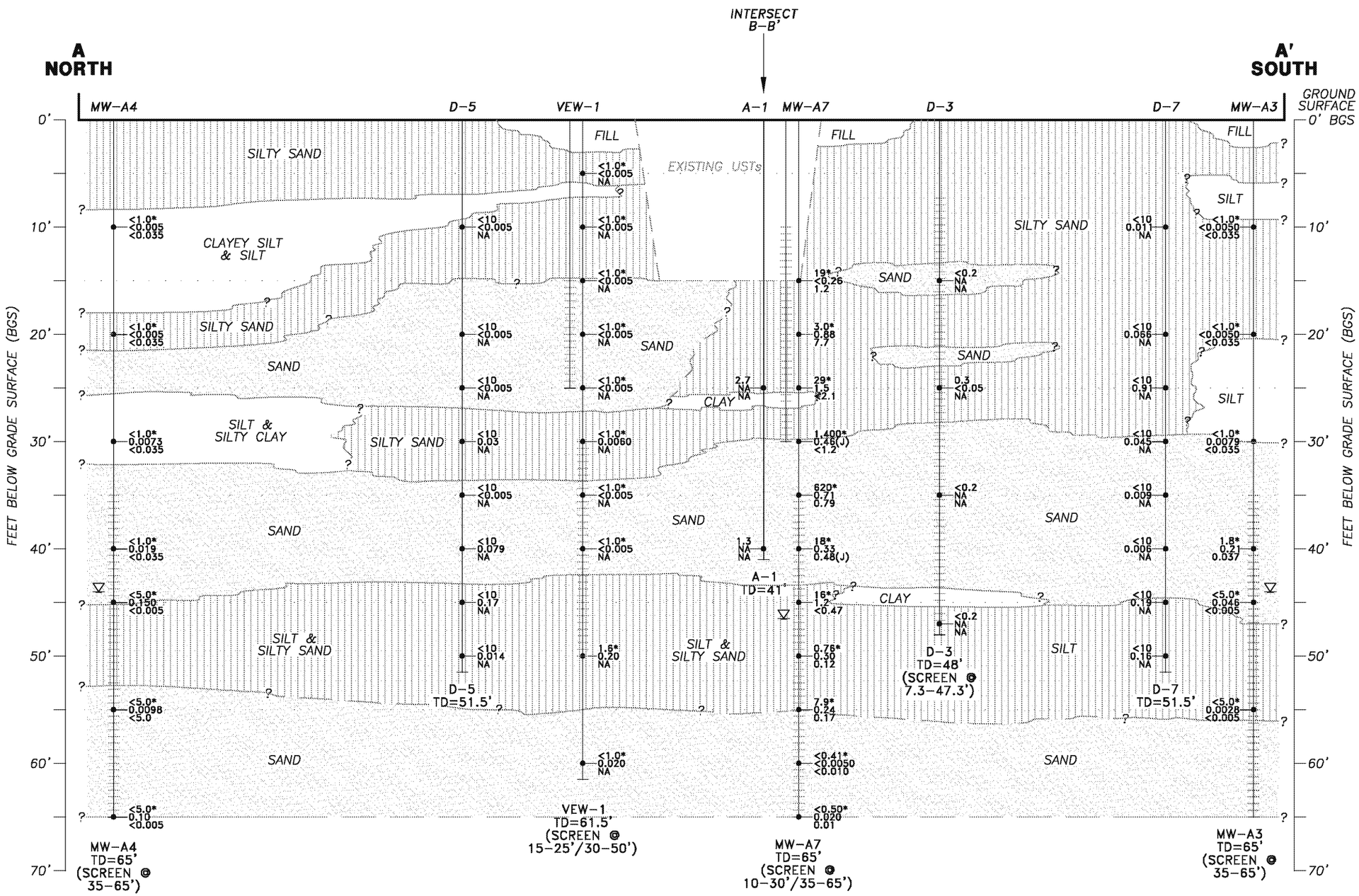
SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

PREPARED FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

SITE MAP SHOWING CROSS-SECTION INDEX

FIGURE: **7**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.04	R. Roman	P. Lam	G. Roberts	01/15/06



LEGEND

- SAND TO GRAVELLY SAND
- SAND WITH SILT/SILTY SAND
- SILT/CLAYEY SILT/SILTY CLAY/CLAY
- SW — WELL GRADED SAND
- SP — POORLY GRADED SAND
- SP–SM — POORLY GRADED SAND WITH SILT
- SM — SILTY SAND
- ML — SILT/CLAYEY SILT
- CL — CLAY/SILTY CLAY/SANDY CLAY
- TFH / BENZ / MTBE — SOIL SAMPLE LOCATIONS WITH TOTAL FUEL HYDROCARBONS, BENZENE AND MTBE CONCENTRATIONS REPORTED IN MILLIGRAMS PER KILOGRAM (mg/Kg)
- TPHg* — TOTAL PETROLEUM HYDROCARBONS AS GASOLINE CONCENTRATIONS REPORTED IN MILLIGRAMS PER KILOGRAM (mg/Kg)
- NA — NOT AVAILABLE
- LITHOLOGIC CONTACTS OF LATERALLY CONTINUOUS SOIL HORIZON
- INFERRED LITHOLOGIC CONTACT, DASHED OR QUERIED (?) WHERE APPROXIMATED
- DEPTH TO GROUNDWATER (BGS) ENCOUNTERED DURING DRILLING
- SCREENED INTERVAL OF WELL TOTAL BORING DEPTH

NOTES:

1. GROUND SURFACE NOT ADJUSTED TO DEPICT ACTUAL ELEVATIONS.
2. HORIZONTAL EXAGGERATION OF WELLS DONE FOR CLARITY. FIGURE DOES NOT REFLECT ACTUAL BOREHOLE DIAMETERS.

HORIZONTAL SCALE IN FEET: 20 0 20 40

VERTICAL SCALE IN FEET: 10 0 10 20

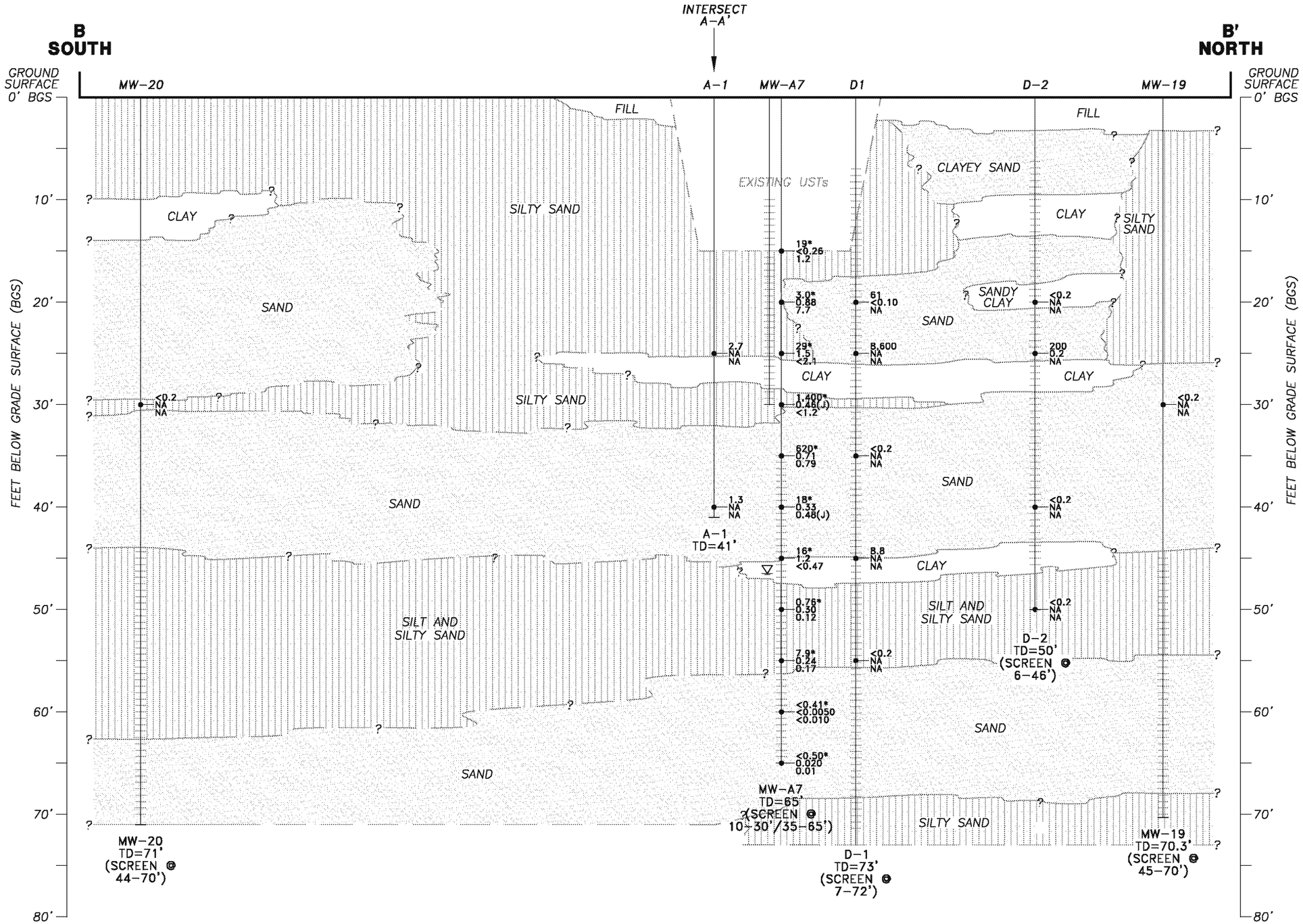
SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

PREPARED FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

CROSS-SECTION A-A'

FIGURE: **8**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.04	R. Roman	P. Lam	G. Roberts	01/15/06



LEGEND

- SAND TO GRAVELLY SAND/CLAYEY SAND
- SAND WITH SILT/SILTY SAND
- SILT/CLAYEY SILT/SILTY CLAY/CLAY/SANDY CLAY
- SW — WELL GRADED SAND
- SP — POORLY GRADED SAND
- SP–SM — POORLY GRADED SAND WITH SILT
- SM — SILTY SAND
- ML — SILT/CLAYEY SILT
- CL — CLAY/SILTY CLAY
- TEH / BENZ / MTBE — SOIL SAMPLE LOCATIONS WITH TOTAL FUEL HYDROCARBONS, BENZENE AND MTBE CONCENTRATIONS REPORTED IN MILLIGRAMS PER KILOGRAM (mg/Kg)
- TPHg* — TOTAL PETROLEUM HYDROCARBONS AS GASOLINE CONCENTRATIONS REPORTED IN MILLIGRAMS PER KILOGRAM (mg/Kg)
- NA — NOT AVAILABLE
- LITHOLOGIC CONTACTS OF LATERALLY CONTINUOUS SOIL HORIZON
- INFERRED LITHOLOGIC CONTACT, DASHED OR QUERIED (?) WHERE APPROXIMATED
- DEPTH TO GROUNDWATER (BGS) ENCOUNTERED DURING DRILLING
- SCREENED INTERVAL OF WELL TOTAL BORING DEPTH

NOTES:

1. GROUND SURFACE NOT ADJUSTED TO DEPICT ACTUAL ELEVATIONS.
2. HORIZONTAL EXAGGERATION OF WELLS DONE FOR CLARITY. FIGURE DOES NOT REFLECT ACTUAL BOREHOLE DIAMETERS.

HORIZONTAL SCALE IN FEET: 20 0 20 40

VERTICAL SCALE IN FEET: 10 0 10 20

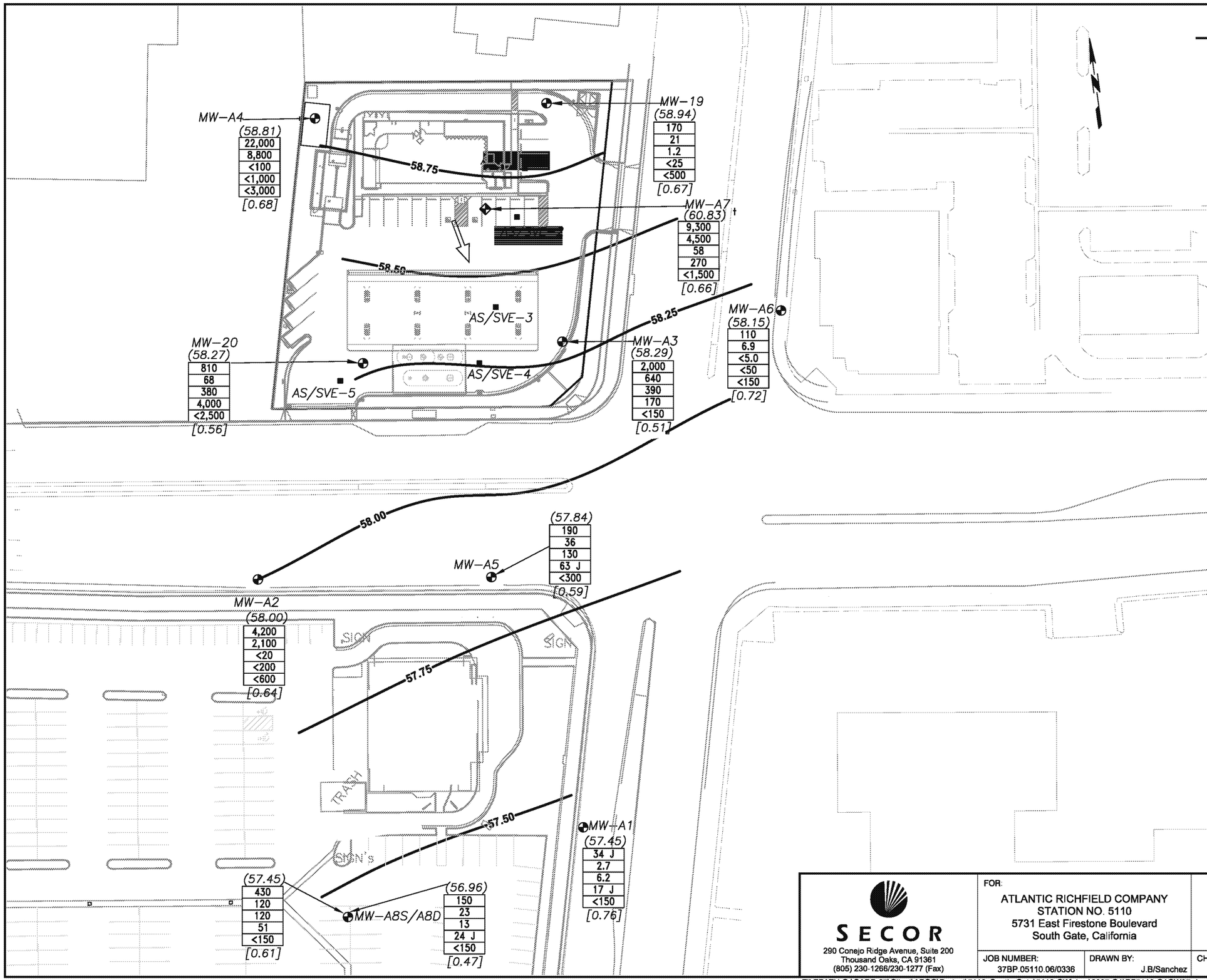
SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

PREPARED FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

CROSS-SECTION B-B'

FIGURE: **9**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.04	R. Roman	P. Lam	G. Roberts	01/15/06



LEGEND

— — —	APPROXIMATE SITE PROPERTY LINE
MW-20	GROUNDWATER MONITORING WELL LOCATIONS
MW-A7	DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATIONS
AS/SVE-1	18" DIAMETER VAULT/NESTED AIR SPARGE/SOIL VAPOR EXTRACTION WELL LOCATIONS
(60.83)	GROUNDWATER ELEVATION (Feet above mean sea level)
GRO, BENZ, MTBE, TBA, ETHANOL	GASOLINE RANGE ORGANICS (C4–C12), BENZENE, MTBE, TERTIARY BUTANOL, AND ETHANOL CONCENTRATIONS IN MICROGRAMS PER LITER (µg/L)
[0.72]	DISSOLVED–OXYGEN CONCENTRATIONS IN GROUNDWATER
~	GROUNDWATER ELEVATION CONTOUR LINE (DASHED WHERE INFERRED)
⇨	GROUNDWATER FLOW DIRECTION
(J)	ESTIMATED VALUE; BELOW LABORATORY REPORTING LIMIT AND ABOVE THE METHOD DETECTION LIMIT
[NM]	NOT MEASURED
†	ANOMALOUS DATA; NOT USED FOR CONTOURING PUSPOSES

NOTES:

1. GROUNDWATER WELLS GAUGED AND SAMPLED ON FEBRUARY 13, 2007.
2. SOURCE OF BASE MAP: FRED FIEDLER AND ASSOCIATES, DATED AUGUST 28, 2001.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 50 100
APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

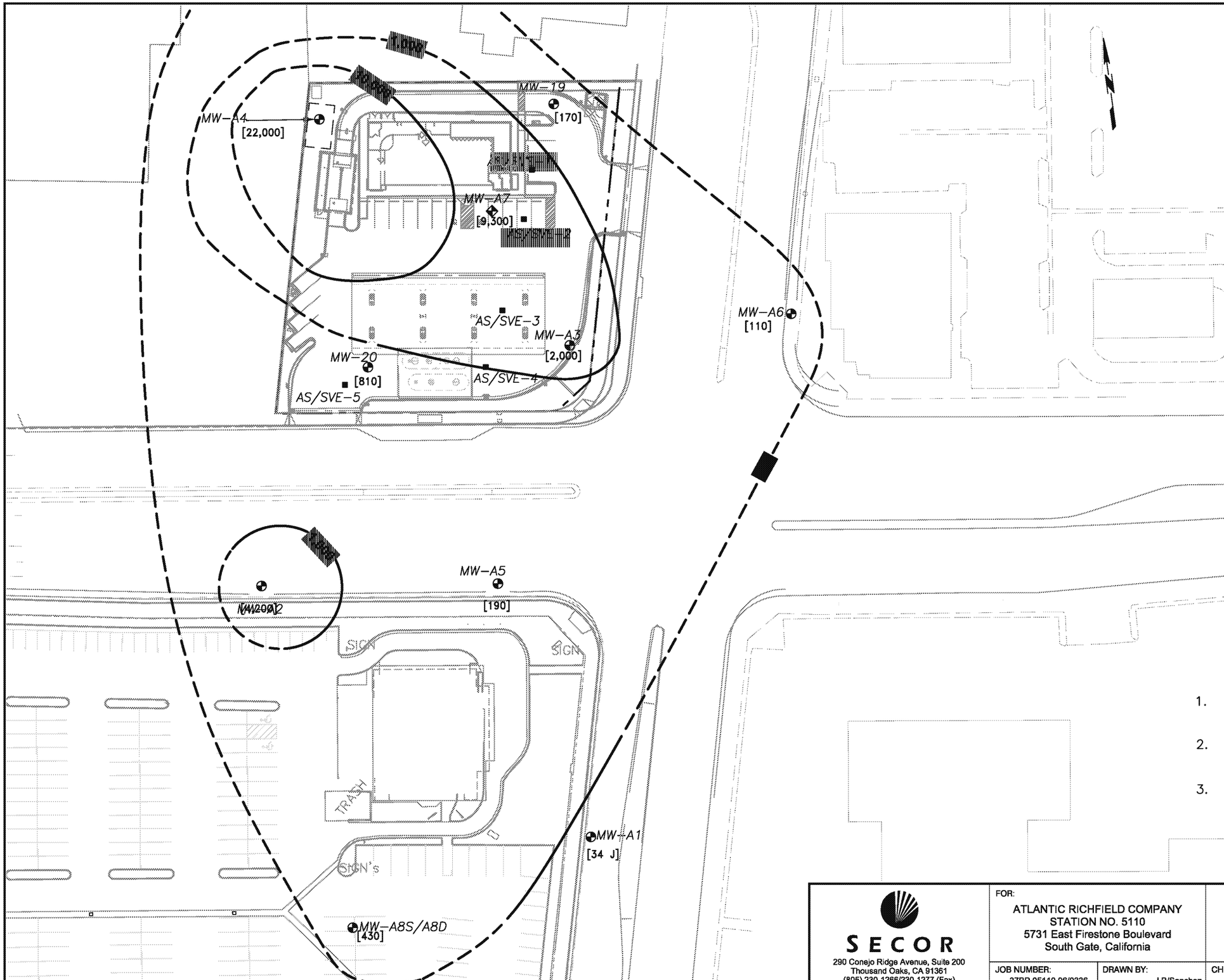
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

GROUNDWATER CONTOUR AND HYDROCARBON CONCENTRATION MAP

FIGURE: **10**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.06/0336	J.B/Sanchez	A. Folwler	T. Wong	4/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\5110-GW\dwg\2007-Q1\BP5110-Q1GW07.dwg | jbarboza | Apr 12, 2007 at 12:35 | Layout: GW_FIG10



LEGEND

— — — —	APPROXIMATE SITE PROPERTY LINE
MW-20	GROUNDWATER MONITORING WELL LOCATIONS
MW-A7	DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATIONS
AS/SVE-1	18" DIAMETER VAULT/NESTED AIR SPARGE/SOIL VAPOR EXTRACTION WELL LOCATIONS
[GRO]	GASOLINE RANGE ORGANICS (C4-C12) CONCENTRATIONS IN MICROGRAMS PER LITER (µg/L)
	GRO ISOCONCENTRATION CONTOUR LINE (DASHED WHERE INFERRED)
(J)	ESTIMATED VALUE; BELOW LABORATORY REPORTING LIMIT AND ABOVE THE METHOD DETECTION LIMIT

NOTES:

1. GROUNDWATER WELLS GAUGED AND SAMPLED ON FEBRUARY 13, 2007.
2. SOURCE OF BASE MAP: FRED FIEDLER AND ASSOCIATES, DATED AUGUST 28, 2001.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 50 100
APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

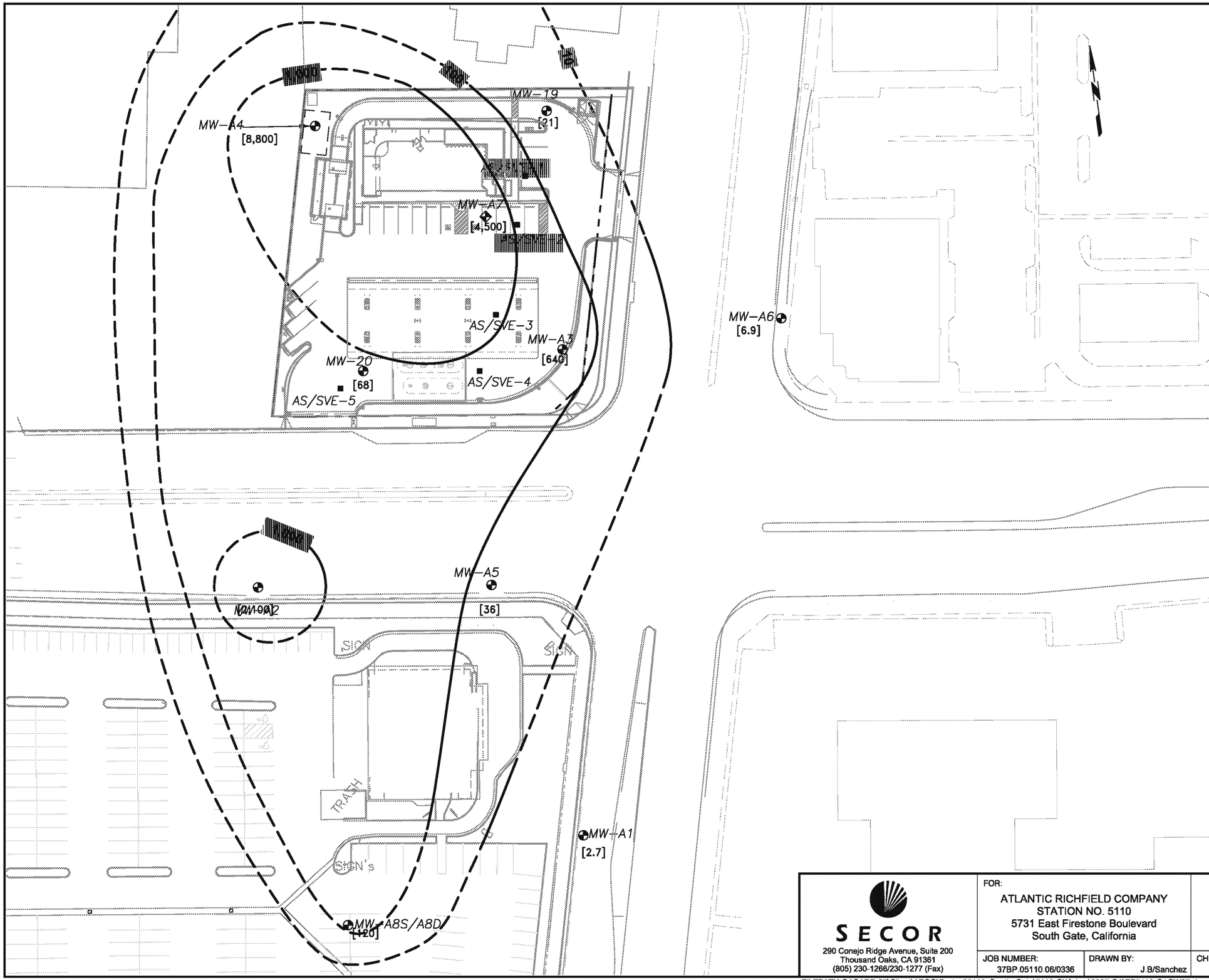
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

GRO ISOCONCENTRATION MAP

FIGURE: **11**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.06/0336	J.B/Sanchez	A. Folwler	T. Wong	/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\5110-GW\dwg\2007-Q1\BP5110-Q1GW07.dwg | jbarboza | Apr 12, 2007 at 12:14 | Layout: GRO_FIG11



LEGEND

— — — —	APPROXIMATE SITE PROPERTY LINE
MW-20	GROUNDWATER MONITORING WELL LOCATIONS
MW-A7	DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATIONS
AS/SVE-1	18" DIAMETER VAULT/NESTED AIR SPARGE/SOIL VAPOR EXTRACTION WELL LOCATIONS
[BENZ]	BENZENE CONCENTRATIONS IN MICROGRAMS PER LITER (µg/L)
	BENZENE ISOCONCENTRATION CONTOUR LINE (DASHED WHERE INFERRED)
(J)	ESTIMATED VALUE; BELOW LABORATORY REPORTING LIMIT AND ABOVE THE METHOD DETECTION LIMIT

NOTES:

1. GROUNDWATER WELLS GAUGED AND SAMPLED ON FEBRUARY 13, 2007.
2. SOURCE OF BASE MAP: FRED FIEDLER AND ASSOCIATES, DATED AUGUST 28, 2001.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 50 100

APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

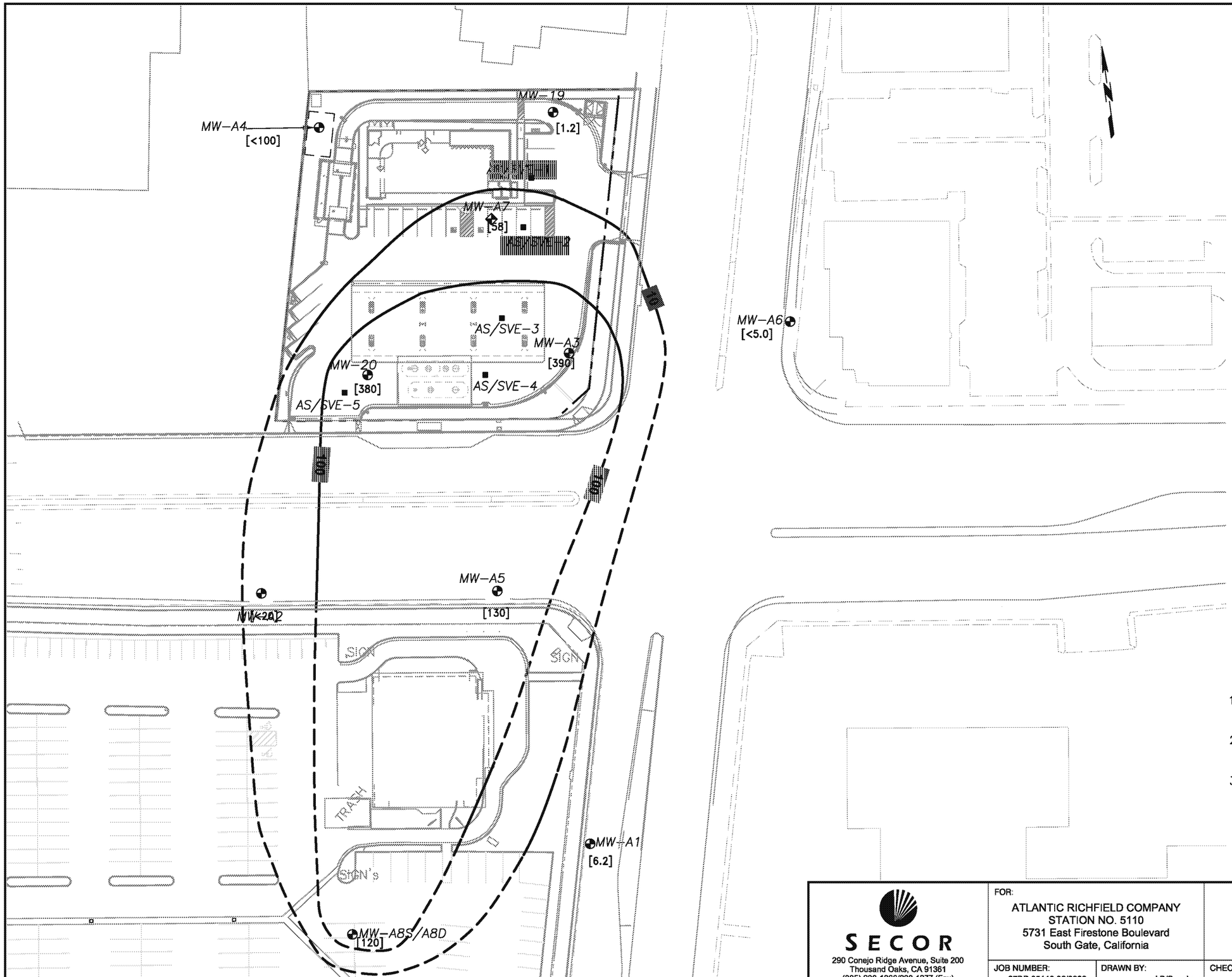
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

BENZENE ISOCONCENTRATION MAP

FIGURE: **12**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.06/0336	J.B/Sanchez	A. Folwler	T. Wong	1/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\5110-GW\dwg\2007-Q1\BP5110-Q1GW07.dwg | jbarboza | Apr 12, 2007 at 12:16 | Layout: BENZ_FIG12



LEGEND

— — — —	APPROXIMATE SITE PROPERTY LINE
MW-20	GROUNDWATER MONITORING WELL LOCATIONS
MW-A7	DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATIONS
AS/SVE-1	18" DIAMETER VAULT/NESTED AIR SPARGE/SOIL VAPOR EXTRACTION WELL LOCATIONS
[MTBE]	METHYL TERTIARY BUTYL ETHER CONCENTRATIONS IN MICROGRAMS PER LITER (µg/L)
	MTBE ISOCONCENTRATION CONTOUR LINE (DASHED WHERE INFERRED)
(J)	ESTIMATED VALUE; BELOW LABORATORY REPORTING LIMIT AND ABOVE THE METHOD DETECTION LIMIT

NOTES:

1. GROUNDWATER WELLS GAUGED AND SAMPLED ON FEBRUARY 13, 2007.
2. SOURCE OF BASE MAP: FRED FIEDLER AND ASSOCIATES, DATED AUGUST 28, 2001.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 50 100

APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

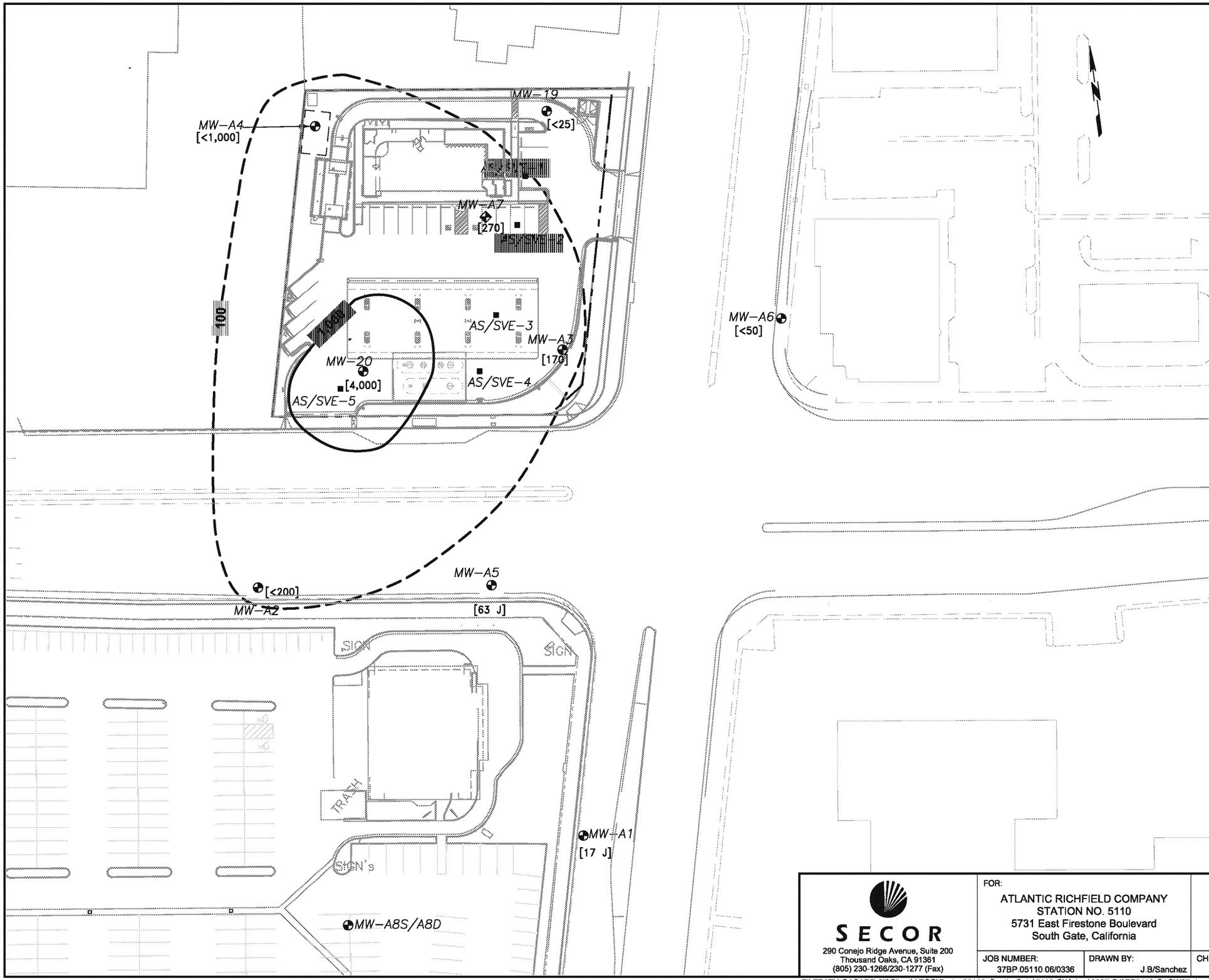
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

MTBE ISOCONCENTRATION MAP

FIGURE: **13**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.06/0336	J.B/Sanchez	A. Folwler	T. Wong	1/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\5110-GW\dwg\2007-Q1\BP5110-Q1GW07.dwg | jbarboza | Apr 12, 2007 at 12:15 | Layout: MTBE_FIG13



LEGEND

— — — —	APPROXIMATE SITE PROPERTY LINE
MW-20	GROUNDWATER MONITORING WELL LOCATIONS
MW-A7	DUAL COMPLETION GROUNDWATER MONITORING/SOIL VAPOR EXTRACTION WELL LOCATIONS
AS/SVE-1	18" DIAMETER VAULT/NESTED AIR SPARGE/SOIL VAPOR EXTRACTION WELL LOCATIONS
[TBA]	TERTIARY BUTANOL CONCENTRATIONS IN MICROGRAMS PER LITER (mg/L)
	TERTIARY BUTANOL ISOCONCENTRATION CONTOUR LINE (DASHED WHERE INFERRED)
(J)	ESTIMATED VALUE; BELOW LABORATORY REPORTING LIMIT AND ABOVE THE METHOD DETECTION LIMIT

NOTES:

1. GROUNDWATER WELLS GAUGED AND SAMPLED ON FEBRUARY 13, 2007.
2. SOURCE OF BASE MAP: FRED FIEDLER AND ASSOCIATES, DATED AUGUST 28, 2001.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 50 100
APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

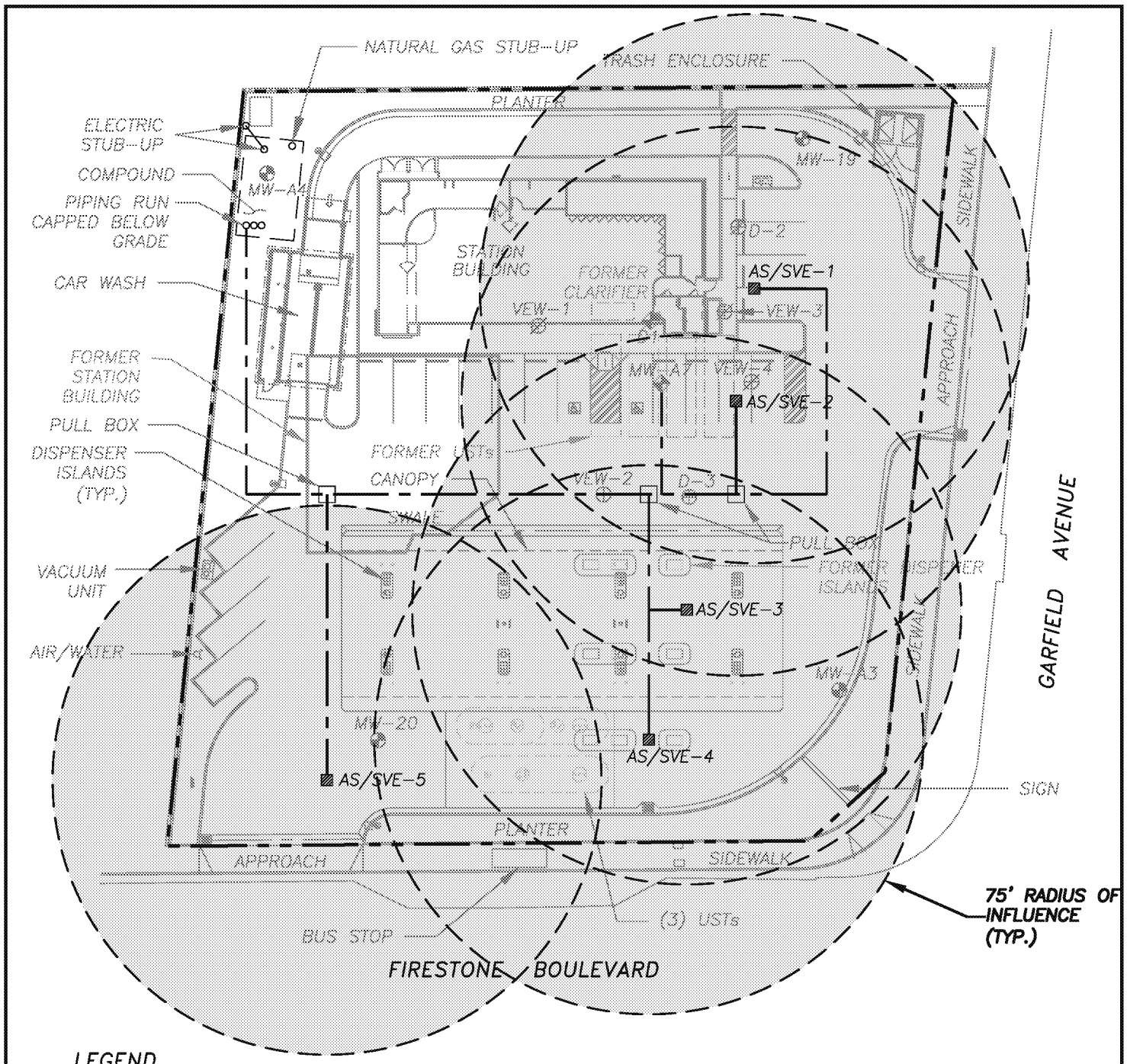
FOR:
ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

TBA ISOCONCENTRATION MAP

FIGURE: **14**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.06/0336	J.B/Sanchez	A. Folwler	T. Wong	1/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\5110-GW\dwg\2007-Q1\BP5110-Q1GW07.dwg | jbarboza | Apr 12, 2007 at 12:16 | Layout: TBA_FIG14



LEGEND

- APPROXIMATE SITE PROPERTY LINE
- TRENCH CENTER LINE (EACH PIPING RUN; 1-6" DIAM., 1-2" DIAM., & 1-1" DIAM. CONDUIT)
- MW-20 GROUNDWATER MONITORING WELL LOCATIONS
- MW-A7 DUAL COMPLETION GROUNDWATER MONITORING/ SOIL VAPOR EXTRACTION WELL LOCATIONS
- VEW-4 SOIL VAPOR EXTRACTION WELL LOCATIONS
- D-1 ABANDONED DUAL COMPLETION GROUNDWATER MONITORING/ SOIL VAPOR EXTRACTION WELL LOCATION
- VEW-1 ABANDONED SOIL VAPOR EXTRACTION WELL LOCATIONS
- AS/SVE-1 18" DIAMETER VAULT/NESTED AIR SPARGE/SOIL VAPOR EXTRACTION WELL LOCATIONS

NOTES:

1. SOURCE OF BASE MAP: FRED FIEDLER AND ASSOCIATES, DATED AUGUST 28, 2001.
2. SITE FEATURES AND LOCATIONS ARE APPROXIMATE.
3. MONITORING/EXTRACTION WELLS SURVEYED BY AZIMUTH GROUP, DATED MAY 13, 2002.

0 40 80

APPROXIMATE SCALE IN FEET

SECOR
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
(805) 230-1266/230-1277 (Fax)

FOR: ATLANTIC RICHFIELD COMPANY
STATION NO. 5110
5731 East Firestone Boulevard
South Gate, California

AS/SVE WELL LOCATIONS AND THEORETICAL RADIUS OF INFLUENCE FOR SVE

FIGURE: **15**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
37BP.05110.02.0936	R. Roman	A. Fowler	T. Wong	01/15/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\SCMU\2006-Q4\BP5110-PWLROI_FIG15.dwg | troman | Jan 12, 2007 at 14:10 | Layout: PWLROI_FIG15

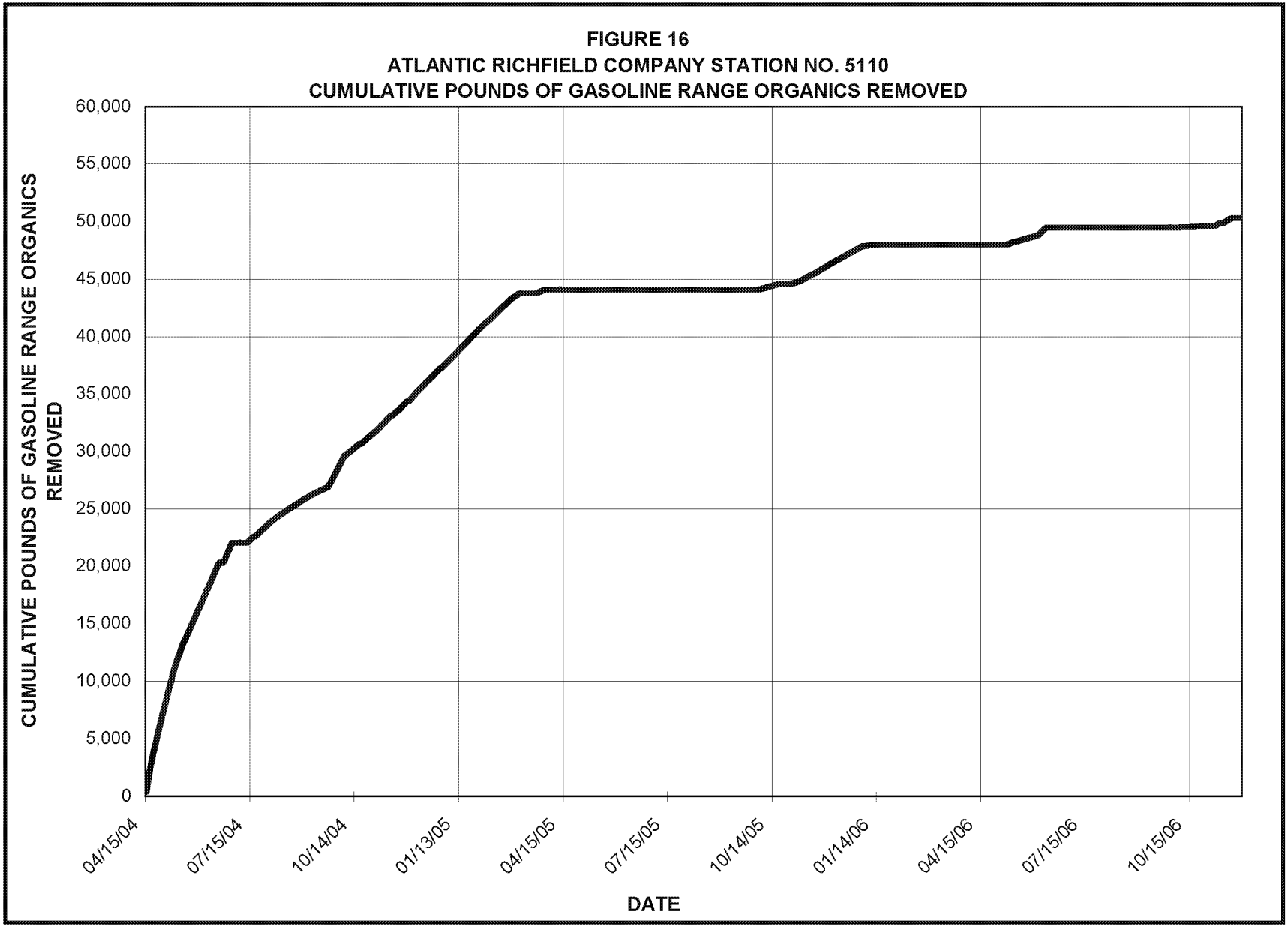
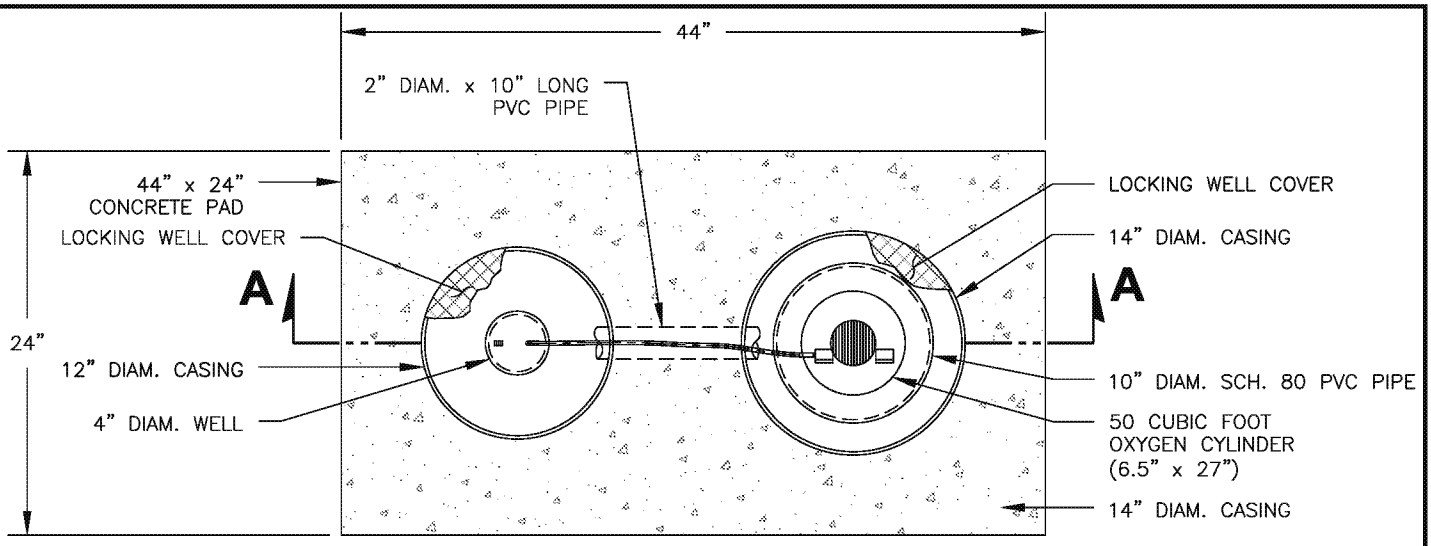


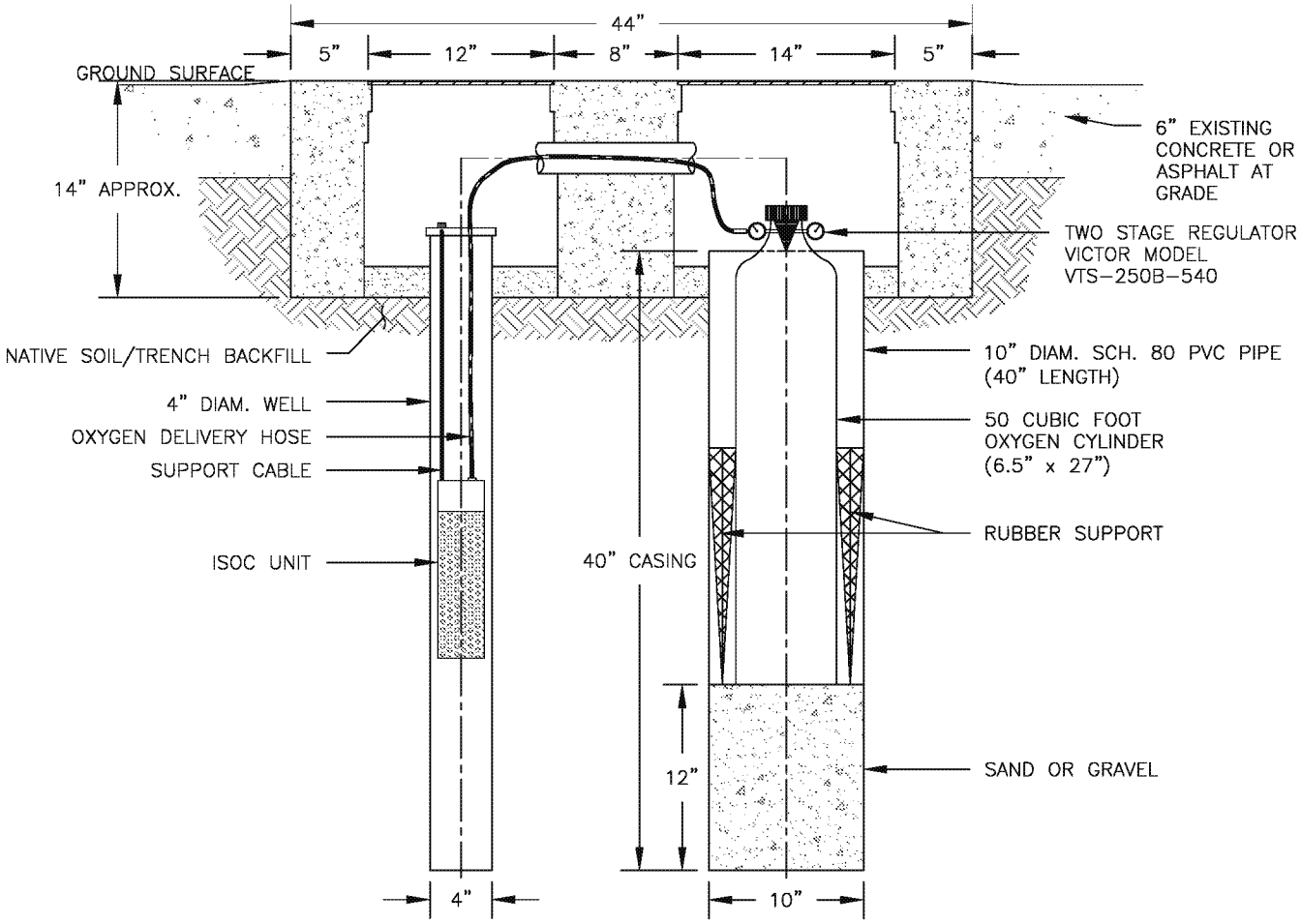
FIGURE 16
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
CUMULATIVE POUNDS OF GASOLINE RANGE ORGANICS REMOVED
CUMULATIVE POUNDS OF GASOLINE RANGE ORGANICS REMOVED
60,000
55,000
50,000
45,000
40,000
35,000
30,000
25,000
20,000
15,000
10,000
5,000
0
04/15/04
07/15/04
10/14/04
01/13/05
04/15/05
07/15/05
10/14/05
01/14/06
04/15/06
07/15/06
10/15/06
DATE



ISOC VAULT COMPLETION DETAIL

PLAN VIEW

SCALE: 1 IN. = 1 FT.



CONSTRUCTION NOTES:

1. ISOC SHOWN FOR ILLUSTRATION PURPOSES ONLY. ACTUAL DEPTH PER REPORT.

SECTION A-A
ISOC VAULT COMPLETION DETAIL

ELEVATION VIEW

SCALE: 1 IN. = 1 FT.

0 1 2

APPROXIMATE SCALE (FEET)

SECOR 290 Conejo Ridge Avenue, Suite 200 Thousand Oaks, CA 91361 (805) 230-1266/230-1277 (Fax)	FOR: ATLANTIC RICHFIELD COMPANY STATION NO. 5110 5731 East Firestone Boulevard South Gate, California		TYPICAL ISOC VAULT CONSTRUCTION DETAIL		FIGURE: 17
	JOB NUMBER: 37BP.05110.40	DRAWN BY: R. Roman	CHECKED BY: K. Kuru	APPROVED BY: K. Kuru	DATE: 04/11/07

FILEPATH:Q:\CADD-37\Client\ARCO\Project\5110_South_Gate\WellConstruction\2007-Apr\BP5110-ISOCWCD.dwg | troman | Apr 12, 2007 at 13:09 | Layout: ISOC

TABLES

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
Soil Boring Samples														
A-1-25	09/20/89	--	2.7	--	--	--	--	--	--	--	--	--	--	--
A-1-40	09/20/89	--	1.3	--	--	--	--	--	--	--	--	--	--	--
A-2-30	09/20/89	--	2,600	--	--	--	--	--	--	--	--	--	--	--
A-2-40	09/20/89	--	1,800	--	--	--	--	--	--	--	--	--	--	--
A-3-25	09/20/89	--	16,000	--	--	--	--	--	--	--	--	--	--	--
A-3-40	09/20/89	--	<0.4	--	--	--	--	--	--	--	--	--	--	--
Well Installation Samples				--										
MW-19-30	09/20/89	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
MW-20-30	09/21/89	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
UST Samples														
1A-17	10/04/89	--	0.3	--	--	--	--	--	--	--	--	--	--	--
1B-17	10/04/89	--	16	--	--	--	--	--	--	--	--	--	--	--
2A-17	10/04/89	--	1,400	--	--	--	--	--	--	--	--	--	--	--
2B-17	10/04/89	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
3A-17	10/04/89	--	1,100	--	--	--	--	--	--	--	--	--	--	--
3B-17	10/04/89	--	7,900	--	--	--	--	--	--	--	--	--	--	--
4A-17.5	10/04/89	--	1,400	--	--	--	--	--	--	--	--	--	--	--
4B-17	10/04/89	--	3.0	--	--	--	--	--	--	--	--	--	--	--

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
Well Installation Samples														
D-1-5	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-10	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-15	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-20	06/21/90	--	61 [a]	--	<0.10	<0.10	0.2	1.9	--	--	--	--	--	--
D-1-25	06/21/90	--	8,600	--	--	--	--	--	--	--	--	--	--	--
D-1-30	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-35	06/21/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-1-40	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-45	06/21/90	--	8.8	--	--	--	--	--	--	--	--	--	--	--
D-1-47	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-50	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-55	06/21/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-1-60	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-65	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-1-70	06/21/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-10	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-15	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-20	06/22/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-2-25	06/22/90	--	200 [a]	--	0.2	10	11	39						
D-2-30	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-35	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-40	06/22/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-2-45	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-47	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-50	06/22/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-2-55	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-60	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-65	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-2-70	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
D-3-10	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-15	06/22/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-3-20	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-25	06/22/90	--	0.3	--	<0.05	<0.05	0.05	0.3	--	--	--	--	--	--
D-3-30	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-35	06/22/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-3-40	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-45	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-47	06/22/90	--	<0.2	--	--	--	--	--	--	--	--	--	--	--
D-3-50	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-55	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-60	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-65	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-3-70	06/22/90	--	--	--	--	--	--	--	--	--	--	--	--	--
D-4-10	12/16/92	--	<10	--	<0.005	<0.005	<0.005	0.02	--	--	--	--	--	--
D-4-20	12/16/92	--	<10	--	0.007	0.007	0.007	0.024	--	--	--	--	--	--
D-4-25	12/16/92	--	<10	--	0.035	0.017	0.017	0.03	--	--	--	--	--	--
D-4-30	12/16/92	--	<10	--	0.017	0.004	0.004	0.015	--	--	--	--	--	--
D-4-35	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-4-40	12/16/92	--	<10	--	0.006	0.007	0.007	0.023	--	--	--	--	--	--
D-4-45	12/16/92	--	<10	--	0.13	0.01	0.01	0.19	--	--	--	--	--	--
D-4-50	12/16/02	--	<10	--	0.33	0.16	0.16	0.4	--	--	--	--	--	--
D-5-10	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-5-20	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-5-25	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-5-30	12/16/92	--	<10	--	0.03	0.006	0.026	0.081	--	--	--	--	--	--
D-5-35	12/16/92	--	<10	--	<0.005	0.006	<0.005	<0.015	--	--	--	--	--	--
D-5-40	12/16/92	--	<10	--	0.079	<0.005	0.042	0.064	--	--	--	--	--	--
D-5-45	12/16/92	--	<10	--	0.17	0.02	0.076	0.13	--	--	--	--	--	--
D-5-50	12/16/02	--	<10	--	0.014	0.008	0.005	<0.015	--	--	--	--	--	--

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
D-6-10	12/16/92	--	<10	--	0.005	0.007	<0.005	<0.015	--	--	--	--	--	--
D-6-20	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-6-25	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-6-30	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-6-35	12/16/92	--	<10	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
D-6-40	12/16/92	--	<10	--	<0.005	0.007	<0.005	0.018	--	--	--	--	--	--
D-6-45	12/16/92	--	<10	--	0.014	<0.005	0.056	0.096	--	--	--	--	--	--
D-6-50	12/16/92	--	<10	--	0.012	<0.005	0.006	<0.015	--	--	--	--	--	--
D-7-10	12/16/92	--	<10	--	0.011	<0.005	<0.005	0.058	--	--	--	--	--	--
D-7-20	12/16/92	--	<10	--	0.066	0.014	0.012	0.057	--	--	--	--	--	--
D-7-25	12/16/92	--	<10	--	0.91	1.4	0.31	1.4	--	--	--	--	--	--
D-7-30	12/16/92	--	<10	--	0.045	0.074	0.02	0.12	--	--	--	--	--	--
D-7-35	12/16/92	--	<10	--	0.009	0.011	<0.005	0.024	--	--	--	--	--	--
D-7-40	12/16/92	--	<10	--	0.006	0.013	<0.005	0.02	--	--	--	--	--	--
D-7-45	12/16/92	--	<10	--	0.19	0.23	0.057	0.28	--	--	--	--	--	--
D-7-50	12/16/92	--	<10	--	0.16	0.26	0.063	0.3	--	--	--	--	--	--
VEW-1-5	04/06/95	<1.0	--	--	<0.005	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-10	04/06/95	<1.0	--	--	<0.005	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-15	04/06/95	<1.0	--	--	<0.005	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-20	04/06/95	<1.0	--	--	<0.005	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-25	04/06/95	<1.0	--	--	<0.005	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-30	04/06/95	<1.0	--	--	0.0060	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-35	04/06/95	<1.0	--	--	<0.005	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-40	04/06/95	<1.0	--	--	<0.005	<0.005	<0.005	<0..015	--	--	--	--	--	--
VEW-1-50	04/06/95	1.6	--	--	0.2	0.18	0.065	0.22	--	--	--	--	--	--
VEW-1-60	04/06/95	<1.0	--	--	0.020	0.017	0.0067	0.024	--	--	--	--	--	--

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
VEW-2-5	04/05/95	--	--	--	0.25	0.45	0.51	4.3	--	--	--	--	--	--
VEW-2-10	04/05/95	--	--	--	1.7	6.8	14	94	--	--	--	--	--	--
VEW-2-15	04/05/95	--	--	--	0.031	0.079	0.019	0.15	--	--	--	--	--	--
VEW-2-20	04/05/95	--	--	--	0.56	0.61	0.15	0.99	--	--	--	--	--	--
VEW-2-25	04/05/95	--	--	--	60	370	150	770	--	--	--	--	--	--
VEW-2-30	04/05/95	--	--	--	0.28	0.14	0.24	1.7	--	--	--	--	--	--
VEW-2-35	04/05/95	--	--	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
VEW-2-40	04/05/95	--	--	--	0.037	1	1.1	7.3	--	--	--	--	--	--
VEW-2-50	04/05/95	--	--	--	5.1	20	15	90	--	--	--	--	--	--
VEW-2-60	04/05/95	--	--	--	7.4	26	35	250	--	--	--	--	--	--
VEW-3-5	04/05/95	--	--	--	0.027	0.055	0.024	0.2	--	--	--	--	--	--
VEW-3-10	04/05/95	--	--	--	<0.005	<0.005	<0.005	0.031	--	--	--	--	--	--
VEW-3-15	04/05/95	--	--	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
VEW-3-20	04/05/95	--	--	--	<0.005	0.005	<0.005	0.053	--	--	--	--	--	--
VEW-3-25	04/05/95	--	--	--	0.68	2.6	0.93	5.4	--	--	--	--	--	--
VEW-3-30	04/05/95	--	--	--	16	160	140	940	--	--	--	--	--	--
VEW-3-35	04/05/95	--	--	--	0.84	5.8	7.2	60	--	--	--	--	--	--
VEW-3-40	04/05/95	--	--	--	2.5	23	25	190	--	--	--	--	--	--
VEW-3-50	04/05/95	--	--	--	0.14	0.28	0.070	0.39	--	--	--	--	--	--
VEW-3-60	04/05/95	--	--	--	0.095	0.94	0.30	1.8	--	--	--	--	--	--
VEW-4-5	04/05/95	--	--	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
VEW-4-10	04/05/95	--	--	--	<0.005	<0.005	<0.005	<0.015	--	--	--	--	--	--
VEW-4-15	04/05/95	--	--	--	0.0050	<0.005	0.0060	0.040	--	--	--	--	--	--
VEW-4-20	04/05/95	--	--	--	0.03	0.076	0.045	0.035	--	--	--	--	--	--
VEW-4-25	04/05/95	--	--	--	<0.005	0.011	0.0086	0.054	--	--	--	--	--	--
VEW-4-30	04/05/95	--	--	--	0.69	1.4	1.7	11	--	--	--	--	--	--
VEW-4-35	04/05/95	--	--	--	<0.005	<0.005	<0.005	0.04	--	--	--	--	--	--
VEW-4-40	04/05/95	--	--	--	<0.005	0.005	<0.005	0.019	--	--	--	--	--	--
VEW-4-50	04/05/95	--	--	--	0.042	0.17	0.056	0.39	--	--	--	--	--	--
VEW-4-60	04/05/95	--	--	--	2.5	8.8	2.3	11	--	--	--	--	--	--
MW-A3-10'	12/01/99	<1.0	--	--	<0.0050	<0.0050	<0.0050	<0.015	<0.035	--	--	--	--	--
MW-A3-20'	12/01/99	<1.0	--	--	<0.0050	<0.0050	<0.0050	<0.015	<0.035	--	--	--	--	--
MW-A3-30'	12/01/99	<1.0	--	--	0.0079	<0.0050	<0.0050	<0.015	<0.035	--	--	--	--	--
MW-A3-40'	12/01/99	1.8	--	--	0.21	0.0061	0.072	0.31	0.037	--	--	--	--	--
MW-A3-45'	12/01/99	--	<5.0	--	0.046	<0.002	0.039	0.208	<0.005	--	--	--	--	--
MW-A3-55'	12/01/99	--	<5.0	--	0.0028	<0.002	<0.002	<0.004	<0.005	--	--	--	--	--

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
MW-A4-10'	12/01/99	<1.0	--	--	<0.0050	<0.0050	<0.0050	<0.015	<0.035	--	--	--	--	--
MW-A4-20'	12/01/99	<1.0	--	--	<0.0050	<0.0050	<0.0050	<0.015	<0.035	--	--	--	--	--
MW-A4-30'	12/01/99	<1.0	--	--	0.0073	<0.0050	<0.0050	<0.015	<0.035	--	--	--	--	--
MW-A4-40'	12/01/99	<1.0	--	--	0.019	<0.0050	<0.0050	<0.015	<0.035	--	--	--	--	--
MW-A4-45'	12/01/99	--	<5.0	--	0.150	0.17	0.028	0.082	<0.005	--	--	--	--	--
MW-A4-55'	12/01/99	--	<5.0	--	0.0098	<0.002	0.013	0.0066	<0.005	--	--	--	--	--
MW-A4-65'	12/01/99	--	<5.0	--	0.1	<0.002	0.0073	0.0068	<0.005	--	--	--	--	--
MW-A5-5	10/21/01	<0.50	--	--	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	--
MW-A5-10	10/21/01	<0.41	--	--	<0.0017	<0.0017	<0.0017	<0.0017	<0.0043	<0.043	<0.0043	<0.0043	<0.0043	--
MW-A5-15	10/21/01	<0.50	--	--	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	--
MW-A5-20	10/21/01	<0.42	--	--	<0.0017	<0.0017	<0.0017	<0.0035	<0.0043	<0.043	<0.0043	<0.0043	<0.0043	--
MW-A5-25	10/21/01	<0.50	--	--	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	--
MW-A5-30	10/21/01	<0.50	--	--	<0.0020	<0.0020	<0.0020	0.00061[J]	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	--
MW-A5-35	10/21/01	<0.50	--	--	0.0060	<0.0020	0.0016[J]	0.0055	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	--
MW-A5-40	10/21/01	<0.50	--	--	<0.0018	<0.0018	<0.0018	<0.0036	<0.0044	<0.044	<0.0044	<0.0044	<0.0044	--
MW-A5-45	10/21/01	<0.44	--	--	<0.0018	<0.0018	<0.0018	<0.0036	<0.0045	<0.045	<0.0045	<0.0045	<0.0045	--
MW-A5-50	10/21/01	<0.41	--	--	0.00063[J]	<0.0017	<0.0017	<0.0033	<0.0041	<0.041	<0.0041	<0.0041	<0.0041	--
MW-A5-55	10/21/01	<0.45	--	--	<0.0018	<0.0018	<0.0018	<0.0036	<0.0044	<0.044	<0.0044	<0.0044	<0.0044	--
MW-A5-60	10/21/01	<0.44	--	--	0.0017[J]	0.00043[J]	0.00039[J]	0.0024[J]	<0.0045	<0.045	<0.0045	<0.0045	<0.0045	--
MW-A5-65	10/21/01	<0.45	--	--	0.0013[J]	0.00029[J]	0.00026[J]	0.0020[J]	0.0035[J]	<0.050	<0.0050	<0.0050	<0.0050	--
MW-A6-5	10/30/01	<0.42	--	--	<0.0044	<0.0044	<0.0044	<0.0044	<0.0089	<0.044	<0.0089	<0.0089	<0.0089	--
MW-A6-10	10/30/01	<0.42	--	--	<0.0040	<0.0040	<0.0040	<0.0040	<0.0081	<0.040	<0.0081	<0.0081	<0.0081	--
MW-A6-15	10/30/01	<0.45	--	--	<0.0044	<0.0044	<0.0044	<0.0044	<0.0087	<0.044	<0.0087	<0.0087	<0.0087	--
MW-A6-20	10/30/01	<0.50	--	--	<0.0056	<0.0056	<0.0056	<0.0056	<0.011	<0.056	<0.011	<0.011	<0.011	--
MW-A6-25	10/30/01	<0.42	--	--	<0.0041	<0.0041	<0.0041	<0.0041	<0.0083	<0.041	<0.0083	<0.0083	<0.0083	--
MW-A6-30	10/30/01	<0.50	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.050	<0.010	<0.010	<0.010	--
MW-A6-35	10/30/01	<0.50	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.050	<0.010	<0.010	<0.010	--
MW-A6-40	10/30/01	0.33[J]	--	--	<0.0044	<0.0044	<0.0044	<0.0044	<0.0088	<0.044	<0.0088	<0.0088	<0.0088	--
MW-A6-45	10/30/01	<0.43	--	--	0.0058	<0.0042	<0.0042	<0.0042	<0.0084	<0.042	<0.0084	<0.0084	<0.0084	--
MW-A6-50	10/30/01	<0.42	--	--	0.0055	<0.0042	<0.0042	<0.0042	<0.0084	<0.042	<0.0084	<0.0084	<0.0084	--
MW-A6-55	10/30/01	<0.45	--	--	0.0069	<0.0045	<0.0045	<0.0045	<0.0090	<0.045	<0.0090	<0.0090	<0.0090	--
MW-A6-60	10/30/01	<0.50	--	--	<0.0045	<0.0045	<0.0045	<0.0045	<0.0090	<0.045	<0.0090	<0.0090	<0.0090	--
MW-A6-65	10/30/01	<0.44	--	--	0.0082	<0.0044	<0.0044	<0.0044	<0.0088	<0.044	<0.0088	<0.0088	<0.0088	--

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
MW-A7-15	04/16/02	19	--	--	<0.26	0.23[J]	0.19[J]	1.3	1.2	11	<0.52	<0.52	<0.52	--
MW-A7-20	04/16/02	3.0	--	--	0.88	2.7	0.57	3.2	7.7	16	<0.50	<0.50	<0.50	--
MW-A7-25	04/16/02	29	--	--	1.5	30	33	170	<2.1	<11	<2.1	<2.1	<2.1	--
MW-A7-30	04/16/02	1,400	--	--	0.46[J]	14	22	120	<1.2	<6.1	<1.2	<1.2	<1.2	--
MW-A7-35	04/16/02	620	--	--	0.71	16	21	120	0.79	<2.6	<0.52	<0.52	<0.52	--
MW-A7-40	04/16/02	18	--	--	0.33	8.1	13	69	0.48[J]	<2.6	<0.51	<0.51	<0.51	--
MW-A7-45	04/16/02	16	--	--	1.2	3.9	0.77	4.1	<0.47	<2.4	<0.47	<0.47	<0.47	--
MW-A7-50	04/16/02	0.76	--	--	0.30	0.81	0.16	0.72	0.12	0.050	<0.0090	<0.0090	<0.0090	--
MW-A7-55	04/16/02	7.9	--	--	0.24	0.21	0.29	1.2	0.17	0.12	<0.010	<0.010	<0.010	--
MW-A7-60	04/16/02	<0.41	--	--	<0.0050	0.0025[J]	<0.0050	0.010	<0.010	<0.050	<0.010	<0.010	<0.010	--
MW-A7-65	04/16/02	<0.50	--	--	0.020	0.022	0.011	0.061	0.01	<0.050	<0.010	<0.010	<0.010	--
UST Samples														
TK-1A-17	02/07/02	1.80	--	--	0.098	0.20	0.07	0.30	<0.010	<0.010	0.02	18	1.3	--
TK-1B-17	02/07/02	4,600	--	--	6.9	69	69	340	<2.2	<2.2	<2.2	6.8[J]	8.1	--
TK-2A-17	02/07/02	17	--	--	0.29	1.2	0.30	1.8	<0.49	<0.49	<0.49	1.5[J]	3.0	--
TK-2B-17	02/07/02	1,900	--	--	1.2	6.5	24	110	<0.45	<0.45	<0.45	8.4	4.6	--
TK-3A-17	02/07/02	3,300	--	--	11	120	71	390	<2.2	<2.2	<2.2	5.9[J]	4.7	--
TK-3B-17	02/07/02	1.20	--	--	<0.27	0.33	0.14[J]	0.81	<0.54	<0.54	<0.54	23.00	1.30	--
TK-4A-17	02/07/02	8,800	--	--	16	270	130	820	<27	<27	<27	<140	<27	--
TK-4B-17	02/07/02	2.10	--	--	<0.26	0.11[J]	<0.26	0.31	<0.52	<0.52	<0.52	24	1.3	--
Dispenser Samples														
D-1-2	02/01/02	<0.50	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	<0.010	--
D-2-2	02/01/02	<0.50	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	<0.010	--
D-3-2	02/01/02	<0.65	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	<0.010	--
D-4-2	02/01/02	<0.50	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	<0.010	--
D-5-2	02/01/02	<1.6	--	--	<0.0067	<0.0067	<0.0067	<0.0067	<0.013	<0.013	<0.013	0.18	0.0099[J]	--
D-6-2	02/01/02	3,500	--	--	<0.58	3.2	4.1	360	<1.2	<1.2	<1.2	4.7[J]	2.7	--
D-7-2	02/01/02	<0.79	--	--	<0.0072	<0.0072	<0.0072	0.025	<0.014	<0.014	<0.014	<0.072	0.22	--
D-8-2	02/01/02	<1.1	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	0.18	--
D-9-2	02/01/02	<0.50	--	--	<0.0068	<0.0068	<0.0068	<0.0068	<0.014	<0.014	<0.014	<0.068	<0.014	--
Product Line Samples														
PL-1-4	02/01/02	<0.45	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	<0.010	--
PL-2-4	02/01/02	<0.50	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	0.10	0.04	--
PL-3-3	02/01/02	<0.57	--	--	<0.0064	<0.0064	<0.0064	<0.0064	<0.013	<0.013	<0.013	<0.064	<0.013	--
PL-4-3	02/01/02	<0.57	--	--	<0.0045	<0.0045	<0.0045	<0.0045	<0.0091	<0.0091	<0.0091	<0.045	<0.0091	--
Confirmation Sample														
CS-1-5	02/04/02	3,200	--	--	<0.26	1.80	2.90	23.00	<0.53	<0.53	<0.53	2.3[J]	6.10	--

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
Clarifier Sample														
CL-1A-7	02/05/02	8.90	--	--	<0.0068	<0.0068	<0.0068	<0.0068	<0.014	<0.014	<0.014	0.068	<0.014	--
CL-1B-7	02/05/02	8.20	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	<0.010	--
Shoring Boring Samples														
SB-1-10	02/07/02	<0.50	--	--	<0.0044	0.0021[J]	<0.0044	<0.0044	<0.0088	<0.0088	<0.0088	<0.044	<0.0088	--
SB-2-5	02/07/02	<0.50	--	--	<0.0045	0.020	0.0046	0.028	<0.0091	<0.0091	<0.0091	<0.045	<0.0091	--
SB-2-10	02/07/02	<0.42	--	--	<0.0050	0.10	0.019	0.120	<0.010	<0.010	<0.010	<0.050	<0.010	--
SB-2-15	02/07/02	<0.50	--	--	<0.0050	<0.0050	<0.0050	<0.0050	<0.010	<0.010	<0.010	<0.050	<0.010	--
SB-3-5	02/07/02	<0.45	--	--	<0.0050	0.023	0.017	0.092	<0.010	<0.010	<0.010	<0.050	<0.010	--
SB-3-10	02/07/02	<0.40	--	--	<0.0041	0.0019[J]	<0.0041	0.0044	<0.0082	<0.0082	<0.0082	<0.041	<0.0082	--
SB-3-15	02/07/02	<0.45	--	--	<0.0041	<0.0041	<0.0041	<0.0041	<0.0082	<0.0082	<0.0082	<0.041	<0.0082	--
SB-4-5	02/07/02	<0.50	--	--	<0.0050	0.0023[J]	<0.0050	0.0051	<0.010	<0.010	<0.010	<0.050	<0.010	--
SB-4-10	02/07/02	<0.40	--	--	<0.0045	<0.0045	<0.0045	<0.0045	<0.0091	<0.0091	<0.0091	<0.045	<0.0091	--
SB-4-15	02/07/02	<0.43	--	--	<0.0042	<0.0042	<0.0042	<0.0042	<0.0085	<0.0085	<0.0085	<0.042	<0.0085	--
SB-5-5	02/07/02	1,200	--	--	<0.85	12	31	200	<1.7	<1.7	<1.7	<8.5	<1.7	--
SB-5-10	02/07/02	65	--	--	<0.24	0.16[J]	0.39	2.9	<0.48	<0.48	<0.48	<2.4	<0.48	--
SB-5-15	02/07/02	850	--	--	0.20[J]	7.6	14	89	<0.91	<0.91	<0.91	<4.5	0.55[J]	--
Air Sparge/Soil Vapor Extraction Well Samples														
AS/SVE-1-5	09/30/03	<1.0	--	--	<0.0018	<0.0018	<0.0018	<0.0036	<0.0045	<0.045	<0.0045	<0.0045	<0.0045	<0.27
AS/SVE-1-10	09/30/03	<1.0	--	--	0.00053[J]	<0.0018	0.01	<0.0036	0.0072	0.13	<0.0045	<0.0045	<0.0045	<0.27
AS/SVE-1-15	09/30/03	4,100	--	--	0.99[J]	22	49	350	<2.8	<56	<2.8	<2.8	<2.8	<170
AS/SVE-1-20	09/30/03	3,200	--	--	1.2	36	76	510	<2.5	<50	<2.5	<2.5	<2.5	<150
AS/SVE-1-25	09/30/03	2.1	--	--	<0.10	0.18	0.081[J]	0.59	0.37	0.76[J]	<0.25	<0.25	<0.25	<15
AS/SVE-1-30	09/30/03	1.8	--	--	1.3	14	8.4	46	1.5	<17	<0.83	<0.83	<0.83	<50
AS/SVE-1-35	09/30/03	520	--	--	0.056[J]	1.40	3.9	23	0.089[J]	<5.9	<0.30	<0.30	<0.30	<18
AS/SVE-1-40	09/30/03	0.19[J]	--	--	0.0021[J]	0.010	0.013	0.083	0.051	0.23	<0.0058	<0.0058	<0.0058	<0.35
AS/SVE-1-45	09/30/03	1.0	--	--	0.11	0.051	0.076	0.32	0.0060	<0.044	<0.0044	<0.0044	<0.0044	<0.27
AS/SVE-1-50	09/30/03	0.59[J]	--	--	0.15	0.011	0.095	0.28	0.097	0.11	0.0012[J]	<0.0044	<0.0044	<0.26
AS/SVE-1-55	09/30/03	0.26[J]	--	--	0.0014[J]	0.0037	0.014	0.028	0.026	0.061	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-1-60	09/30/03	<1.0	--	--	<0.0020	0.0020	0.0017[J]	0.011	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-1-65	09/30/03	2.9	--	--	0.23	0.53	0.21	1.2	0.14[J]	<5.0	<0.25	<0.25	<0.25	<15
AS/SVE-1-70	09/30/03	<1.0	--	--	0.041	<0.0017	<0.0017	<0.00082[J]	0.0059	<0.044	<0.0044	<0.0044	<0.0044	<0.26

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
AS/SVE-2-5	10/01/03	<1.0	--	--	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-2-10	10/01/03	<0.91	--	--	<0.0017	<0.0017	<0.0017	<0.0035	<0.0044	<0.044	<0.0044	<0.0044	<0.0044	<0.26
AS/SVE-2-15	10/01/03	0.14[J]	--	--	0.00063[J]	<0.0020	0.0011[J]	0.0080	0.032	1.1	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-2-20	10/01/03	3.40	--	--	<0.12	<0.12	<0.12	<0.23	<0.29	12	<0.29	<0.29	<0.29	<17
AS/SVE-2-25	10/01/03	27[J]	--	--	0.44	1.8	0.37	2.5	3.2	10	<0.22	<0.22	<0.22	<13
AS/SVE-2-30	10/01/03	43[J]	--	--	2.1	9.0	2.0	11	11	6.4	<0.25	<0.25	0.13[J]	<15
AS/SVE-2-35	10/01/03	2,500	--	--	1.5	40	65	300	0.54[J]	<28	<1.4	<1.4	<1.4	<85
AS/SVE-2-40	10/01/03	3,100	--	--	0.42[J]	21	51	290	<3.0	<60	<3.0	<3.0	<3.0	<180
AS/SVE-2-45	10/01/03	6,700	--	--	12	150	95	430	<2.5	<50	<2.5	<2.5	<2.5	<150
AS/SVE-2-50	10/01/03	25[J]	--	--	2.2	6.6	1.4	8.3	0.57	<4.5	<0.23	<0.23	<0.23	<14
AS/SVE-2-55	10/01/03	11[J]	--	--	0.32	0.046	0.17	0.58	0.21	0.73	0.0026[J]	<0.0050	0.00088[J]	<0.30
AS/SVE-2-60	10/01/03	<1.0	--	--	0.0029	0.0079	0.0040	0.022	0.0055	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-2-65	10/01/03	<1.0	--	--	0.0022	<0.0020	<0.0020	<0.0040	0.015	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-2-70	10/01/03	0.33[J]	--	--	0.14	0.13	0.10	0.48	0.027	0.056	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-3-5	10/04/03	500	--	--	0.22	<0.12	4.1	3.4	<0.30	<6.0	<0.30	<0.30	<0.30	<18
AS/SVE-3-10	10/04/03	0.48[J]	--	--	0.053	<0.0016	0.047	0.053	<0.0040	0.013[J]	<0.0040	<0.0040	<0.0040	<0.24
AS/SVE-3-15	10/04/03	0.31[J]	--	--	0.0032	0.0059	0.0023	0.11	0.025	0.013[J]	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-3-20	10/04/03	0.22[J]	--	--	0.00060[J]	0.0015[J]	<0.0024	0.0030[J]	0.0042[J]	<0.060	<0.0060	<0.0060	<0.0060	<0.36
AS/SVE-3-25	10/04/03	80	--	--	1.6	3.8	0.59	3.3	0.45	<5.0	<0.25	<0.25	<0.25	<15
AS/SVE-3-30	10/04/03	<1.2	--	--	0.0025	0.011	0.0031	0.022	0.022	0.011[J]	<0.0056	<0.0056	<0.0056	<0.34
AS/SVE-3-35	10/04/03	0.15[J]	--	--	0.00087[J]	0.0036	0.0013[J]	0.0084	0.017	0.011[J]	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-3-40	10/04/03	0.69[J]	--	--	0.053	0.057	0.023	0.11	0.17	0.058	<0.0050	<0.0050	0.0010[J]	<0.30
AS/SVE-3-45	10/04/03	0.56[J]	--	--	0.036	0.014	0.024	0.10	<0.0039	<0.039	<0.0039	<0.0039	<0.0039	<0.23
AS/SVE-3-50	10/04/03	<43	--	--	0.48	0.75	0.18	0.57	0.061[J]	<4.3	<0.21	<0.21	<0.21	<13
AS/SVE-3-55	10/04/03	1.4	--	--	0.14	0.16	0.093	0.45	0.16	0.081	0.00073[J]	<0.0042	0.00073[J]	<0.25
AS/SVE-3-60	10/04/03	0.35[J]	--	--	0.024	0.020	0.015	0.059	<0.0050	0.022[J]	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-3-65	10/04/03	<0.87	--	--	0.0029	<0.0020	<0.0020	0.0014[J]	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-3-70	10/04/03	0.12[J]	--	--	0.0051	0.0068	0.0027	0.011	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
AS/SVE-4-5	09/30/03	0.79[J]	--	--	<0.10	<0.10	0.075[J]	0.86	<0.25	<5.0	<0.25	<0.25	<0.25	<15
AS/SVE-4-10	09/30/03	2,700	--	--	0.91[J]	32	54	320	<2.5	<50	<2.5	<2.5	<2.5	<150
AS/SVE-4-15	09/30/03	3,100	--	--	1.4	45	41	220	<2.1	<43	<2.1	<2.1	<2.1	<130
AS/SVE-4-20	09/30/03	0.16[J]	--	--	0.0012[J]	0.023	0.022	0.14	0.0022	0.072	<0.0062	<0.0062	<0.0062	<0.37
AS/SVE-4-25	09/30/03	1,100	--	--	<0.46	8.9	15	84	<1.2	<23	<1.2	<1.2	<1.2	<69
AS/SVE-4-30	09/30/03	1.8	--	--	2.6	9.4	2.3	12	0.80	<8.9	<0.44	<0.44	<0.44	<27
AS/SVE-4-35	09/30/03	<1.1	--	--	0.011	0.026	0.0099	0.059	0.068	0.23	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-4-40	09/30/03	<1.1	--	--	<0.0024	<0.0024	<0.0024	0.0022[J]	0.012	0.63	<0.0059	<0.0059	<0.0059	<0.36
AS/SVE-4-45	09/30/03	1.3	--	--	0.12	0.081	0.028	0.16	0.29	0.22	0.0011[J]	<0.0050	0.0010[J]	<0.30
AS/SVE-4-50	09/30/03	0.18[J]	--	--	0.031	0.0041	0.0041	0.023	0.0011[J]	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-4-55	09/30/03	0.56[J]	--	--	0.085	0.0062	0.029	0.16	0.011	<0.050	0.00053[J]	<0.0050	<0.0050	<0.30
AS/SVE-4-60	09/30/03	1.3	--	--	0.48	<0.090	0.16	0.45	0.058[J]	<4.5	<0.23	<0.23	<0.23	<14
AS/SVE-4-65	09/30/03	<1.0	--	--	0.018	0.0035	0.0086	0.026	0.0019[J]	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-4-70	09/30/03	0.29[J]	--	--	0.0011[J]	0.0014[J]	0.0020	0.012	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-5	09/29/03	<1.2	--	--	<0.0023	<0.0023	<0.0023	<0.0046	<0.0057	<0.057	<0.0057	<0.0057	<0.0057	<0.34
AS/SVE-5-10	09/29/03	<0.90	--	--	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-15	09/29/03	<0.85	--	--	<0.0017	<0.0017	<0.0017	<0.0034	<0.0043	<0.043	<0.0043	<0.0043	<0.0043	<0.26
AS/SVE-5-20	09/29/03	<1.0	--	--	<0.0020	<0.0020	<0.0020	0.0014[J]	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-25	09/29/03	<1.1	--	--	<0.0024	<0.0024	<0.0024	<0.0047	<0.0059	<0.059	<0.0059	<0.0059	<0.0059	<0.35
AS/SVE-5-30	09/29/03	<1.0	--	--	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-35	09/29/03	<1.0	--	--	0.00076[J]	<0.0022	<0.0022	0.00089[J]	0.0035[J]	<0.056	<0.0056	<0.0056	<0.0056	<0.33
AS/SVE-5-40	09/29/03	<1.0	--	--	0.0011[J]	<0.0020	0.0013[J]	0.0026[J]	0.0061	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-45	09/29/03	<1.0	--	--	0.0024	<0.0020	0.0038	0.0072	0.017	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-50	09/29/03	0.14[J]	--	--	0.028	<0.0020	0.0063	0.013	0.0098	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-55	09/29/03	<1.0	--	--	0.00089[J]	<0.0020	<0.0020	<0.0040	0.045	0.026[J]	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-60	09/29/03	<1.0	--	--	0.0074	<0.0020	0.0038	<0.0040	0.079	0.060	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-65	09/29/03	0.28[J]	--	--	0.19	0.011	0.027	0.039	0.0062	<0.050	<0.0050	<0.0050	<0.0050	<0.30
AS/SVE-5-70	09/29/03	<0.89	--	--	<0.0017	<0.0017	<0.0017	<0.0035	0.0024[J]	<0.044	<0.0044	<0.0044	<0.0044	<0.26

TABLE 1
HISTORICAL SOIL ANALYTICAL RESULTS
ATLANTIC RICHFIELD COMPANY STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CA

EPA Method:		8015B			8020/8260B									
Sample I.D.	Sample Date	TPHg mg/kg	TFH mg/kg	GRO mg/kg	B mg/kg	T mg/kg	E mg/kg	X mg/kg	MTBE mg/kg	TBA mg/kg	DIPE mg/kg	ETBE mg/kg	TAME mg/kg	ETHANOL mg/kg
MW-A8-5	10/12/05	--	--	<0.32	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
MW-A8-10	10/12/05	--	--	<0.32	<0.0016	<0.0016	<0.0016	<0.0032	<0.0040	<0.040	<0.0040	<0.0040	<0.0040	<0.24
MW-A8-15	10/12/05	--	--	4.7[J]	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
MW-A8-20	10/12/05	--	--	<0.40	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
MW-A8-25	10/12/05	--	--	<0.34	<0.0017	<0.0017	<0.0017	<0.0034	<0.0042	<0.042	<0.0042	<0.0042	<0.0042	<0.25
MW-A8-30	10/12/05	--	--	<0.36	<0.0018	<0.0018	<0.0018	<0.0035	<0.0044	<0.044	<0.0044	<0.0044	<0.0044	<0.26
MW-A8-35	10/12/05	--	--	<0.31	<0.0016	<0.0016	<0.0016	<0.0033	<0.0041	<0.041	<0.0041	<0.0041	<0.0041	<0.25
MW-A8-40	10/12/05	--	--	<0.36	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	<0.050	<0.0050	<0.0050	<0.0050	<0.30
MW-A8-45	10/12/05	--	--	<0.31	<0.0017	<0.0017	<0.0017	<0.0033	<0.0042	<0.042	<0.0042	<0.0042	<0.0042	<0.25
MW-A8-50	10/12/05	--	--	<0.32	<0.0017	<0.0017	<0.0017	<0.0034	<0.0042	<0.042	<0.0042	<0.0042	<0.0042	<0.25
MW-A8-55	10/12/05	--	--	<0.35	<0.0018	<0.0018	<0.0018	<0.0035	<0.0044	<0.044	<0.0044	<0.0044	<0.0044	<0.27
MW-A8-60	10/12/05	--	--	<0.34	<0.0020	<0.0020	<0.0020	<0.0040	0.0047[J]	0.013[J]	<0.0050	<0.0050	<0.0050	<0.30
MW-A8-65	10/12/05	--	--	<0.33	0.00080[J]	<0.0020	<0.0020	<0.0040	0.0067	0.021[J]	<0.0050	<0.0050	<0.0050	<0.30
MW-A8-70	10/12/05	--	--	<0.34	<0.0017	<0.0017	<0.0017	<0.0034	0.0012[J]	<0.042	<0.0042	<0.0042	<0.0042	<0.25
MW-A8-75	10/12/05	--	--	<0.31	<0.0016	<0.0016	<0.0016	<0.0031	<0.0039	<0.039	<0.0039	<0.0039	<0.0039	<0.23
MW-A8-80	10/12/05	--	--	<0.40	<0.0016	<0.0016	<0.0016	<0.0032	<0.0040	0.018[J]	<0.0040	<0.0040	<0.0040	<0.24
MW-A8-85	10/12/05	--	--	<0.35	<0.0018	<0.0018	<0.0018	<0.0036	<0.0045	0.014[J]	<0.0045	<0.0045	<0.0045	<0.27
MW-A8-90	10/12/05	--	--	<0.32	<0.0020	<0.0020	<0.0020	<0.0040	<0.0050	0.095	<0.0050	<0.0050	<0.0050	<0.30

Notes:
mg/kg- Milligrams per kilogram
TPHg - Total petroleum hydrocarbons as gasoline
TFH - Total fuel hydrocarbons
GRO - Gasoline Range Organics (C4-C14)
B - Benzene
T - Toluene
E - Ethylbenzene
X - Total xylenes
Prior to 6/22/90 EPA Method 8020 used for BTEX Analysis

-- - Not Analyzed
TBA - Tertiary butanol
DIPE - Di-isopropyl ether
ETBE - Ethyl-tertiary-butyl ether
TAME - Tertiary-amyl-methyl ether
MTBE - Methyl-tertiary-butyl ether
J- estimated value: below the reporting limit and above the method detection limit
<0.0050 - Below reporting limit and method detection limit

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
D-1	06/27/90		107.62	57.06	0.00	50.56	1,600	800	300	77	370	-	-	-	-	-	-	D-1	
	06/29/93			56.15	0.00	51.47	1,100	330	45	62	87	-	-	-	-	-	-	D-1	
	09/20/93			55.17	0.00	52.45	13,000	1,700	290	430	480	-	-	-	-	-	-	D-1	
	11/15/93			54.59	0.00	53.03	8,400	2,400	430	690	1,200	-	-	-	-	-	-	D-1	
	04/18/94			51.86	0.00	55.76	7,800	1,400	330	610	1,500	-	-	-	-	-	-	D-1	
	11/04/94			50.83	0.00	56.79	15,000	2,400	230	1,400	2,900	-	-	-	-	-	-	D-1	
	03/20/95			49.63	0.00	57.99	12,000	1,900	520	240	1,800	-	-	-	-	-	-	D-1	
	04/13/95			49.55	0.00	58.07	15,000	1,600	420	1,200	2,000	-	-	-	-	-	-	D-1	
	09/08/95			48.14	0.00	59.48	11,000	1,500	220	900	1,300	-	-	-	-	-	-	D-1	
	11/15/95			47.87	0.00	59.75	10,000	1,600	310	1,200	1,600	-	-	-	-	-	-	D-1	
	01/22/96			50.10	0.00	57.52	3,400	680	51	350	290	-	-	-	-	-	-	D-1	
	04/30/96			46.89	0.00	60.73	7,800	1,200	110	930	1,100	-	-	-	-	-	-	D-1	
	07/31/96			46.76	0.00	60.86	14,000	1,900	580	1,200	2,600	3,300	-	-	-	-	-	D-1	
	11/22/96			46.64	0.00	60.98	12,000	1,500	2,100	620	3,100	790	-	-	-	-	-	D-1	
	03/14/97			45.71	0.00	61.91	6,200	780	270	550	1,100	650	-	-	-	-	-	D-1	
	05/05/97			45.51	0.00	62.11	2,100	250	53	170	240	200	-	-	-	-	-	D-1	
	07/22/97			45.52	0.00	62.10	870	130	2.2	98	95	120	-	-	-	-	-	D-1	
	10/10/97			45.68	0.00	61.94	70	8.0	0.78	5.4	9.5	<10	-	-	-	-	-	D-1	
	01/30/98			45.35	0.00	62.27	10,000	1,300	350	910	2,600	770	-	-	-	-	-	D-1	
	06/05/98			44.34	0.00	63.28	11,000	1,100	150	580	1,800	630	-	-	-	-	-	D-1	
	09/14/98			43.70	0.00	63.92	11,000	1,100	150	690	1,700	770	-	-	-	-	-	D-1	
	12/18/98			43.40	0.00	64.22	16,000	1,800	520	1,100	3,500	1,300	-	-	-	-	-	D-1	
	02/15/99			43.45	0.00	64.17	23,000	2,700	810	1,600	5,300	1,900	-	-	-	-	-	D-1	
	05/12/99			43.35	0.00	64.27	18,000	2,200	440	1,300	3,300	1,600	-	-	-	-	-	D-1	
	09/29/99			43.24	0.00	64.38	13,000	2,000	1,200	970	3,400	1,900	-	-	-	-	-	D-1	
	09/29/99	DUP		-	-	-	13,000	2,100	1,300	1,000	3,400	1,900	-	-	-	-	-	MW-99	
	12/07/99			45.85	0.00	61.77	5,500	650	210	200	580	11,000	-	-	-	-	-	D-1	
	03/21/00		107.65	45.25	0.00	62.40	11,000	1,200	230	690	2,100	2,000	-	-	-	-	-	D-1	
	06/14/00			45.69	0.00	61.96	21,000	2,500	490	1,300	4,000	2,300	<1,000	<100	<100	<100	-	D-1	
	08/23/00			45.64	0.00	62.01	9,300	2,100	240	950	2,400	1,700	630 J	13 J	<100	12 J	-	D-1	
	12/08/00			46.70	0.00	60.95	3,800	490	44	240	500	540	200	3.1 J	<10	2.5 J	-	D-1	
	02/15/01			46.89	0.00	60.76	14,000	2,400	380	1,000	4,100	4,000	1,100	<50	<50	<50	-	D-1	
	06/14/01			46.98	0.00	60.67	340	25	<1.5	2.6	13	160	78	<5.0	<5.0	<5.0	-	D-1	
	09/14/01			47.64	0.00	60.01	250	9.7	4.0	2.2	4.3	180	76	1.6 J	<5.0	<5.0	-	D-1	
	12/07/01			48.04	0.00	59.61	7,700	1,800	330	630	1,700	1,100	600	5.4 J	<12	3.9 J	-	D-1	
	03/28/02	ABN		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
MW-A1	01/30/98		107.68	44.38	0.00	63.30	<50	<0.30	<0.30	<0.30	<0.60	<10	-	-	-	-	-	MW-A1	
	06/05/98			43.30	0.00	64.38	<50	<0.30	<0.30	<0.30	<0.60	<10	-	-	-	-	-	MW-A1	
	09/14/98			42.75	0.00	64.93	<50	<0.30	<0.30	<0.30	<0.60	<10	-	-	-	-	-	MW-A1	
	12/18/98			42.65	0.00	65.03	<50	<0.30	<0.30	<0.30	0.93	<10	-	-	-	-	-	MW-A1	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-A1	02/15/99		107.68	42.80	0.00	64.88	64	1.0	8.3	1.7	11	<10	-	-	-	-	-	MW-A1	
	05/12/99			42.90	0.00	64.78	<50	<0.3	<0.3	<0.3	<0.6	<10	-	-	-	-	-	MW-A1	
	09/29/99			43.95	0.00	63.73	<50	<2.0	<2.0	<2.0	<4.0	<5.0	-	-	-	-	-	MW-A1	
	12/07/99			44.45	0.00	63.23	<50	<2.0	<2.0	<2.0	<4.0	<5.0	-	-	-	-	-	MW-A1	
	03/21/00		105.52	44.47	0.00	61.05	<50	<2.0	<2.0	<2.0	<4.0	<5.0	-	-	-	-	-	MW-A1	
	06/14/00	INA		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Paved over
	08/23/00	INA		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	Paved over
	12/08/00			46.30	0.00	59.22	50	1.5	<0.30	0.33	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A1	
	02/15/01			46.45	0.00	59.07	<50	<0.30	<0.30	<0.30	0.99	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A1	
	06/14/01			46.65	0.00	58.87	<50	<0.30	<0.30	0.50	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A1	
	09/14/01			47.25	0.00	58.27	22 J	<0.30	0.23 J	0.32	0.54 J	4.9 J	5.8 J	<5.0	<5.0	<5.0	-	MW-A1	
	12/07/01			47.68	0.00	57.84	<100	<5.0	<5.0	<5.0	1.1 J	8.0	9.5 J	<5.0	<5.0	<5.0	-	MW-A1	
	03/28/02			47.71	0.00	57.81	<100	<5.0	<5.0	<5.0	<5.0	19	15 J	<5.0	<5.0	<5.0	-	MW-A1	
	06/06/02		107.69	47.93	0.00	59.76	30 J	<2.0	<2.0	<2.0	<4.0	11	20 J	<5.0	<5.0	<5.0	-	MW-A1	
	09/05/02			48.75	0.00	58.94	28 J	<2.0	<2.0	<2.0	<4.0	18	21 J	<5.0	<5.0	<5.0	-	MW-A1	
	12/05/02			49.35	0.00	58.34	50	<2.0	<2.0	<2.0	<4.0	18	28 J	<5.0	<5.0	<5.0	-	MW-A1	
	02/18/03			49.61	0.00	58.08	23 J	<2.0	<2.0	<2.0	<4.0	12	17 J	0.91 J	<5.0	<5.0	<150	MW-A1	
	05/19/03			49.71	0.00	57.98	29 J	<2.0	<2.0	<2.0	<4.0	14	20 J	1.6 J	<5.0	<5.0	<150	MW-A1	
	08/19/03			49.98	0.00	57.71	<50	<2.0	<2.0	<2.0	<4.0	7.2	7.5 J	1.0 J	<5.0	<5.0	<150	MW-A1	
	11/18/03			50.42	0.00	57.27	26 J	<2.0	<2.0	<2.0	<4.0	4.8 J	6.5 J	0.58 J	<5.0	<5.0	<150	MW-A1	
	02/24/04			50.70	0.00	56.99	<50	<2.0	<2.0	<2.0	<4.0	2.7 J	5.4 J	0.69 J	<5.0	<5.0	<150	MW-A1	
	05/25/04			51.01	0.00	56.68	<50	0.94 J	<2.0	<2.0	<4.0	4.1 J	<50	0.56 J	<5.0	<5.0	<150	MW-A1	
	08/24/04			51.57	0.00	56.12	25 J	1.4 J	0.55 J	0.26 J	0.74 J	2.0 J	<50	0.39 J	<5.0	<5.0	<150	MW-A1	
	11/16/04			52.18	0.00	55.51	<50	4.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A1	
	02/08/05			52.00	0.00	55.69	22 J	1.8 J	<2.0	0.42 J	1.5 J	0.86 J	<50	<5.0	<5.0	<5.0	<150	MW-A1	
	05/03/05			52.26	0.00	55.43	<50	1.6 J	<2.0	0.34 J	0.56 J	1.2 J	<50	0.35 J	<5.0	<5.0	<150	MW-A1	
	08/02/05			52.14	0.00	55.55	<50	1.1 J	<2.0	<2.0	<4.0	2.3 J	<50	0.69 J	<5.0	<5.0	<150	MW-A1	
	11/01/05			51.74	0.00	55.95	28 J	1.5 J	<2.0	0.35 J	0.61 J	2.2 J	5.5 J	0.58 J	<5.0	<5.0	<150	MW-A1	
	01/31/06			51.39	0.00	56.30	32 J	<2.0	<2.0	<2.0	<4.0	1.8 J	8.9 J	0.44 J	<5.0	<5.0	<150	MW-A1	
	05/02/06			50.95	0.00	56.74	33 J	1.6 J	<2.0	0.35 J	<4.0	3.0 J	15 J	0.70 J	<5.0	<5.0	<150	MW-A1	
	08/01/06			50.63	0.00	57.06	46 J	0.78 J	<2.0	<2.0	<4.0	4.0 J	19 J	0.93 J	<5.0	<5.0	<150	MW-A1	
	11/07/06			50.21	0.00	57.48	36 J	2.0	<2.0	0.47 J	<4.0	3.7 J	25 J	0.91 J	<5.0	<5.0	<150	MW-A1	
	02/13/07			50.24	0.00	57.45	34 J	2.7	1.0 J	0.76 J	1.2 J	6.2	17 J	1.1 J	<5.0	<5.0	<150	MW-A1	
MW-A2	01/30/98		107.91	41.76	0.00	66.15	390	15	3.0	1.6	3.2	<10	-	-	-	-	-	MW-A2	
	06/05/98			38.90	0.00	69.01	190	7.8	<0.30	1.3	3.4	13	-	-	-	-	-	MW-A2	
	09/14/98			38.90	0.00	69.01	220	12	0.68	1.3	2.2	<10	-	-	-	-	-	MW-A2	
	12/18/98			37.30	0.00	70.61	250	9.7	1.4	1.4	2.5	<20	-	-	-	-	-	MW-A2	
	02/15/99			36.85	0.00	71.06	350	15	6.6	2.9	12	12	-	-	-	-	-	MW-A2	
	05/12/99			36.45	0.00	71.46	310	7.5	1.5	0.93	2.1	<10	-	-	-	-	-	MW-A2	
	09/29/99			36.57	0.00	71.34	<50	7.6	<2.0	<2.0	<4.0	<10	-	-	-	-	-	MW-A2	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-A2	12/07/99		107.91	39.61	0.00	68.30	98	4.9	<2.0	<2.0	<4.0	<5.0	-	-	-	-	-	MW-A2	
	03/21/00		105.25	37.37	0.00	67.88	84	3.9	<2.0	<2.0	<4.0	<5.0	-	-	-	-	-	MW-A2	
	06/14/00			37.95	0.00	67.30	50	2.8	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	08/23/00			38.04	0.00	67.21	<500	2.6	0.34 J	0.42 J	1.2 J	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	12/08/00			38.95	0.00	66.30	77	2.3	0.70	0.52	1.6	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	02/15/01			46.42	0.00	58.83	<50	1.2	<0.30	<0.30	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	06/14/01			39.45	0.00	65.80	<50	0.66	<0.30	<0.30	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	09/14/01			40.86	0.00	64.39	24 J	0.35	0.63	0.15 J	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	12/07/01			44.18	0.00	61.07	<100	<5.0	<5.0	<5.0	<5.0	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	03/28/02			45.36	0.00	59.89	<100	<5.0	<5.0	<5.0	<5.0	<5.0	<25	<5.0	<5.0	<5.0	-	MW-A2	
	03/28/02	DUP	107.40	-	-	-	<100	<5.0	<5.0	<5.0	<5.0	<5.0	<25	<5.0	<5.0	<5.0	-	MW-99	
	06/06/02			43.87	0.00	63.53	53	<2.0	0.26 J	<2.0	0.38 J	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	06/06/02	DUP		-	-	-	12 J	<2.0	0.14 J	<2.0	0.22 J	<5.0	<50	<5.0	<5.0	<5.0	-	MW-99	
	09/05/02			51.20	0.00	56.20	11 J	<2.0	<2.0	<2.0	0.19 J	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A2	
	12/05/02			45.85	0.00	61.55	34 J	13	<2.0	4.9	0.55 J	2.9 J	2.0 J	<5.0	<5.0	<5.0	-	MW-A2	
	02/18/03			47.68	0.00	59.72	26 J	5.6	<2.0	2.3	<4.0	0.72 J	<50	<5.0	<5.0	<5.0	<150	MW-A2	
	05/19/03			48.51	0.00	58.89	97	19	0.61 J	12	<4.0	1.8 J	<50	<5.0	<5.0	<5.0	<150	MW-A2	
	08/19/03			49.05	0.00	58.35	57	13	0.41 J	5.4	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A2	
	11/18/03			49.46	0.00	57.94	740	270	25	72	21	1.2 J	<50	<5.0	<5.0	<5.0	<150	MW-A2	
	02/24/04			49.85	0.00	57.55	2,700	920	34	200	150	<50	<500	<50	<50	<50	<1,500	MW-A2	
	05/25/04			50.13	0.00	57.27	7,000	2,100	460	420	990	<200	<2,000	<200	<200	<200	<6,000	MW-A2	
	08/24/04			51.03	0.00	56.37	4,300	1,500	260	230	440	<200	<2,000	<200	<200	<200	<6,000	MW-A2	
	11/16/04			51.43	0.00	55.97	2,200	330	46	61	130	<20	<200	<20	<20	<20	<600	MW-A2	
	02/08/05			51.10	0.00	56.30	2,100	290	15	50	100	<20	<200	<20	<20	<20	<600	MW-A2	
	05/03/05			51.39	0.00	56.01	7,100	3,000	43 J	560	1,200	<250	<2,500	<250	<250	<250	<7,500	MW-A2	
	08/02/05			51.39	0.00	56.01	15,000	3,700	36 J	620	1,100	<250	600 J	<250	<250	<250	<7,500	MW-A2	
	11/01/05			50.88	0.00	56.52	3,200	1,800	25	300	480	<50	<500	<50	<50	<50	<1,500	MW-A2	
	01/31/06			50.50	0.00	56.90	3,400	3,700	32 J	510	240	<200	<2,000	<200	<200	<200	<6,000	MW-A2	
	05/02/06			50.15	0.00	57.25	630	680	<100	44 J	<200	3,100	5,300	<250	<250	22 J	<7,500	MW-A2	
	08/01/06			49.82	0.00	57.58	2,900	1,500	6.4 J	150	110	<50	<500	<50	<50	<50	<1,500	MW-A2	Bolt ??? Strapped
	11/07/06			49.60	0.00	57.80	6,400	3,200	<100	210	110 J	<250	<2,500	<250	<250	<250	<7,500	MW-A2	
	02/13/07			49.40	0.00	58.00	4,200	2,100	8.2	210	240	<20	<200	<20	<20	<20	<600	MW-A2	
MW-A3	12/07/99		106.00	44.72	0.00	61.28	16,000	2,900	510	1,000	3,800	390	-	-	-	-	-	MW-A3	
	03/21/00		106.76	45.15	0.00	61.61	9,000	3,000	550	810	2,000	180	-	-	-	-	-	MW-A3	
	06/14/00			45.39	0.00	61.37	1,500	190	14	53	210	44	130	<10	<10	<10	-	MW-A3	
	08/23/00			45.17	0.00	61.59	2,500	460	25	230	99	28	25 J	3.6 J	<25	<25	-	MW-A3	
	08/23/00	DUP		-	-	-	3,000	470	42	220	160	32	32 J	3.3 J	<20	<20	-	MW-99	
	12/08/00			46.04	0.00	60.72	3,000	410	20	150	270	27	20 J	2.3 J	<5.0	<5.0	-	MW-A3	
	02/15/01			46.20	0.00	60.56	2,800	690	14	300	120	39	<50	<5.0	<5.0	<5.0	-	MW-A3	
	06/14/01			46.37	0.00	60.39	2,800	720	<6.0	350	58	42	<50	<5.0	<5.0	<5.0	-	MW-A3	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-A3	09/14/01		106.76	46.99	0.00	59.77	4,200	1,300	36	340	510	43	20 J	2.4 J	<5.0	<5.0	-	MW-A3	
	12/07/01			47.46	0.00	59.30	7,700	2,900	51 J	730	1,100	62	18 J	3.0 J	<5.0	<5.0	-	MW-A3	
	03/28/02		108.97	47.75	0.00	61.22	4,200	1,800	<50	420	250	75	21 J	2.8 J	<5.0	<5.0	-	MW-A3	
	06/06/02			47.98	0.00	60.99	5,100	1,900	7.1	500	380	50	54	2.2 J	<5.0	<5.0	-	MW-A3	
	09/05/02			48.75	0.00	60.22	2,800	1,100	10	240	560	120	34 J	<20	<20	<20	-	MW-A3	
	12/05/02			49.47	0.00	59.50	4,200	1,600	3.4 J	670	180	200	51 J	3.6 J	<20	<20	-	MW-A3	
	02/18/03			49.66	0.00	59.31	6,500	1,300	<2.0	660	280	320	100 J	<50	<50	<50	<1,500	MW-A3	
	05/19/03			49.81	0.00	59.16	3,100	910	<20	74	58	240	54 J	<50	<50	<50	<1,500	MW-A3	
	08/19/03			50.04	0.00	58.93	4,700	1,400	<40	260	390	300	<1,000	6.8 J	<100	<100	<3,000	MW-A3	
	11/18/03			50.93	0.00	58.04	4,000	1,300	<40	280	460	280	170 J	12 J	<100	<100	<3,000	MW-A3	
	02/24/04			50.84	0.00	58.13	11,000	3,700	<50	330	800	500	400 J	24 J	<120	<120	<3,800	MW-A3	
	02/24/04	DUP		-	-	-	12,000	3,800	<100	310	760	520	380 J	25 J	<250	<250	<7,500	Dup-5110-20040224	
	05/25/04			51.17	0.00	57.80	7,900	3,700	<50	210	370	520	520 J	23 J	<120	<120	<3,800	MW-A3	
	05/25/04	DUP		-	-	-	7,400	2,800	<100	160	270	430	380 J	18 J	<250	<250	<7,500	Dup-5110-20040525	
	08/24/04			51.67	0.00	57.30	9,600	4,000	<50	150	200	720	570 J	23 J	<120	<120	<3,800	MW-A3	
	08/24/04	DUP		-	-	-	9,100	1,900	<100	78 J	98 J	320	290 J	<250	<250	<250	<7,500	DUP-5110-20040824	
	11/16/04			50.81	0.00	58.16	7,000	2,900	<80	<80	<160	570	<2,000	<200	<200	<200	<6,000	MW-A3	
	11/16/04	DUP		-	-	-	4,900	2,300	<40	<40	<80	520	<1,000	<100	<100	<100	<3,000	DUP-5110-20041116	
	02/08/05			52.08	0.00	56.89	5,400	2,600	<100	36 J	<200	520	320 J	12 J	<250	<250	<7,500	MW-A3	
	02/08/05	DUP		-	-	-	5,900	2,600	<80	36 J	<160	490	340 J	12 J	<200	<200	<6,000	DUP-5110-20050208	
	05/03/05			52.45	0.00	56.52	5,300	2,500	<100	28 J	<200	490	<2,500	12 J	<250	<250	<7,500	MW-A3	
	05/03/05	DUP		-	-	-	4,700	1,900	<20	22	<40	440	330 J	13 J	<50	10 J	<1,500	DUP-5110-20050503	
	08/02/05			52.31	0.00	56.66	2,900	1,000	<50	10 J	<100	270	180 J	7.0 J	<120	<120	<3,800	MW-A3	
	08/02/05	DUP		-	-	-	2,200	950	<20	9.8 J	<40	270	170 J	6.2 J	<50	<50	<1,500	DUP-5110-20050802	
	11/01/05			51.87	0.00	57.10	2,900	1,300	<50	24 J	<100	320	160 J	6.2 J	<120	<120	<3,800	MW-A3	
	11/01/05	DUP		-	-	-	3,100	1,300	<20	22	<40	420	190 J	7.5 J	<50	<50	<1,500	DUP-5110-20051101	
	01/31/06			51.63	0.00	57.34	39 J	0.61 J	<2.0	<2.0	<4.0	4.2 J	<50	<5.0	<5.0	<5.0	<150	MW-A3	
	01/31/06	DUP		-	-	-	46 J	0.44 J	<2.0	<2.0	<4.0	4.2 J	<50	<5.0	<5.0	<5.0	<150	DUP-5110-20060131	
	05/02/06			51.39	0.00	57.58	4,400	1,000	<40	54	<80	<100	<1,000	<100	<100	<100	<3,000	MW-A3	
	05/02/06	DUP		-	-	-	4,100	1,400	<40	24 J	<80	370	230 J	5.6 J	<100	<100	<3,000	DUP-5110-20060502	
	08/01/06			51.08	0.00	57.89	3,100	1,200	<80	24 J	<160	290	<2,000	<200	<200	<200	<6,000	MW-A3	
	08/01/06	DUP		-	-	-	2,900	1,200	<20	25	<40	340	140 J	6.1 J	<50	<50	<1,500	DUP-5110-20060801	
	11/07/06			50.43	0.00	58.54	2,700	1,100	<20	38	<40	230	<500	3.9 J	<50	<50	<1,500	MW-A3	
	11/07/06	DUP		-	-	-	2,400	870	<20	37	<40	210	110 J	3.0 J	<50	<50	<1,500	DUP-5110-20061107	
	02/13/07			50.68	0.00	58.29	2,000	530	0.73 J	19	2.2 J	300	180	4.9 J	<5.0	2.0 J	<150	MW-A3	
	02/13/07	DUP		-	0.00	-	2,000	640	0.48 J	16	1.7 J	390	170	5.1	<5.0	2.3 J	<150	DUP-5110-20070213	
MW-A4	12/07/99		108.48	45.57	0.00	62.91	36,000	6,500	8,400	1,400	4,900	<500	-	-	-	-	-	MW-A4	
	03/21/00		108.56	46.00	0.00	62.56	28,000	7,400	9,800	1,500	4,200	<500	-	-	-	-	-	MW-A4	
	03/21/00	DUP		-	-	-	34,000	7,200	9,700	1,400	4,200	<500	-	-	-	-	-	MW-99	
	06/14/00			46.45	0.00	62.11	44,000	8,600	11,000	1,700	6,100	<400	<4,000	<400	<400	<400	-	MW-A4	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-A4	06/14/00	DUP	108.56	-	-	-	42,000	9,000	12,000	1,800	6,500	<400	<4,000	<400	<400	<400	-	MW-99	
	08/23/00			46.11	0.00	62.45	49,000	9,000	13,000	1,700	6,300	20 J	<4,000	<400	<400	<400	-	MW-A4	
	12/08/00			47.50	0.00	61.06	45,000	7,900	8,500	1,500	5,000	<20	86 J	<20	<20	<20	-	MW-A4	
	12/08/00	DUP		-	-	-	46,000	8,200	9,000	1,600	5,500	1.1 J	110	<5.0	<5.0	<5.0	-	MW-99	
	02/15/01			47.66	0.00	60.90	22,000	5,500	4,100	440	3,100	<20	<200	<20	<20	<20	-	MW-A4	
	02/15/01	DUP		-	-	-	23,000	5,300	4,000	120	3,600	<5.0	<50	<5.0	<5.0	<5.0	-	MW-99	
	06/14/01			47.78	0.00	60.78	29,000	7,200	4,800	1,600	4,800	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A4	
	06/14/01	DUP		-	-	-	29,000	6,600	4,400	1,500	4,400	<5.0	<50	<5.0	<5.0	<5.0	-	MW-99	
	09/14/01			48.38	0.00	60.18	33,000	7,700	7,100	1,700	4,900	<20	<200	<20	<20	<20	-	MW-A4	
	09/14/01	DUP		-	-	-	33,000	6,600	6,100	1,500	4,200	<5.0	54	<5.0	<5.0	<5.0	-	MW-99	
	12/07/01			48.85	0.00	59.71	21,000	5,200	2,800	800 J	3,100	<5.0	94	<5.0	<5.0	<5.0	-	MW-A4	
	12/07/01	DUP		-	-	-	24,000	5,200	3,000	790 J	3,200	<5.0	110	<5.0	<5.0	<5.0	-	MW-99	
	03/28/02			49.10	0.00	59.46	12,000	5,000	640	1,300	1,200	<20	47 J	<20	<20	<20	-	MW-A4	
	06/06/02		110.71	49.30	0.00	61.41	20,000	5,200	1,400	1,200	2,000	<20	56 J	<20	<20	<20	-	MW-A4	
	09/05/02			50.07	0.00	60.64	14,000	5,000	920	910	2,000	<50	<500	<50	<50	<50	-	MW-A4	
	09/05/02	DUP		-	-	-	11,000	3,500	320	740	570	0.31 J	46 J	<5.0	<5.0	<5.0	-	MW-99	
	12/05/02			50.12	0.00	60.59	11,000	3,200	420	480	1,000	<25	51 J	<25	<25	<25	-	MW-A4	
	12/05/02	DUP		-	-	-	10,000	2,300	310	460	840	<25	59 J	<25	<25	<25	-	MW-99	
	02/18/03			59.99	0.00	50.72	21,000	3,500	510	800	2,300	<100	<1,000	<100	<100	<100	<3,000	MW-A4	
	02/18/03	DUP		-	-	-	36,000	7,100	1,200	1,600	5,600	<500	<5,000	<500	<500	<500	<15,000	MW-99	
	05/19/03			51.13	0.00	59.58	23,000	5,400	1,300	1,200	3,800	<500	<5,000	<500	<500	<500	<15,000	MW-A4	
	05/19/03	DUP		-	-	-	21,000	5,000	1,200	1,000	3,400	<500	<5,000	<500	<500	42 J	<15,000	MW-99	
	08/19/03			61.33	0.00	49.38	11,000	4,400	490	950	2,600	<250	<2,500	<250	<250	<250	<7,500	MW-A4	
	08/19/03	DUP		-	-	-	16,000	5,000	540	960	2,700	<500	<5,000	<500	<500	<500	<15,000	MW-99	
	11/18/03			51.84	0.00	58.87	16,000	4,500	1,600	880	3,000	<250	<2,500	<250	<250	<250	<7,500	MW-A4	
	11/18/03	DUP		-	-	-	12,000	4,500	1,700	910	3,000	<200	220 J	<200	<200	<200	<6,000	Dup-5110-20031118	
	02/24/04			52.00	0.00	58.71	9,900	4,000	670	650	1,500	<250	<2,500	<250	<250	<250	<7,500	MW-A4	
	05/25/04			52.37	0.00	58.34	22,000	8,400	1,900	1,500	4,500	<250	<2,500	<250	<250	<250	<7,500	MW-A4	
	08/24/04			52.26	0.00	58.45	20,000	7,000	1,200	1,100	2,700	<250	<2,500	<250	<250	<250	<7,500	MW-A4	
	11/16/04			53.44	0.00	57.27	24,000	7,400	980	1,100	2,700	<500	<5,000	<500	<500	<500	<15,000	MW-A4	
	02/08/05			53.60	0.00	57.11	26,000	9,000	1,400	1,600	4,100	<250	<2,500	<250	<250	<250	<7,500	MW-A4	
	05/03/05			53.49	0.00	57.22	30,000	11,000	1,700	1,800	4,600	<500	<5,000	<500	<500	<500	<15,000	MW-A4	
	08/02/05			53.50	0.00	57.21	34,000	11,000	550	1,400	2,900	<1,000	<10,000	<1,000	<1,000	<1,000	<30,000	MW-A4	
	11/01/05			53.23	0.00	57.48	37,000	11,000	1,300	1,700	4,200	<500	<5,000	<500	<500	<500	<15,000	MW-A4	
	01/31/06			52.88	0.00	57.83	23,000	9,000	770	1,300	2,900	<500	<5,000	<500	<500	<500	<15,000	MW-A4	
	05/02/06			52.63	0.00	58.08	26,000	13,000	<400	220 J	<800	3,400	1,800 J	58 J	<1,000	<1,000	<30,000	MW-A4	
	08/01/06			52.36	0.00	58.35	26,000	9,500	730	1,200	2,500	<500	<5,000	<500	<500	<500	<15,000	MW-A4	
	11/07/06			51.84	0.00	58.87	29,000	12,000	1,300	1,600	3,300	<400	<4,000	<400	<400	<400	<12,000	MW-A4	
	02/13/07			51.90	0.00	58.81	22,000	8,800	550	1,000	1,900	<100	<1000	<100	<100	<100	<3,000	MW-A4	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-A5	12/07/01		105.72	47.11	0.00	58.61	<100	1.4 J	<5.0	<5.0	<5.0	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A5	
	03/28/02			47.36	0.00	58.36	110	<5.0	<5.0	1.1 J	2.4 J	<5.0	<25	<5.0	<5.0	<5.0	-	MW-A5	
	06/06/02		107.91	47.52	0.00	60.39	23 J	<2.0	<2.0	0.19 J	0.47 J	0.30 J	<50	<5.0	<5.0	<5.0	-	MW-A5	
	09/05/02			48.37	0.00	59.54	120	<2.0	<2.0	0.35 J	0.43 J	<5.0	<50	<5.0	<5.0	<5.0	-	MW-A5	
	12/05/02			49.05	0.00	58.86	60	<2.0	<2.0	<2.0	<4.0	0.58 J	8.4 J	<5.0	<5.0	<5.0	-	MW-A5	
	02/18/03			49.06	0.00	58.85	300	1.9 J	<2.0	5.8	31	27	15 J	1.6 J	<5.0	<5.0	<150	MW-A5	
	05/19/03			49.41	0.00	58.50	680	35	<10	59	300	100	97 J	7.8 J	<25	<25	<750	MW-A5	
	08/19/03			49.70	0.00	58.21	260	3.9	0.38 J	1.9 J	62	73	61	4.1 J	<5.0	<5.0	<150	MW-A5	
	11/18/03			50.15	0.00	57.76	420	6.4	1.0 J	4.4	140	140	180	7.3	<5.0	<5.0	<150	MW-A5	
	02/24/04			50.43	0.00	57.48	660	16	1.8 J	16	220	160	310	10	<10	<10	<300	MW-A5	
	05/25/04			50.74	0.00	57.17	1,000	26	1.6 J	22	190	290	440	14	<10	<10	<300	MW-A5	
	08/24/04			51.30	0.00	56.61	1,000	74	16	37	250	290	770	15	<10	<10	<300	MW-A5	
	11/16/04			51.90	0.00	56.01	2,400	180	<8.0	93	660	370	790	<20	<20	<20	<600	MW-A5	
	02/08/05			51.84	0.00	56.07	1,100	53	1.4 J	18	210	280	440	11	<10	<10	<300	MW-A5	
	05/03/05			51.95	0.00	55.96	490	37	<5.0	1.9 J	15	190	390	8.3 J	<12	<12	<380	MW-A5	
	08/02/05			51.88	0.00	56.03	250	40	<4.0	0.92 J	3.1 J	140	250	6.1 J	<10	<10	<300	MW-A5	
	11/01/05			51.45	0.00	56.46	180	44	<4.0	0.76 J	3.5 J	140	170	4.4 J	<10	<10	<300	MW-A5	
	01/31/06			51.17	0.00	56.74	140	14	0.92 J	1.3 J	1.9 J	65	92	1.9 J	<5.0	<5.0	<150	MW-A5	
	05/02/06			50.77	0.00	57.14	310	96	0.76 J	2.3	10	110	140	2.1 J	<5.0	<5.0	<150	MW-A5	
	08/01/06			50.45	0.00	57.46	190	31	0.52 J	1.1 J	2.1 J	110	100	2.4 J	<5.0	0.47 J	<150	MW-A5	
	11/07/06			50.21	0.00	57.70	110	26	0.51 J	1.5 J	2.8 J	56	37 J	1.1 J	<5.0	<5.0	<150	MW-A5	
	02/13/07			50.07	0.00	57.84	190	36	<4.0	2.2 J	2.6 J	130	63 J	2.3 J	<10	<10	<300	MW-A5	
MW-A6	12/07/01		105.78	46.86	0.00	58.92	150	59	<5.0	<5.0	<5.0	<5.0	18 J	<5.0	<5.0	<5.0	-	MW-A6	
	03/28/02			47.06	0.00	58.72	58 J	31	<5.0	<5.0	<5.0	<5.0	10 J	<5.0	<5.0	<5.0	-	MW-A6	
	06/06/02		107.90	47.26	0.00	60.64	77	30	<2.0	0.18 J	0.31 J	<5.0	18 J	<5.0	<5.0	<5.0	-	MW-A6	
	09/05/02			48.20	0.00	59.70	74	22	<2.0	<2.0	<4.0	<5.0	23 J	<5.0	<5.0	<5.0	-	MW-A6	
	12/05/02			48.75	0.00	59.15	78	28	<2.0	<2.0	<4.0	<5.0	18 J	<5.0	<5.0	<5.0	-	MW-A6	
	02/18/03			47.85	0.00	60.05	60	13	<2.0	<2.0	<4.0	<5.0	26 J	<5.0	<5.0	<5.0	<150	MW-A6	
	05/19/03			48.98	0.00	58.92	66	25	<2.0	<2.0	<4.0	<5.0	15 J	<5.0	<5.0	<5.0	<150	MW-A6	
	08/19/03			49.21	0.00	58.69	56	24	<2.0	<2.0	<4.0	<5.0	12 J	<5.0	<5.0	<5.0	<150	MW-A6	
	11/18/03			49.62	0.00	58.28	59	17	<2.0	<2.0	<4.0	<5.0	11 J	<5.0	<5.0	<5.0	<150	MW-A6	
	02/24/04			49.91	0.00	57.99	58	20	<2.0	<2.0	<4.0	<5.0	13 J	<5.0	<5.0	<5.0	<150	MW-A6	
	05/25/04			50.25	0.00	57.65	62	19	<2.0	<2.0	<4.0	<5.0	8.2 J	<5.0	<5.0	<5.0	<150	MW-A6	
	08/24/04			50.87	0.00	57.03	94	24	0.39 J	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	11/16/04			51.44	0.00	56.46	67	21	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	02/08/05			51.48	0.00	56.42	62	17	<2.0	0.30 J	1.0 J	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	05/03/05			51.58	0.00	56.32	78	20	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	08/02/05			51.49	0.00	56.41	76	11	<2.0	<2.0	<4.0	<5.0	5.0 J	0.25 J	<5.0	0.36 J	<150	MW-A6	
	11/01/05			51.00	0.00	56.90	80	11	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	01/31/06			50.77	0.00	57.13	88	7.0	<2.0	<2.0	<4.0	<5.0	7.1 J	<5.0	<5.0	<5.0	<150	MW-A6	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-A6	05/02/06		107.90	52.80	0.00	55.10	130	11	<2.0	0.28 J	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	08/01/06			50.13	0.00	57.77	140	10	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	11/08/06			49.87	0.00	58.03	150	7.5	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
	02/13/07			49.75	0.00	58.15	110	6.9	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-A6	
MW-A7	06/06/02		110.63	49.32	0.00	61.31	55,000	3,500	6,300	2,400	13,000	1,700	1,200	7.1	<5.0	<5.0	-	MW-A7	
	09/05/02			50.12	0.00	60.51	37,000	3,300	3,800	2,400	13,000	2,400	670	<50	<50	16 J	-	MW-A7	
	12/05/02			50.85	0.00	59.78	19,000	2,900	46	1,600	9,100	1,500	630 J	<100	<100	7.4 J	-	MW-A7	
	02/18/03			51.00	0.00	59.63	19,000	2,600	21 J	1,000	4,000	670	400 J	<200	<200	<200	<6,000	MW-A7	
	05/19/03			51.15	0.00	59.48	18,000	2,800	42 J	1,400	6,500	1,700	300 J	<200	<200	<200	<6,000	MW-A7	
	08/19/03			51.37	0.00	59.26	14,000	3,000	<80	1,200	2,400	1,800	530 J	<200	<200	<200	<6,000	MW-A7	
	11/18/03			51.85	0.00	58.78	7,500	1,800	<80	1,200	440	1,700	640 J	<200	<200	<200	<6,000	MW-A7	
	02/24/04			52.07	0.00	58.56	5,800	4,100	15 J	640	210	190 J	<2,000	<200	<200	<200	<6,000	MW-A7	
	05/25/04			52.38	0.00	58.25	4,200	1,800	<80	470	47 J	550	320 J	<200	<200	<200	<6,000	MW-A7	
	08/24/04			52.80	0.00	57.83	4,100	1,600	<80	80	<160	730	890 J	11 J	<200	<200	<6,000	MW-A7	
	11/16/04			53.63	0.00	57.00	2,100	980	<40	<40	<80	210	<1,000	<100	<100	<100	<3,000	MW-A7	
	02/08/05			53.71	0.00	56.92	3,100	1,800	<80	150	140 J	24 J	<2,000	<200	<200	<200	<6,000	MW-A7	
	05/03/05			53.16	0.00	57.47	9,000	4,500	<200	440	440	<500	<5,000	<500	<500	<500	<15,000	MW-A7	
	08/02/05			53.13	0.00	57.50	640	2,100	<80	14 J	190	30 J	490 J	<200	<200	<200	<6,000	MW-A7	
	11/01/05			52.76	0.00	57.87	4,500	2,300	17 J	120	200	54 J	570 J	6.2 J	<120	<120	<3,800	MW-A7	
	01/31/06			52.50	0.00	58.13	3,400	1,500	11 J	92	91	54 J	580 J	5.2 J	<100	<100	<3,000	MW-A7	
	05/02/06			52.23	0.00	58.40	4,600	2,300	9.0 J	170	170	41 J	390 J	<100	<100	<100	<3,000	MW-A7	
	08/01/06			51.87	0.00	58.76	3,300	1,600	8.9 J	110	73	64	530	5.4 J	<50	<50	<1,500	MW-A7	
	11/07/06			51.69	0.00	58.94	5,100	1,700	33	110	140	48 J	420 J	2.5 J	<50	<50	<1,500	MW-A7	
	02/13/07			49.80	0.00	60.83	9,300	4,500	24	310	420	58	270 J	2.9 J	<50	<50	<1,500	MW-A7	
MW-A8D	01/31/06		107.59	51.80	0.00	55.79	85	1.2 J	<2.0	<2.0	<4.0	11	28 J	0.30 J	<5.0	<5.0	<150	MW-A8D	
	05/02/06			51.35	0.00	56.24	88	4.7	0.55 J	0.78 J	1.5 J	12	22 J	0.28 J	<5.0	<5.0	<150	MW-A8D	
	08/01/06			51.05	0.00	56.54	120	18	1.1 J	0.87 J	1.4 J	17	23 J	0.31 J	<5.0	<5.0	<150	MW-A8D	
	11/08/06			50.74	0.00	56.85	130	26	0.50 J	0.41 J	<4.0	8.9	20 J	0.27 J	<5.0	<5.0	<150	MW-A8D	
	02/13/07			50.63	0.00	56.96	150	23	0.59 J	0.71 J	<4.0	13	24 J	0.39 J	<5.0	<5.0	<150	MW-A8D	
MW-A8S	01/31/06		107.58	51.37	0.00	56.21	73	2.6	1.7 J	0.32 J	1.0 J	51	28 J	0.52 J	<5.0	<5.0	<150	MW-A8S	
	05/02/06			50.88	0.00	56.70	620	10	1.1 J	0.97 J	1.2 J	96	48 J	0.65 J	<5.0	<5.0	<150	MW-A8S	
	08/01/06			50.57	0.00	57.01	290	56	1.7 J	1.8 J	2.4 J	120	40	0.67 J	<5.0	0.80 J	<150	MW-A8S	
	11/08/06			50.17	0.00	57.41	190	53	1.0 J	0.87 J	<4.0	48	21 J	<5.0	<5.0	<5.0	<150	MW-A8S	
	02/13/07			50.13	0.00	57.45	430	120	2.1	1.4 J	<4.0	120	51	0.4 J	<5.0	0.89 J	<150	MW-A8S	
MW-19	06/26/90		107.07	57.21	0.00	49.86	700	140	<10	<10	<10	-	-	-	-	-	-	MW-19	
	06/29/93			55.37	0.00	51.70	870	100	0.90	65	18	-	-	-	-	-	-	MW-19	
	09/20/93			54.48	0.00	52.59	2,100	91	4.1	51	27	-	-	-	-	-	-	MW-19	
	11/15/93			53.99	0.00	53.08	1,100	65	0.80	20	23	-	-	-	-	-	-	MW-19	
	04/18/94			51.38	0.00	55.69	1,200	38	4.0	5.0	3.0	-	-	-	-	-	-	MW-19	
	11/04/94			50.37	0.00	56.70	490	7.0	<0.3	<0.3	<0.5	-	-	-	-	-	-	MW-19	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-19	03/20/95		107.07	49.05	0.00	58.02	240	1.3	<0.30	<0.30	<0.60	-	-	-	-	-	-	MW-19	
	04/13/95			48.90	0.00	58.17	230	2.1	<0.30	<0.30	<0.60	-	-	-	-	-	-	MW-19	
	09/08/95			48.63	0.00	58.44	250	8.1	<0.30	<0.30	<0.60	-	-	-	-	-	-	MW-19	
	11/15/95			47.33	0.00	59.74	350	7.2	0.34	0.51	<0.60	-	-	-	-	-	-	MW-19	
	01/22/96			49.53	0.00	57.54	250	5.4	<0.30	29	10	-	-	-	-	-	-	MW-19	
	04/30/96			46.35	0.00	60.72	250	5.1	<0.30	<0.30	<0.60	-	-	-	-	-	-	MW-19	
	07/31/96			46.24	0.00	60.83	530	7.4	2.2	0.93	68	<10	-	-	-	-	-	MW-19	
	11/22/96			46.11	0.00	60.96	350	1.2	0.39	<0.30	<0.60	<10	-	-	-	-	-	MW-19	
	03/14/97			45.12	0.00	61.95	260	32	1.4	<0.30	2.0	44	-	-	-	-	-	MW-19	
	05/05/97			44.93	0.00	62.14	190	3.1	<0.30	<0.30	0.86	<10	-	-	-	-	-	MW-19	
	07/22/97			44.83	0.00	62.24	270	16	0.71	<0.30	1.9	<10	-	-	-	-	-	MW-19	
	10/10/97			45.05	0.00	62.02	520	29	0.85	0.41	3.7	34	-	-	-	-	-	MW-19	
	01/30/98			44.75	0.00	62.32	630	31	3.3	0.59	8.2	<10	-	-	-	-	-	MW-19	
	06/05/98			43.75	0.00	63.32	1,700	230	7.5	73	66	40	-	-	-	-	-	MW-19	
	09/14/98			43.35	0.00	63.72	3,600	780	120	55	81	<100	-	-	-	-	-	MW-19	
	12/18/98			42.60	0.00	64.47	15,000	3,700	3,500	500	1,800	<1,000	-	-	-	-	-	MW-19	
	02/15/99			42.20	0.00	64.87	14,000	3,300	2,800	480	1,600	<1,000	-	-	-	-	-	MW-19	
	05/12/99			41.65	0.00	65.42	18,000	3,300	2,700	600	2,100	<2,000	-	-	-	-	-	MW-19	
	09/21/99			41.58	0.00	65.49	14,000	4,400	4,400	800	2,900	<1,000	-	-	-	-	-	MW-19	
	12/07/99			39.61	0.00	67.46	23,000	3,900	3,800	780	2,800	<250	-	-	-	-	-	MW-19	
	12/07/99	DUP		-	-	-	20,000	3,800	3,700	770	2,800	<250	-	-	-	-	-	MW-99	
	03/21/00		107.12	43.38	0.00	63.74	52,000	7,900	6,800	1,300	5,200	<100	-	-	-	-	-	MW-19	
	06/14/00			43.60	0.00	63.52	39,000	8,700	7,500	1,900	7,400	<250	<2,500	<250	<250	<250	-	MW-19	
	08/23/00			44.01	0.00	63.11	29,000	9,300	970	2,000	4,900	21 J	<4,000	<400	<400	<400	-	MW-19	
	12/08/00			44.45	0.00	62.67	27,000	6,800	230	1,300	3,200	7.7 J	85 J	<20	<20	<20	-	MW-19	
	02/15/01			45.68	0.00	61.44	12,000	3,800	570	610	1,300	<20	<200	<20	<20	<20	-	MW-19	
	06/14/01			45.58	0.00	61.54	8,100	2,400	250	390	870	25	<200	<20	<20	<20	-	MW-19	
	09/14/01			46.59	0.00	60.53	10,000	3,000	34	800	400	15 J	<200	<20	<20	<20	-	MW-19	
	12/07/01			46.88	0.00	60.24	11,000	3,400	<500	980	210 J	14 J	<500	<50	<50	<50	-	MW-19	
	03/28/02			47.48	0.00	59.64	7,600	2,500	<250	840	140 J	9.0 J	28 J	<10	<10	<10	-	MW-19	
	06/06/02		109.25	47.74	0.00	61.51	7,700	1,800	2.1 J	720	20	8.4 J	<100	<10	<10	<10	-	MW-19	
	09/05/02			48.65	0.00	60.60	2,500	770	1.0 J	240	1.9 J	9.7 J	36 J	<10	<10	<10	-	MW-19	
	12/05/02			49.30	0.00	59.95	480	270	<2.0	23	<4.0	8.0	68	<5.0	<5.0	<5.0	-	MW-19	
	02/18/03			49.61	0.00	59.64	310	39	<2.0	3.1	<4.0	6.8	87	<5.0	<5.0	<5.0	<150	MW-19	
	05/19/03			49.63	0.00	59.62	120	4.2	<2.0	3.9	0.59 J	7.7	86	<5.0	<5.0	<5.0	<150	MW-19	
	08/19/03			49.85	0.00	59.40	140	8.2	<2.0	0.87 J	4.3	4.2 J	70	<5.0	<5.0	<5.0	<150	MW-19	
	11/18/03			50.41	0.00	58.84	80	4.4	<2.0	0.47 J	<4.0	2.5 J	52	<5.0	<5.0	<5.0	<150	MW-19	
	02/24/04			50.27	0.00	58.98	140	6.8	0.53 J	0.99 J	0.95 J	3.0 J	35 J	<5.0	<5.0	<5.0	<150	MW-19	
	05/25/04			50.90	0.00	58.35	76	9.9	0.51 J	0.65 J	0.58 J	2.2 J	36	<5.0	<5.0	<5.0	<150	MW-19	
	08/24/04			51.38	0.00	57.87	100	12	0.58 J	1.2 J	1.5 J	1.9 J	22 J	<5.0	<5.0	<5.0	<150	MW-19	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-19	11/16/04	NS	109.25	51.81	0.00	57.44	-	-	-	-	-	-	-	-	-	-	-	-	
	11/17/04			-	-	-	99	6.4	<2.0	0.50 J	<4.0	3.4 J	22 J	0.25 J	<5.0	<5.0	<150	MW-19	
	02/08/05			52.09	0.00	57.16	100	8.1	0.37 J	0.68 J	0.94 J	1.7 J	12 J	<5.0	<5.0	<5.0	<150	MW-19	
	05/03/05			52.05	0.00	57.20	490	290	3.1 J	43	29	1.8 J	<200	<20	<20	<20	<600	MW-19	
	08/02/05			51.99	0.00	57.26	1,200	680	<20	69	12 J	<50	<500	<50	<50	<50	<1,500	MW-19	
	11/01/05			51.75	0.00	57.50	260	18	<2.0	0.76 J	0.91 J	3.6 J	13 J	<5.0	<5.0	<5.0	<150	MW-19	
	01/31/06			51.40	0.00	57.85	190	34	0.59 J	1.8 J	1.7 J	2.6 J	13 J	<5.0	<5.0	0.39 J	<150	MW-19	
	05/02/06			51.19	0.00	58.06	450	200	0.61 J	3.8	3.5 J	2.3 J	15 J	<5.0	<5.0	<5.0	<150	MW-19	
	08/01/06			50.88	0.00	58.37	380	120	<4.0	2.3. J	2.5 J	2.4 J	18 J	<10	<10	<10	<300	MW-19	
	11/07/06			50.66	0.00	58.59	4,900	3,000	6.0	320	22	1.8 J	15 J	<10	<10	<10	<300	MW-19	
	02/13/07			50.31	0.00	58.94	170	21	<1.0	0.86 J	<1.0	1.2	<25	<2.0	<2.0	<2.0	<500	MW-19	
MW-20	06/26/90		106.37	56.65	0.00	49.72	400	10	<2	<2	22	-	-	-	-	-	-	MW-20	
	06/29/93			54.95	0.00	51.42	1,400	240	41	37	120	-	-	-	-	-	-	MW-20	
	09/20/93			54.17	0.00	52.20	2,500	440	160	74	240	-	-	-	-	-	-	MW-20	
	11/15/93			53.57	0.00	52.80	500	41	120	6.0	15	-	-	-	-	-	-	MW-20	
	04/18/94			52.47	0.00	53.90	720	90	49	23	81	-	-	-	-	-	-	MW-20	
	11/04/94			49.97	0.00	56.40	4,900	1,200	72	430	870	-	-	-	-	-	-	MW-20	
	03/20/95			48.76	0.00	57.61	1,600	330	12	46	150	-	-	-	-	-	-	MW-20	
	04/13/95			48.49	0.00	57.88	6,100	1,100	18	350	580	-	-	-	-	-	-	MW-20	
	09/08/95			47.42	0.00	58.95	5,300	1,500	15	420	650	-	-	-	-	-	-	MW-20	
	11/15/95			47.12	0.00	59.25	6,300	230	6.8	370	540	-	-	-	-	-	-	MW-20	
	01/22/96			49.31	0.00	57.06	1,900	430	<3.0	220	370	-	-	-	-	-	-	MW-20	
	04/30/96			46.10	0.00	60.27	3,100	630	<6.0	560	560	-	-	-	-	-	-	MW-20	
	07/31/96			46.10	0.00	60.27	1,500	200	1.9	140	240	43	-	-	-	-	-	MW-20	
	11/22/96			45.93	0.00	60.44	1,800	280	3.4	230	310	<10	-	-	-	-	-	MW-20	
	03/14/97			44.91	0.00	61.46	2,800	350	<3.0	340	500	<10	-	-	-	-	-	MW-20	
	05/05/97			44.55	0.00	61.82	1,700	130	1.7	220	130	64	-	-	-	-	-	MW-20	
	07/22/97			44.70	0.00	61.67	960	130	1.8	120	160	<25	-	-	-	-	-	MW-20	
	10/10/97			44.88	0.00	61.49	4,500	730	<5.1	580	750	96	-	-	-	-	-	MW-20	
	01/30/98			44.46	0.00	61.91	1,600	310	17	160	100	<20	-	-	-	-	-	MW-20	
	06/05/98			43.35	0.00	63.02	830	67	3.7	1.6	5.8	48	-	-	-	-	-	MW-20	
	09/14/98			42.35	0.00	64.02	1,400	170	13	52	140	<50	-	-	-	-	-	MW-20	
	12/18/98			42.45	0.00	63.92	580	52	5.3	25	31	33	-	-	-	-	-	MW-20	
	02/15/99			42.35	0.00	64.02	480	39	3.0	24	19	23	-	-	-	-	-	MW-20	
	05/12/99			42.65	0.00	63.72	170	22	3.2	16	8.5	<10	-	-	-	-	-	MW-20	
	09/21/99			43.29	0.00	63.08	200	18	<0.30	1.3	0.95	<10	-	-	-	-	-	MW-20	
	12/07/99			43.76	0.00	62.61	220	16	<2.0	2.7	<4.0	10	-	-	-	-	-	MW-20	
	03/21/00		106.44	44.14	0.00	62.30	170	18	<1.0	0.46 J	<1.0	11	-	-	-	-	-	MW-20	
	06/14/00			44.54	0.00	61.90	110	37	<2.0	3.1	<4.0	20	<50	<5.0	<5.0	<5.0	-	MW-20	
	08/23/00			44.19	0.00	62.25	58	6.8	0.31 J	3.4	5.0	59	82	1.7 J	<5.0	<5.0	-	MW-20	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
MW-20	12/08/00		106.44	45.67	0.00	60.77	7,200	980	96	450	980	190	360	4.3 J	<5.0	<5.0	-	MW-20	
	02/15/01			45.85	0.00	60.59	2,700	510	26	52	370	99	120	<5.0	<5.0	<5.0	-	MW-20	
	06/14/01			46.02	0.00	60.42	14,000	2,500	<60	830	1,700	700	<500	<50	<50	<50	-	MW-20	
	09/14/01			46.75	0.00	59.69	7,700	1,600	16	650	980	1,000	330	6.2 J	<12	9.0 J	-	MW-20	
	12/07/01			47.12	0.00	59.32	14,000	3,100	<500	1,500	2,100	1,500	940	6.0 J	<20	7.0 J	-	MW-20	
	03/28/02			47.59	0.00	58.85	8,100	1,600	<250	750	650	1,500	350	<20	<20	<20	-	MW-20	
	06/06/02		108.58	47.57	0.00	61.01	7,700	1,400	3.4 J	740	370	1,600	720	5.2 J	<25	7.4 J	-	MW-20	
	09/05/02			48.35	0.00	60.23	6,800	1,900	3.4 J	900	200	1,500	420	4.9 J	<20	10 J	-	MW-20	
	12/05/02			49.03	0.00	59.55	6,100	1,800	4.6 J	760	37	2,100	470	5.2 J	<20	8.8 J	-	MW-20	
	02/18/03			49.30	0.00	59.28	8,800	1,900	<50	680	73 J	2,000	720 J	<120	<120	11 J	<3,800	MW-20	
	05/19/03			49.46	0.00	59.12	4,600	1,500	<50	520	48 J	1,900	510 J	<120	<120	12 J	<3,800	MW-20	
	08/19/03			49.70	0.00	58.88	5,500	920	<50	270	39 J	1,900	420 J	<120	<120	10 J	<3,800	MW-20	
	11/18/03			50.31	0.00	58.27	2,700	430	<50	110	28 J	1,200	410 J	<120	<120	<120	<3,800	MW-20	
	02/24/04			50.14	0.00	58.44	5,000	1,100	<50	420	110	3,300	660 J	<120	<120	18 J	<3,800	MW-20	
	05/25/04			50.74	0.00	57.84	4,600	860	<40	420	62 J	3,400	920 J	6.2 J	<100	19 J	<3,000	MW-20	
	08/24/04			51.26	0.00	57.32	4,600	760	<40	330	56 J	3,600	660 J	6.4 J	<100	28 J	<3,000	MW-20	
	11/16/04			51.94	0.00	56.64	4,600	93	<10	36	5.8 J	340	61 J	<25	<25	2.5 J	<750	MW-20	
	02/08/05			52.14	0.00	56.44	4,500	680	<100	220	34 J	3,900	580 J	<250	<250	26 J	<7,500	MW-20	
	05/03/05			51.93	0.00	56.65	5,600	630	<100	99 J	70 J	4,800	910 J	<250	<250	<250	<7,500	MW-20	
	08/02/05			52.02	0.00	56.56	7,000	2,600	14 J	400	240	1,400	710 J	<200	<200	<200	<6,000	MW-20	
	11/01/05			51.57	0.00	57.01	6,700	590	<100	68 J	<200	2,500	1,000 J	<250	<250	16 J	<7,500	MW-20	
	01/31/06			51.07	0.00	57.51	3,500	560	<20	43	61	2,800	2,200	5.7 J	<50	23 J	<1,500	MW-20	
	05/02/06			50.93	0.00	57.65	3,500	<50	<50	<50	<100	<120	11,000	<120	<120	<120	<3,800	MW-20	
	08/01/06			50.61	0.00	57.97	3,400	230	<40	11 J	<80	1,100	3,800	<100	<100	<100	<3,000	MW-20	
	11/07/06			50.37	0.00	58.21	6,100	2,300	140	290	490	820	1,100	2.8 J	<20	<20	<600	MW-20	
	02/13/07			50.31	0.00	58.27	810	68	6.4	7.7	13	380	4,000	4.2 J	<10	3.0 J	<2,500	MW-20	
Trip Blank	09/29/99		-	-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	-	-	-	-	-	MW-100	
	12/07/99			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	-	-	-	-	-	MW-100	
	06/14/00			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	08/23/00			-	-	-	<50	0.19 J	0.31 J	0.084 J	<4.0	<5.0	15 J	<5.0	<5.0	<5.0	-	MW-100	
	12/08/00			-	-	-	<50	<0.30	<0.30	<0.30	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	02/15/01			-	-	-	<50	<0.30	<0.30	<0.30	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	06/14/01			-	-	-	<50	<0.30	<0.30	<0.30	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	09/14/01			-	-	-	<50	<0.30	<0.30	<0.30	<0.60	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	12/07/01			-	-	-	<100	<5.0	<5.0	<5.0	<5.0	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	03/28/02			-	-	-	<100	<5.0	<5.0	<5.0	<5.0	<5.0	<25	<5.0	<5.0	<5.0	-	MW-100	
	06/06/02			-	-	-	9.7 J	<2.0	0.18 J	<2.0	0.20 J	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	09/05/02			-	-	-	12 J	<2.0	0.47 J	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	12/05/02			-	-	-	15	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	-	MW-100	
	02/18/03			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-100	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
Trip Blank	05/19/03		-	-	-	-	11 J	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-100	
	08/19/03			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	MW-100	
	11/18/03			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20031118	
	02/24/04			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20040224	
	05/25/04			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20040525	
	08/24/04			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20040824	
	11/16/04			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20041116	
	02/08/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20050208	
	05/03/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20050503B	
	05/03/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20050503A	
	08/02/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20050802	
	11/01/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20051101	
	01/31/06			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20060131	
	05/02/06			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20060502	
	08/01/06			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20060801	
	11/07/06			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	TB-5110-20061107	
	02/13/07			-	-	-	<100	<1.0	<1.0	<1.0	<1.0	<1.0	<25	<2.0	<2.0	<2.0	<500	TB-5110-20070213	
Field Blank	11/18/03		-	-	-	-	24 J	<2.0	<2.0	<2.0	<4.0	<5.0	8.4 J	<5.0	<5.0	<5.0	<150	FB-5110-20031118	
	11/16/04			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20031116	
	02/08/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20050208	
	05/03/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20050503	
	08/02/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20050802	
	11/01/05			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20051101	
	01/31/06			-	-	-	25 J	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20060131	
	05/02/06			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20060502	

TABLE 2
Summary of Groundwater Analytical & Elevation Results
ARCO Station No. 5110
5731 East Firestone Blvd., South Gate, California

Well No.	Date	Notes	TOC Elevation (ft-MSL)	Depth to Water (feet)	Measured SPH Thickness (feet)	Calc. GW Elev. (ft-MSL)	GRO (µg/L)	B (µg/L)	T (µg/L)	E (µg/L)	X (µg/L)	MTBE (µg/L)	TBA (µg/L)	DIPE (µg/L)	ETBE (µg/L)	TAME (µg/L)	Ethanol (µg/L)	Sample ID	Comments
Field Blank	08/01/06		-	-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20060801	
	11/07/06			-	-	-	<50	<2.0	<2.0	<2.0	<4.0	<5.0	<50	<5.0	<5.0	<5.0	<150	FB-5110-20061107	
	02/13/07			-	-	-	<100	<1.0	<1.0	<1.0	<1.0	<1.0	<25	<2.0	<2.0	<2.0	<500	FB-5110-20070213	

Notes:

GRO = Gasoline range organics
B = Benzene
T = Toluene
E = Ethylbenzene
X = Total xylenes
MTBE = Methyl tert-butyl ether
TBA = Tert-butyl alcohol
DIPE = Di-isopropyl ether
ETBE = Ethyl tert-butyl ether
TAME = Tert-amyl methyl ether
SPH = Separate phase hydrocarbons
TOC = Top of casing (surveyed)
Calc. GW Elev. = Calculated groundwater elevation = TOC - Depth to Water + 0.75*(Measured SPH Thickness); assuming a specific gravity of 0.75 for SPH
ft-MSL = feet above mean sea level
µg/L = Micrograms per liter
< = Analyte was not detected above the specified method reporting limit
- = Not measured or analyzed
J = Estimated value (less than the method reporting limit and greater than or equal to the method detection limit)
Refer to the reports in which data was first presented for more information on historical data.

GRO analyzed by EPA Method 8015 Modified. The carbon chain range used for analysis since 2002 Quarter 3 is C4-C12.
BTEX and oxygenates analyzed by EPA Method 8260B since 2002 Quarter 3.
ABN = Well abandoned; no sampling performed
DUP = Duplicate sample
INA = Well inaccessible; not sampled
NS = Well not sampled

TABLE 3
WELL CONSTRUCTION DETAILS
ARCO STATION NO. 5110
5731 EAST FIRESTONE BOULEVARD
SOUTH GATE, CALIFORNIA

Well Number	Well Installation Date	Well Destruction Date	Casing Diameter (in)	Casing Slot Size (in)	Total Depth (ft bgs)	Screened Intervals (ft bgs)
MW-19	9/20/1989	-	4	0.020	70.3	45-70
MW-20	9/20/1989	-	4	0.020	69.0	44-69
D-1	6/21/1990	1/24/2002	4	0.020	72.0	7-72
D-2	6/22/1990	1/25/2002	4	0.020	46.9	6.9-46.9
D-3	6/22/1990	-	4	0.020	47.3	7-47
VEW-1	4/6/1995	1/24/2002	2	0.040	50.0	15-25
			2	0.040		30-50
VEW-2	4/7/1995	-	2	0.040	54.0	4-7
			2	0.040		12-29
			2	0.040		34-54
VEW-3	4/8/1995	1/24/2002	2	0.040	50.0	5-11
			2	0.040		15-25
			2	0.040		30-50
VEW-4	4/9/1995	1/25/2002	2	0.040	50.0	5-10
			2	0.040		15-25
			2	0.040		30-50
MW-A1	1998	-	2	0.020	61.4	NA
MW-A2	1998	-	2	0.020	56.6	NA
MW-A3	12/1/1999	-	4	0.020	65.0	35-65
MW-A4	12/1/1999	-	4	0.020	65.0	35-65
MW-A5	10/21/2001	-	4	0.020	65.0	30-65
MW-A6	10/30/2001	-	4	0.020	65.0	30-65
MW-A7	4/16/2002	-	2	0.020	65.0	10-30
			4	0.020		35-65
MW-A8	10/12/2005	-	2	0.020	94.0	43-63
			2	0.020		74-94
AS/SVE-1	9/30/2003	-	2	0.020	70.0	8-28
			2	0.020		35-55
			1	0.020		64-66
AS/SVE-2	10/2/2003	-	2	0.020	70.0	7-27
			2	0.020		35-55
			1	0.020		63-65
AS/SVE-3	10/4/2003	-	2	0.020	70.0	8-28
			2	0.020		35-55
			1	0.020		66-68
AS/SVE-4	9/30/2003	-	2	0.020	70.0	7-27
			2	0.020		34-54
			1	0.020		60-62
AS/SVE-5	9/29/2003	-	2	0.020	70.0	7-27
			2	0.020		35-55
			1	0.020		64-66

Notes:
- - In Use
NA- Not Available

TABLE 4
SUMMARY OF WELLS IDENTIFIED WITHIN A ONE-MILE RADIUS
ARCO STATION NO. 5110
SOUTHGATE, CALIFORNIA

State Well ID No.	Well ID No.	Usage	Well Operator	Status	Well Location	Distance/Direction From Site (approximate - ft)	Total Depth (ft bgs)	Perforation Intervals (ft bgs)	Well Casing Diam.	Date Last Gauged	Wellhead Elevation (ft AMSL)	Depth to Water (ft bgs)	Groundwater Elevation (ft AMSL)
--	"Fire Well"	Ab	AR	Ab	181 f S of RR tracks 400 ft E of LA River 100 ft E of Long Beach Fwy	2,000 ft NW	575	--	12	--	--	--	--
03S/12W-05D02	1535H	PS	CSG	--	160 ft E of Garfield Ave 175 ft N of Southern Ave	1,700 ft S	222	--	6"	4/3/2003	105.2	57.2	48.0
02S/12W-31Q02	SG-25	PS	CSG	Active	East of Los Angeles Rver and west of Long Beach Freeway	1,800 ft SW	1331	280-350 360-380 400-550	16"	--	--	90.0	--
03S/12W-06D05	SLY	PS	LTOC	--	0.1 NW of intersection of Southern Avenue and Garfield	1,800 ft SW	--	--	--	--	--	--	--
3S/12W-05C06	NEW1	PS	RD	--	Luxor St & Mitla Ave	1,900 ft SE	--	--	--	--	--	--	--
02S/12W-31Q03	SG-24	PS	CSG	Active	East of Los Angeles Rver and west of Long Beach Freeway	1,900 ft SW	1266	310-390 434-560 570-630	16"	--	--	87	--
02S/12W-31Q01	1525G	--	CSG	--	Southern Ave & Rayo Ave	3,400 ft SW	--	--	--	4/15/2003	102.5	137.0	-34.5
02S/12W-31H02	1524E	Observation	LFCD	--	West of the Los Angeles River & south of Fostoria St	3,400 ft NW	220	195-205		3/19/1990	107.6	72.8	34.8
02S/12W-31Q02	1525H	--	CSG	--	Southern Ave & Burtis St	3,400 ft SW	--	--	--	4/15/2003	102.5	104.0	-1.5
03S/12W-06B03	1525D/SG-23	PS	CSG	--	150 ft S of Southern Ave 30 ft W of Salt Lake Ave	3,800 ft SW	856	530-624 662-692 772-799	18"	4/15/2003	102.1	103.0	-0.9
02S/12W-33M01	1544G	PS	DWD	--	Pellet St & Riverson Ave	4,200 ft NE	454	378-415 426-431	16"	5/1/2003	114.5	85.6	28.9
03S/12W-05M01	1536F	PS	CSG	--	0.5 Mi N of Imperial 150-200 ft E of Garfield S. of Gate Lee Circle	4,300 ft S	578	50-75 495-595	16"	10/15/2002	98.4	77.9	20.5
02S/12W-03H03	1524F	--	SCWC	--	Wilcox Ave & Santa Ana St	4,800 ft NW	--	--	--	11/28/2000	114.0	98.0	16.0
02S/12W-31M02	SG-7/ 1514A	PS	CSG	--	300 feet west of Mason St & Nevill Ave	5,100 ft W	883	500-600	16"	4/15/2003	113	97.3	15.6
02S/12W-29P06	1533A	PS	Private	--	Jaboneria Rd & Priory St	5,300 ft N	--	--	--	12/20/1989	116.0	89.4	26.6

TABLE 4
SUMMARY OF WELLS IDENTIFIED WITHIN A ONE-MILE RADIUS
ARCO STATION NO. 5110
SOUTHGATE, CALIFORNIA

State Well ID No.	Well ID No.	Usage	Well Operator	Status	Well Location	Distance/Direction From Site (approximate - ft)	Total Depth (ft bgs)	Perforation Intervals (ft bgs)	Well Casing Diam.	Date Last Gauged	Wellhead Elevation (ft AMSL)	Depth to Water (ft bgs)	Groundwater Elevation (ft AMSL)
02S/12W-29M05	1533M	PS	SCWC	--	100 ft S of Priory St 360 ft W of Eastern Ave	5,300 ft N	650	376-368 380-400 422-425 561-581	16"	10/31/2002	118.0	253.0	-135.0
03S/12W-05A01	Well 20	PS	DWD	--	--	3,800 ft SE	--	--	--	--	--	--	--
02S/12W-31B03	Hoffman Well No. 2	PS	SCWC	--	--	4,600 ft NW	--	--	--	--	--	--	--
02S/12W28N03	1543F	PS	SCWC	--	40 ft S of Clara St 400 ft E of Perry Rd Opposite 6447 Clara St	>1 mile NE	352		12"	4/28/2003	120	92.3	27.7
02S/12W-33P02	1555H	PS	USC	--	Firestone Blvd & Old River SchoolRoad	>1 mile E	180	--	8"	5/23/2003	113.1	59.2	53.9
03S/12W-06D04	1515L	PS	CSG	--	1200 ft N of Tweedy Blvd 150 ft W of Walnut	>1 mile W	815	610-620 626-666 678-746	18"	4/15/2003	106.6	106.0	0.6
03S/12W-06D02	1515J	PS	CSG	--	325 ft W of Pinehurst Ave 850 ft N of Tweedy Blvd.	>1 mile W	813	615-745 767-775	18"	4/15/2003	105.4	112.9	-7.5
03S/12W-04D02	1555J	PS	DWD	--	0.22 Mi. W of Rives Ave 0.2 Mi E of Old River Rd 100 ft South of Burns Ave	>1 mile E	674	375-412 612-620	16	5/1/2003	113	83.5	29.5

Legend:
- - Information not available at the time of this report or not available to the public
SCWC - Southern California Water Company
DWD - Downey Water District/City of Downey
CSG - City of Southgate
DCWD - Downey City Water District
RD - Rockview Daries
CLW - City of Lakewood Water Department
PS -Public Supply (groundwater well potentially operated for public use/consumption)
PWC - Park Water Company
LFCD - Los Angeles Flood Control District
LTOC - Lunday-Thagard Oil Company
GW - Groundwter Observation
Ab - Abandoned
AR - ARCO Vinvale Terminal

TABLE 5

SUMMARY OF MONTHLY EFR ACTIVITIES (DISCONTINUED)

ATLANTIC RICHFIELD COMPANY STATION NO. 5110

5731 EAST FIRESTONE BOULEVARD

SOUTH GATE, CALIFORNIA

WELL NUMBER	DATE OF PURGE	PURGE VOLUME (gallons)
D-1	07/19/99	850.00
	08/13/99	640.00
	09/08/99	750.00
	10/11/99	900.00
	11/08/99	300.00
	12/06/99	900.00
	01/03/00	560.00
	02/02/00	500.00
	03/06/00	800.00
	04/03/00	600.00
	05/01/00	490.00
	06/02/00	260.00
	07/25/00	580.00
	08/14/00	330.00
	09/14/00	600.00
	10/17/00	300.00
	11/13/00	450.00
	12/14/00	600.00
	01/11/01	500.00
	02/20/01	350.00
	03/22/01	600.00
	04/26/01	510.00
	05/24/01	1,000.00
	06/13/01	550.00
	07/19/01	370.00
	08/24/01	400.00
	09/13/01	165.00
	10/26/01	180.00
	11/21/01	400.00
	12/26/01	337.00
	01/17/02	165.00
	01/25/02	ABN

TABLE 5

SUMMARY OF MONTHLY EFR ACTIVITIES (DISCONTINUED)

ATLANTIC RICHFIELD COMPANY STATION NO. 5110

5731 EAST FIRESTONE BOULEVARD

SOUTH GATE, CALIFORNIA

WELL NUMBER	DATE OF PURGE	PURGE VOLUME (gallons)
MW-20	09/13/01	165.00
	10/26/01	1.00
	11/21/01	300.00
	12/26/01	300.00
	01/17/02	220.00
	DISCONTINUED	DISCONTINUED
MW-A5	01/17/02	220.00
	DISCONTINUED	DISCONTINUED
MW-A6	01/17/02	248.00
	DISCONTINUED	DISCONTINUED
Total Gallons Removed		**17,391.00**

TABLE 6 - SVE OPERATION REPORT

Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA
VES SUMMARY OF THE OPERATING PERIOD
First Quarter, 2007

Atlantic Richfield Company Engineer:	Darrell Fah
Consultant:	SECOR International Incorporated
Lead Agency:	SCAQMD
Reporting Period:	December 1, 2006 through February 28, 2007
Equipment Inventory:	Paragon Environmental Systems ET-250 Trailer Mounted (1) Ingersol Rand Rotary Screw Compressor
Operating Mode:	Catalytic Oxidation
SCAQMD Permit #:	F61746 (new permit in processing with SCAQMD)
Influent GRO Concentration at system start up:	System startup 4/7/04
Field observed concentration:	>9,999 ppmv
Laboratory reported concentration:	8,400 ppmv
Influent Benzene Concentration at system start up:	System startup 4/7/04
Field observed concentration:	not measured
Laboratory reported concentration:	92 ppmv
Influent GRO Concentration at end of period:	
Field observed concentration:	NA
Laboratory reported concentration:	NA
Influent Benzene Concentration at end of period:	
Field observed concentration:	not measured
Laboratory reported concentration:	NA
Flow Rate at end of period:	NM
Hydrocarbons Removed This Period:	0 lb
Utility usage:	
Electricity:	0 kWh
Natural Gas:	0 Therms
Percent up time during this period:	0% (Vapor Extraction)
Number of auto shut downs during this period:	0 (Vapor Extraction)

Notes:
NA = Not Available
GRO = Gasoline Range Organics (C_4 - C_{12})

TABLE 7 - SUMMARY OF SVE OPERATION DATA

Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA
VES OPERATING REPORT
First Quarter, 2007

CURRENT SOURCE (Without Dilution Air Added)	
Current Well Source:	Currently inactive
GRO Concentration at end of period:	NA
GRO Concentration at end of last period:	1,500 ppmv (11/08/06)
Initial GRO Concentration:	8,400 ppmv (initial startup 4/7/04)
Benzene Concentration at end of period:	NA
Benzene Concentration at end of last period:	<1.2 ppmv (11/08/06)
Initial Benzene Concentration:	92 ppmv (initial startup 4/7/04)
CURRENT PROCESS (With Dilution Air Added) - INFLUENT SUMMARY	
GRO Concentration at end of period:	NA
GRO Concentration at end of last period:	NM ppmv
Benzene Concentration at end of period:	NA
Benzene Concentration at end of last period:	NM ppmv
Initial Benzene Concentration:	22 ppmv (initial startup 4/7/04)
CURRENT PROCESS - EFFLUENT SUMMARY	
GRO Concentration at end of period:	NA
GRO Permit Requirement Concentration:	50 ppmv (as Hexane)
Percent (%) TPH Conversion:	NA %
Benzene Concentration at end of period:	NA
Benzene Permit Requirement Concentration:	0.24 ppmv
Percent Benzene Conversion:	NA %
Cumulative Hydrocarbons removed:	50,283 lb
Avg. Stack Temperature (Inlet):	NA deg. F
(Outlet):	NA deg. F
Avg. Source Flow:	NA scfm
Avg. Effluent Flow:	NA scfm
Avg. Source Vacuum:	NA in. H_2O

Notes: Average values do not include down time.
NA = Not Applicable NM = Not Measured
GRO = Gasoline Range Organics (C_4 - C_{12})
System turned off as of 1/17/06 until system is optimized to lower effluent concentration.

TABLE 8
SUMMARY OF PROCESS VAPOR SAMPLING RESULTS

Sample Date	Sample ID	GRO (ppmV)	Benzene (ppmV)	Ethylbenzene (ppmV)	Toluene (ppmV)	Total Xylenes (ppmV)	DIPE (ppmV)	ETBE (ppmV)	MTBE (ppmV)	TAME (ppmV)	TBA (ppmV)	CO_2 (%)	CO (%)	CH_4 (%)	N_2 (%)	O2 (%)
EPA Method:		8015 Mod	8260B									ASTM D1946-90				
4/7/2004	Influent	8,400	92	38	250	170	<24	<27	<28	<24	<330	10	<0.10	0.32	83	6.6
	Infl. w/ dil.	1,900	22	19	68	96	<6.0	<6.6	7.1	<6.0	<82	1.7	<0.10	<0.10	78	21
	Effluent	3.0	0.19	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	2.5	<0.10	<0.10	78	19
4/13/2004	Effluent	3.0	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
4/21/2004	Influent	6,200	81	52	250	220	<12	<13	27	<12	<160	5.5	<0.10	<0.10	80	14
	Infl. w/ dil.	860	10	9.9	47	51	<2.4	<2.7	4.5	<2.4	<33	0.75	<0.10	<0.10	78	21
	Effluent	3.1	<0.061	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	1.8	<0.10	<0.10	80	18
4/27/2004	Influent	7,000	40	24	180	77	<12	<13	15	<12	<160	5.3	<0.10	0.13	80	15
	Infl. w/ dil.	2,400	21	28	89	120	<2.4	<2.7	8.9	<2.4	<33	1.8	<0.10	<0.10	78	20
	Effluent	3.6	<0.061	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	2.5	<0.10	<0.10	79	18
5/5/2004	Influent	5,900	54	72	290	300	<12	<13	17	<12	<160	3.1	<0.10	<0.10	79	18
	Infl. w/ dil.	1,900	13	18	68	80	<2.4	<2.7	4.2	<2.4	<33	1.0	<0.10	<0.10	79	20
	Effluent	<2.4	<0.060	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	2.1	<0.10	<0.10	80	18
5/12/2004	Influent	4,300	20	15	78	61	<12	<13	7.6	<12	<160	2.7	<0.10	<0.10	79	18
	Infl. w/ dil.	1,500	9.7	14	48	68	<2.4	<2.7	2.9	<2.4	<33	1.0	<0.10	<0.10	79	20
	Effluent	<2.4	0.093	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	2.1	<0.10	<0.10	79	19
5/19/2004	Influent	3,400	30	39	150	180	<12	<13	<14	<12	<160	2.3	<0.10	<0.10	79	19
	Infl. w/ dil.	1,600	13	23	70	120	<4.8	<5.3	<5.6	<4.8	<66	0.92	<0.10	<0.10	79	20
	Effluent	<2.4	0.096	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	2.0	<0.10	<0.10	80	19
6/2/2004	Influent	3,700	28	44	130	210	<2.4	<2.7	6.6	<2.4	<33	2.0	<0.10	<0.10	79	19
	Infl. w/ dil.	1,500	18	36	79	190	<4.8	<5.3	<5.6	<4.8	<66	1.2	<0.10	<0.10	79	20
	Effluent	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	2.0	<0.10	<0.10	79	19
7/7/2004	Influent	1,600	17	25	96	130	<2.4	<2.7	2.9	<2.4	<33	--	--	--	--	--
	Infl. w/ dil.	1,400	12	22	70	120	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Effluent	<2.4	<1.2	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
8/4/2004	Influent	1,200	8.3	16	70	86	<4.8	<5.3	<5.6	<4.8	<66	1.2	<0.10	<0.10	79	20
	Infl. w/ dil.	1,200	6.4	15	55	88	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Effluent	<2.4	0.082	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
9/9/2004	Influent	900	4.1	13	46	72	<2.4	<2.7	<2.8	<2.4	<33	1.3	<0.10	<0.10	79	20
	Effluent	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
9/23/2004	Influent	3,500	10	15	14	75	<2.4	<2.7	7.1	<2.4	<33	6.9	<0.10	<0.10	86	7.4
10/7/2004	Influent	1,500	2.1	3.0	9.7	24	<2.4	<2.7	<2.8	<2.4	<33	4.7	<0.10	<0.10	83	12
	Effluent	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	3.2	<0.10	<0.10	80	16

TABLE 8
SUMMARY OF PROCESS VAPOR SAMPLING RESULTS

Sample Date	Sample ID	GRO (ppmV)	Benzene (ppmV)	Ethylbenzene (ppmV)	Toluene (ppmV)	Total Xylenes (ppmV)	DIPE (ppmV)	ETBE (ppmV)	MTBE (ppmV)	TAME (ppmV)	TBA (ppmV)	CO_2 (%)	CO (%)	CH_4 (%)	N_2 (%)	O_2 (%)
11/4/2004	Influent	1,800	<1.2	1.6	6.2	13	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Effluent	<2.4	0.062	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
EPA Method:		**TO-3**	**TO-14A**									**ASTM D1946**				
12/16/2004	Influent	1,700	0.98	2.0	7.0	17	<0.4	<0.4	<0.4	<0.4	<2.0	4.4	<0.001	0.23	83	15
	Effluent	2.2	0.029	0.015	0.033	0.12	<0.002	<0.002	<0.002	<0.002	<0.01	2.9	0.017	0.0074	82	18
1/5/2005	Influent	1,800	0.62	1.2	3.8	10	<0.050	<0.050	0.23	<0.050	<0.25	3.9	<0.001	0.26	79	15
	Effluent	1.3	0.040	0.0040	0.020	0.020	<0.0020	<0.0020	<0.0020	<0.0020	<0.010	2.7	0.018	0.0081	79	17
2/2/2005	Influent	1,600	0.54	0.72	2.8	6.6	<0.25	<0.25	<0.25	<0.25	<1.2	3.5	<0.001	0.20	80	16
	Effluent	<1.0	0.017	<0.0020	0.0083	0.010	<0.0020	<0.0020	<0.0020	<0.0020	<0.010	2.5	0.012	0.0038	80	18
3/2/2005	Influent	1,000	0.81	2.8	8.3	23	<0.10	<0.10	0.27	<0.10	<0.5	2.5	<0.001	0.10	79	18
	Effluent	2.0	0.024	0.0077	0.018	0.070	<0.0020	<0.0020	<0.0020	<0.0020	<0.010	1.8	0.017	0.0097	79	19
4/6/2005	Influent	170	0.69	2.7	8.8	19	<0.67	<0.67	0.76	<0.67	0.14[J]	1	<0.001	0.015	79	19
	Effluent	8.4	0.0088	0.0051	0.018	0.039	<0.0020	<0.0020	0.0011[J]	<0.0020	0.0037[J]	0.97	0.00031[J]	0.39	78	20
EPA Method:		**8015 Mod**	**8260B**									**ASTM D1946-90**				
10/5/2005	Influent	590	3.1	4.7	17	31	<2.4	<2.7	5.1	<2.4	<33	6.3	<0.10	0.05[J]	84	9.3
	Effluent	14	<1.2	<0.92	<1.1	0.38[J]	<2.4	<2.7	<2.8	<2.4	<33	0.09[J]	<0.10	<0.10	78	22
EPA Method:		**TO-3**	**TO-14A**									**ASTM D1946**				
11/8/2005	Influent	1,300	0.55	1.6	5.5	14	<0.10	<0.10	<0.10	<0.10	<0.5	4.5	<0.001	0.13	82	14
	Effluent	57	<0.020	<0.020	0.0095[J]	<0.020	<0.020	<0.020	<0.020	<0.020	<0.10	1.2	<0.001	0.44	79	20
12/6/2005	Influent	1,100	0.52	1.8	5.2	16	<0.05	<0.05	0.31	<0.05	0.13[J]	3.5	<0.001	0.14	79	15
	Effluent	57	<0.010	<0.010	0.0099[J]	<0.010	<0.010	<0.010	<0.010	<0.010	0.0069[J]	0.95	0.0004[J]	0.34	77	20
1/3/2006	Influent	220	0.23	1.1	3.1	9.8	<0.05	<0.05	0.13	<0.05	<0.25	2.0	<0.001	0.02	80	19
	Effluent	6.4	0.015	0.009	0.019	0.089	<0.002	<0.002	<0.002	<0.002	0.0050[J]	0.86	<0.001	0.39	79	20
1/17/2006	Influent	770	--	--	--	--	--	--	--	--	--	--	--	--	--	--
	Effluent	61	--	--	--	--	--	--	--	--	--	--	--	--	--	--
5/16/2006	Influent	580	0.53	1.2	4.2	9.2	--	--	--	--	--	4.2	--	0.065	80	14
	Effluent	4.8	0.038	0.011	0.074	0.070	--	--	--	--	--	2.2	--	0.019	76	17
6/6/2006	Influent	2,000	0.81	1.0	3.6	8.1	--	--	--	--	--	3.0	--	0.20	80	17
	Effluent	4.9	0.040	0.0074	0.044	0.043	--	--	--	--	--	2.4	--	0.013	80	18
1/17/2006	Influent	770	--	--	--	--	--	--	--	--	--	--	--	--	--	--
	Effluent	61	--	--	--	--	--	--	--	--	--	--	--	--	--	--
5/16/2006	Influent	580	0.53	1.2	4.2	9.2	--	--	--	--	--	4.2	--	0.065	80	14
	Effluent	4.8	0.038	0.011	0.074	0.070	--	--	--	--	--	2.2	--	0.019	76	17
6/6/2006	Influent	2,000	0.81	1.0	3.6	8.1	--	--	--	--	--	3.0	--	0.20	80	17
	Effluent	4.9	0.040	0.0074	0.044	0.043	--	--	--	--	--	2.4	--	0.013	80	18

TABLE 8
SUMMARY OF PROCESS VAPOR SAMPLING RESULTS

Sample Date	Sample ID	GRO (ppmV)	Benzene (ppmV)	Ethylbenzene (ppmV)	Toluene (ppmV)	Total Xylenes (ppmV)	DIPE (ppmV)	ETBE (ppmV)	MTBE (ppmV)	TAME (ppmV)	TBA (ppmV)	CO_2 (%)	CO (%)	CH_4 (%)	N_2 (%)	O2 (%)
EPA Method:		8015 Mod	8260B									ASTM D1946-90				
9/19/2006	Influent w/o Dil	49	<1.2	<0.92	<1.1	2.0	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Influent w/ Dil	16	<1.2	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Effluent	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
10/3/2006	Effluent	63.0	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
10/17/2006	Influent w/o Dil	140	<1.2	1.0	2.2	8.2	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Influent w/ Dil	110	<1.2	<0.92	1.3	6.0	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Effluent	22.0	0.27	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
11/8/2006	Influent w/o Dil	1,500	<1.2	<0.92	2.1	8.4	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Influent w/ Dil	42	<1.2	<0.92	1.3	5.1	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--
	Effluent	87	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	--	--	--	--	--

Notes:

GRO = Gasoline Range Organics (C_4 - C_{12})

ppmV = Parts per million on a volume basis

-- = Not sampled/Not analyzed

DIPE = Di-Isopropyl ether

ETBE = Ethyl tert-butyl ether

MTBE = Methyl Tertiary Butyl Ether

TAME = Tertiary-amyl methylether

TBA = Tert-butyl alcohol

CO_2 = Carbon dioxide

CO = Carbon monoxide

CH_4 = Methane

N_2 = Nitrogen

O_2 = Oxygen

(%) = Percentage of air volume

Effluent samples from 4/11/04 to 6/02/04, 8/04/04 to 11/04/04, and 9/19/06 to 11/08/06 were analyzed for Benzene using EPA Method 410A Mod.

TABLE 9
Summary of Individual Well Vapor Sample Analytical Results
Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA

Sample Date	Sample ID	GRO (ppmV)	Benzene (ppmV)	Ethylbenzene (ppmV)	Toluene (ppmV)	Total Xylenes (ppmV)	DIPE (ppmV)	ETBE (ppmV)	MTBE (ppmV)	TAME (ppmV)	TBA (ppmV)	CO_2 (%)	Methane (%)	O_2 (%)
EPA Method:		8015 Mod	8260B											
4/7/2004	SVE-1 Shallow	11000	120	100	320	470	<12	<13	23	<12	<160	11	0	<5.5
4/7/2004	SVE-1 Deep	10000	100	100	280	510	<12	<13	43	<12	<160	11	1	<5.5
4/7/2004	SVE-2 Shallow	14000	150	88	360	470	<12	<13	72	<12	<160	12	1	<5.5
4/7/2004	SVE-2 Deep	14000	130	92	350	500	<12	<13	67	<12	<160	12	1	<5.5
4/7/2004	SVE-3 Shallow	14000	270	130	420	570	<24	<27	<28	<24	<330	12	1	<5.5
4/7/2004	SVE-3 Deep	13000	250	130	440	610	<24	<27	46	<24	<330	12	1	<5.5
4/7/2004	SVE-4 Shallow	5900	38	45	190	210	<12	<13	<14	<12	<160	10	0	8
4/7/2004	SVE-4 Deep	8500	82	46	340	200	<24	<27	<28	<24	<330	12	0	<5.5
4/7/2004	SVE-5 Shallow	5100	11	15	3	31	<2.4	<2.7	<2.8	<2.4	<33	7	0	9
4/7/2004	SVE-5 Deep	13000	15	10	3	22	<6.0	<6.6	<7.0	<6.0	<82	6	1	9
4/7/2004	MW-A7	5200	25	31	120	230	<6.0	<6.6	13	<6.0	<82	0	<0.1	23

TABLE 9
Summary of Individual Well Vapor Sample Analytical Results
Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA

Sample Date	Sample ID	GRO (ppmV)	Benzene (ppmV)	Ethylbenzene (ppmV)	Toluene (ppmV)	Total Xylenes (ppmV)	DIPE (ppmV)	ETBE (ppmV)	MTBE (ppmV)	TAME (ppmV)	TBA (ppmV)	CO_2 (%)	Methane (%)	O_2 (%)
EPA Method:		8015 Mod	410A	8260B										
10/31/2006	SVE-1 Shallow	**20**	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-1 Deep	**4.3**	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-2 Shallow	**15**	<0.059	<0.92	<1.1	**4.5**	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-2 Deep	**950**	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-3 Shallow	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-3 Deep	**160**	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-4 Shallow	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-4 Deep	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-5 Shallow	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	SVE-5 Deep	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	MW-A7- S	<2.4	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-
10/31/2006	MW-A7- D	**26**	<0.059	<0.92	<1.1	<1.8	<2.4	<2.7	<2.8	<2.4	<33	-	-	-

Notes:

GRO = Gasoline Range Organics (C_4 - C_{12})

ppmV = Parts per million on a volume basis

-- = Not sampled/Not analyzed

DIPE = Di-Isopropyl ether

ETBE = Ethyl tert-butyl ether

MTBE = Methyl Tertiary Butyl Ether

TAME = Tertiary-amyl methylether

TBA = Tert-butyl alcohol

CO_2 = Carbon dioxide

CO = Carbon monoxide

CH_4 = Methane

N_2 = Nitrogen

O_2 = Oxygen

(%) = Percentage of air volume

TABLE 10
Individual Soil Vapor Extraction Well Field Monitoring Data
Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA
Initial Start-up Date 4/7/04

Well Number (Slotted Interval) (Start-up H.C. ppmv)	Monitoring Date	VOC Concentration (ppmv)	Vapor Well Flow Rate (scfm)	Vacuum at Flow Potential (in. w.c.)	Well Status
SVE-1 Shallow	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(8 TO 28)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(11,000)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-1 Deep	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(35 TO 55)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(10,000)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-2 Shallow	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(7 TO 27)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(14,000)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-2 Deep	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(35 TO 55)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(14,000)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-3 Shallow	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(8 TO 28)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(14,000)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE

TABLE 10
Individual Soil Vapor Extraction Well Field Monitoring Data
Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA
Initial Start-up Date 4/7/04

Well Number (Slotted Interval) (Start-up H.C. ppmv)	Monitoring Date	VOC Concentration (ppmv)	Vapor Well Flow Rate (scfm)	Vacuum at Flow Potential (in. w.c.)	Well Status
SVE-3 Deep	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(35 TO 55)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(13,000)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-4 Shallow	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(7 TO 27)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(5,900)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-4 Deep	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(34 TO 54)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(8,500)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-5 Shallow	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(7 TO 27)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(5,100)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
SVE-5 Deep	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(35 TO 55)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(13,000)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE

TABLE 10
Individual Soil Vapor Extraction Well Field Monitoring Data
Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA
Initial Start-up Date 4/7/04

Well Number (Slotted Interval) (Start-up H.C. ppmv)	Monitoring Date	VOC Concentration (ppmv)	Vapor Well Flow Rate (scfm)	Vacuum at Flow Potential (in. w.c.)	Well Status
MW-A7 Shallow	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
	10/31/06	--	--	40	ON-LINE
(10 TO 30)	11/07/06	--	--	40	ON-LINE
	11/14/06	--	--	40	ON-LINE
(5,200)*	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE
MW-A7 Deep	10/03/06	--	--	41	ON-LINE
	10/17/06	--	--	40	ON-LINE
	10/24/06	--	--	40	ON-LINE
(35 TO 65)	10/31/06	--	--	40	ON-LINE
	11/07/06	--	--	40	ON-LINE
(--)*	11/14/06	--	--	40	ON-LINE
	11/21/06	--	--	40	ON-LINE
	--	--	--	--	OFF-LINE
	--	--	--	--	OFF-LINE

VOC = Volatile Organic Compounds
* = GRO from Laboratory analytical samples taken on start-up
-- = not measured

ppmv = Parts per million measured on a volume basis
scfm = standard cubic feet per minute
in w.c. = inches of water column

TABLE 11
Individual Air Sparge Well Monitoring Data
Atlantic Richfield Company Station No. 5110
5731 East Firestone Boulevard
South Gate, CA
Initial Start-Up Date 4/7/04

Well Number	Monitoring Date	Injection Flow Rate (scfh)	Injection Pressure (psi)
AS-1	9/26/2006	4.0	5.0
	--	--	--
	--	--	--
AS-2	9/26/2006	0.0	15.0
	--	--	--
	--	--	--
AS-3	9/26/2006	5.0	15.0
	10/17/2006	4.0	11.0
	11/7/2006	4.0	11.0
AS-4	9/26/2006	8.0	15.0
	10/17/2006	8.0	5.0
	--	--	--
AS-5	9/26/2006	8.0	15.0
	--	--	--
	--	--	--
AS-7	9/26/2006	0.0	15.0
	--	--	--
	--	--	--

-- = Not measured.
scfh = Standard cubic feet per hour
psi = Pounds per square inch

TABLE 12a

DAILY OPERATIONAL LOG
ATLANTIC RICHFIELD COMPANY STATION No .5110
SYSTEM START-UP DATE: 4/7/04

December 2006

DATE	DATA SOURCE	NOTES	LAB INF. CONC. SOURCE (PPMV)	LAB INF. CONC. W/ DIL. (PPMV)	LAB EFFLUENT CONC. (PPMV)	FIELD INF. CONC. SOURCE (PPMV)	FIELD INF. CONC. W/ DIL. (PPMV)	FIELD EFFLUENT CONC. (PPMV)	MANUAL DILUTION VALVE OPEN (%)	AUTOMATIC DILUTION VALVE OPEN (%)	GRO CONV. (%)	SOURCE FLOW (SCFM)	PROCESS FLOW (SCFM)	MANIFOLD VACUUM (IN H2O)	COMBUST-ION TEMP. (DEG F)	EFFLUENT TEMP. (DEG F)	CUMULATIVE HC REMOVED (LB)	HOURS ON-LINE
12/01/06	system off																50,283	0.0
12/02/06	system off																50,283	0.0
12/03/06	system off																50,283	0.0
12/04/06	system off																50,283	0.0
12/05/06	system off																50,283	0.0
12/06/06	system off																50,283	0.0
12/07/06	system off																50,283	0.0
12/08/06	system off																50,283	0.0
12/09/06	system off																50,283	0.0
12/10/06	system off																50,283	0.0
12/11/06	system off																50,283	0.0
12/12/06	system off																50,283	0.0
12/13/06	system off																50,283	0.0
12/14/06	system off																50,283	0.0
12/15/06	system off																50,283	0.0
12/16/06	system off																50,283	0.0
12/17/06	system off																50,283	0.0
12/18/06	system off																50,283	0.0
12/19/06	system off																50,283	0.0
12/20/06	system off																50,283	0.0
12/21/06	system off																50,283	0.0
12/22/06	system off																50,283	0.0
12/23/06	system off																50,283	0.0
12/24/06	system off																50,283	0.0
12/25/06	system off																50,283	0.0
12/26/06	system off																50,283	0.0
12/27/06	system off																50,283	0.0
12/28/06	system off																50,283	0.0
12/29/06	system off																50,283	0.0
12/30/06	system off																50,283	0.0
12/31/06	system off																50,283	0.0

TOTAL POUNDS OF HYDROCARBONS REMOVED SINCE INITIAL START UP	50,283
TOTAL POUNDS OF HYDROCARBONS REMOVED DURNG THIS MONTH	818
TOTAL HOURS ON-LINE DURING THIS MONTH	0

Notes:
1 = System off pending system change.

TECH - Technician performed O&M on this date
* - Data extrapolated
NA - Not Applicable
GRO - Gasoline Range Organics

TABLE 12b

DAILY OPERATIONAL LOG
ATLANTIC RICHFIELD COMPANY STATION No .5110
SYSTEM START-UP DATE: 4/7/04

January 2007

DATE	DATA SOURCE	NOTES	LAB INF. CONC. SOURCE (PPMV)	LAB INF. CONC. W/ DIL. (PPMV)	LAB EFFLUENT CONC. (PPMV)	FIELD INF. CONC. SOURCE (PPMV)	FIELD INF. CONC. W/ DIL. (PPMV)	FIELD EFFLUENT CONC. (PPMV)	MANUAL DILUTION VALVE OPEN (%)	AUTOMATIC DILUTION VALVE OPEN (%)	GRO CONV. (%)	SOURCE FLOW (SCFM)	PROCESS FLOW (SCFM)	MANIFOLD VACUUM (IN H2O)	COMBUST-ION TEMP. (DEG F)	EFFLUENT TEMP. (DEG F)	CUMULATIVE HC REMOVED (LB)	HOURS ON-LINE
01/01/07	system off																50,283	0.0
01/02/07	system off																50,283	0.0
01/03/07	system off																50,283	0.0
01/04/07	system off																50,283	0.0
01/05/07	system off																50,283	0.0
01/06/07	system off																50,283	0.0
01/07/07	system off																50,283	0.0
01/08/07	system off																50,283	0.0
01/09/07	system off																50,283	0.0
01/10/07	system off																50,283	0.0
01/11/07	system off																50,283	0.0
01/12/07	system off																50,283	0.0
01/13/07	system off																50,283	0.0
01/14/07	system off																50,283	0.0
01/15/07	system off																50,283	0.0
01/16/07	system off																50,283	0.0
01/17/07	system off																50,283	0.0
01/18/07	system off																50,283	0.0
01/19/07	system off																50,283	0.0
01/20/07	system off																50,283	0.0
01/21/07	system off																50,283	0.0
01/22/07	system off																50,283	0.0
01/23/07	system off																50,283	0.0
01/24/07	system off																50,283	0.0
01/25/07	system off																50,283	0.0
01/26/07	system off																50,283	0.0
01/27/07	system off																50,283	0.0
01/28/07	system off																50,283	0.0
01/29/07	system off																50,283	0.0
01/30/07	system off																50,283	0.0
01/31/07	system off																50,283	0.0

TOTAL POUNDS OF HYDROCARBONS REMOVED SINCE INITIAL START UP	50,283
TOTAL POUNDS OF HYDROCARBONS REMOVED DURNG THIS MONTH	0
TOTAL HOURS ON-LINE DURING THIS MONTH	0

Notes:
1 = System off pending system change.

TECH - Technician performed O&M on this date
* - Data extrapolated
NA - Not Applicable
GRO - Gasoline Range Organics

TABLE 12c

DAILY OPERATIONAL LOG
ATLANTIC RICHFIELD COMPANY STATION No .5110
SYSTEM START-UP DATE: 4/7/04

February 2007

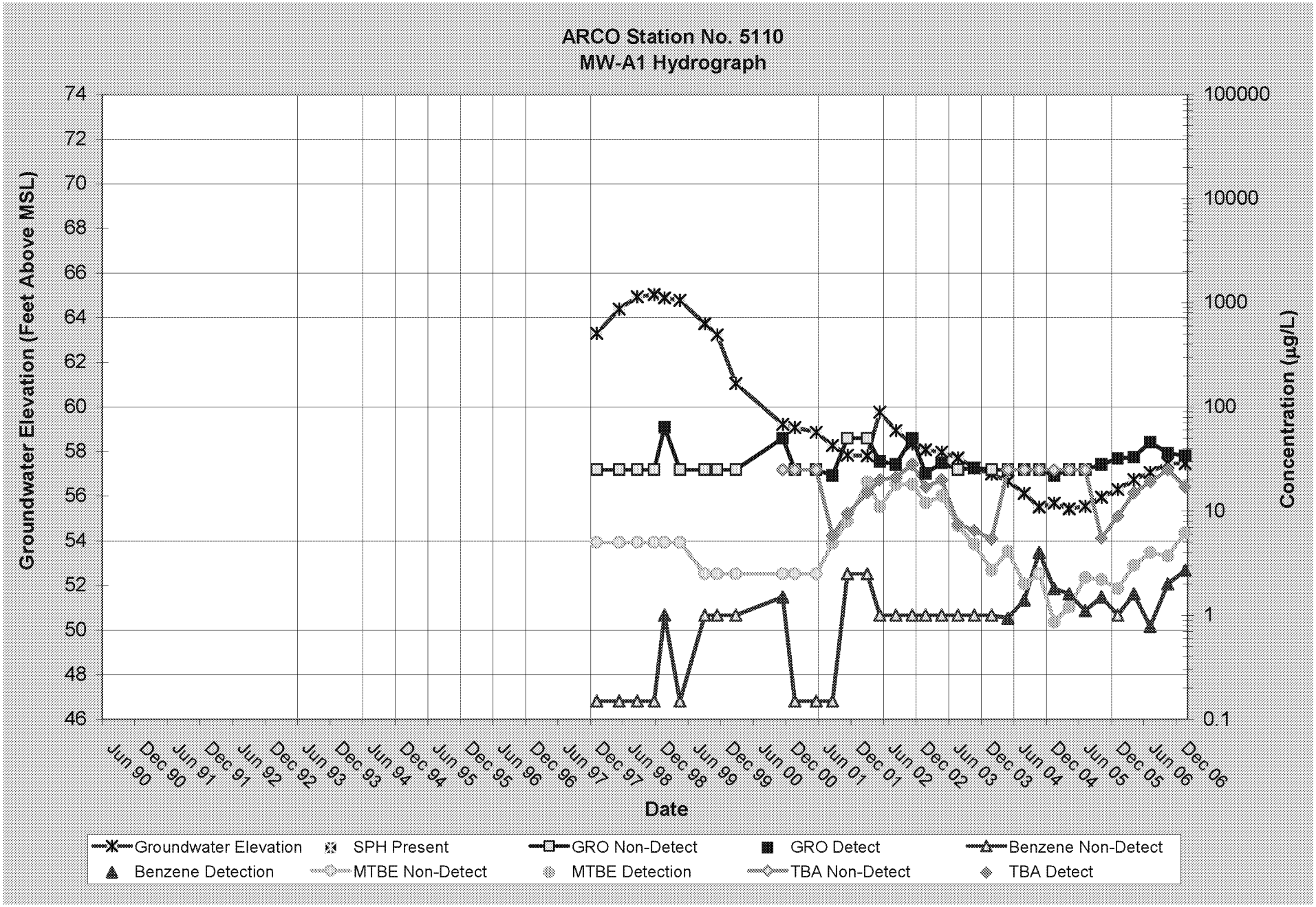
DATE	DATA SOURCE	NOTES	LAB INF. CONC. SOURCE (PPMV)	LAB INF. CONC. W/ DIL. (PPMV)	LAB EFFLUENT CONC. (PPMV)	FIELD INF. CONC. SOURCE (PPMV)	FIELD INF. CONC. W/ DIL. (PPMV)	FIELD EFFLUENT CONC. (PPMV)	MANUAL DILUTION VALVE OPEN (%)	AUTOMATIC DILUTION VALVE OPEN (%)	GRO CONV. (%)	SOURCE FLOW (SCFM)	PROCESS FLOW (SCFM)	MANIFOLD VACUUM (IN H2O)	COMBUST-ION TEMP. (DEG F)	EFFLUENT TEMP. (DEG F)	CUMULATIVE HC REMOVED (LB)	HOURS ON-LINE
02/01/07	system off																50,283	0.0
02/02/07	system off																50,283	0.0
02/03/07	system off																50,283	0.0
02/04/07	system off																50,283	0.0
02/05/07	system off																50,283	0.0
02/06/07	system off																50,283	0.0
02/07/07	system off																50,283	0.0
02/08/07	system off																50,283	0.0
02/09/07	system off																50,283	0.0
02/10/07	system off																50,283	0.0
02/11/07	system off																50,283	0.0
02/12/07	system off																50,283	0.0
02/13/07	system off																50,283	0.0
02/14/07	system off																50,283	0.0
02/15/07	system off																50,283	0.0
02/16/07	system off																50,283	0.0
02/17/07	system off																50,283	0.0
02/18/07	system off																50,283	0.0
02/19/07	system off																50,283	0.0
02/20/07	system off																50,283	0.0
02/21/07	system off																50,283	0.0
02/22/07	system off																50,283	0.0
02/23/07	system off																50,283	0.0
02/24/07	system off																50,283	0.0
02/25/07	system off																50,283	0.0
02/26/07	system off																50,283	0.0
02/27/07	system off																50,283	0.0
02/28/07	system off																50,283	0.0

TOTAL POUNDS OF HYDROCARBONS REMOVED SINCE INITIAL START UP	50,283
TOTAL POUNDS OF HYDROCARBONS REMOVED DURNG THIS MONTH	0
TOTAL HOURS ON-LINE DURING THIS MONTH	0

Notes:
1 = System off pending system change.

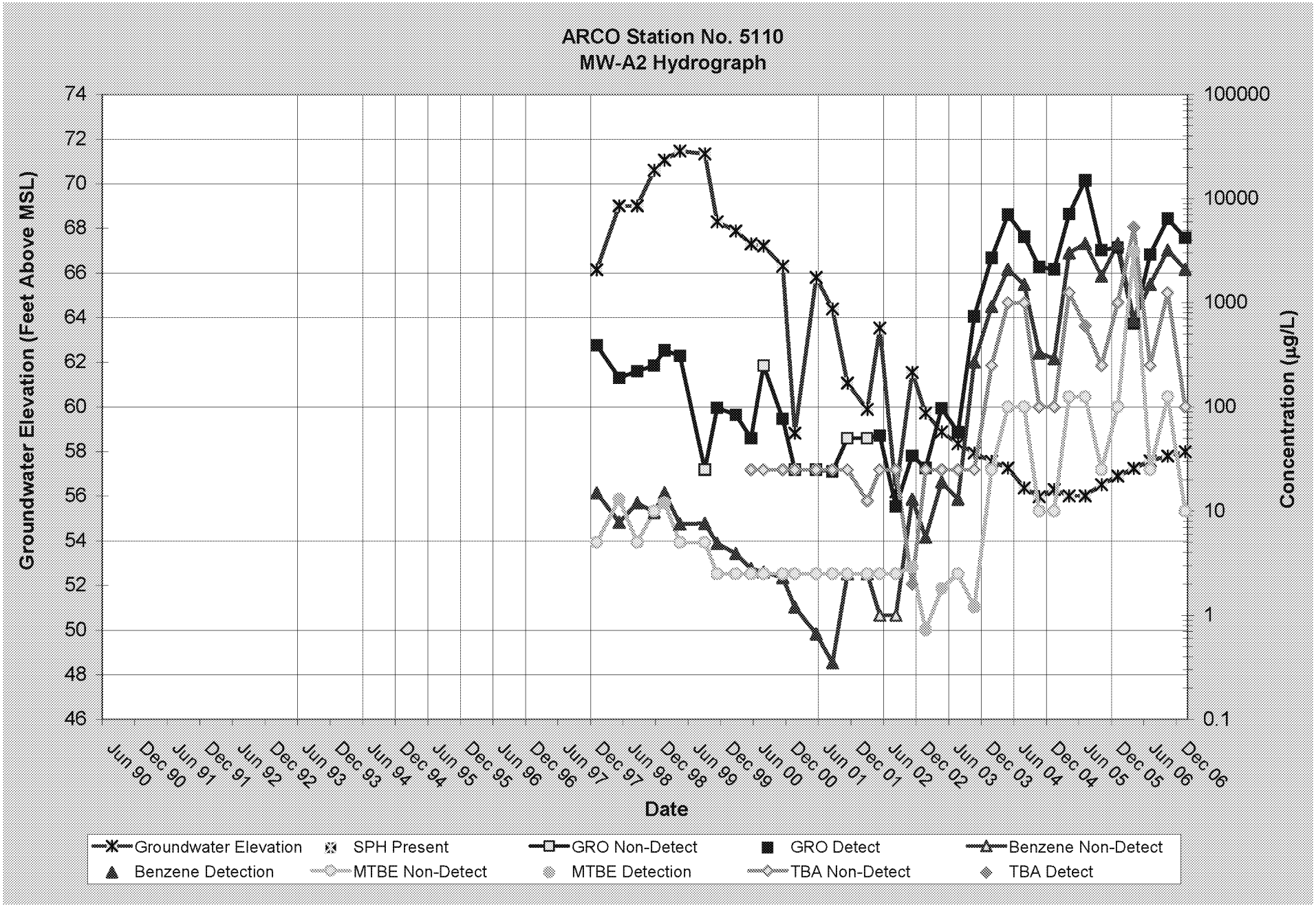
TECH - Technician performed O&M on this date
* - Data extrapolated
NA - Not Applicable
GRO - Gasoline Range Organics

GRAPHS



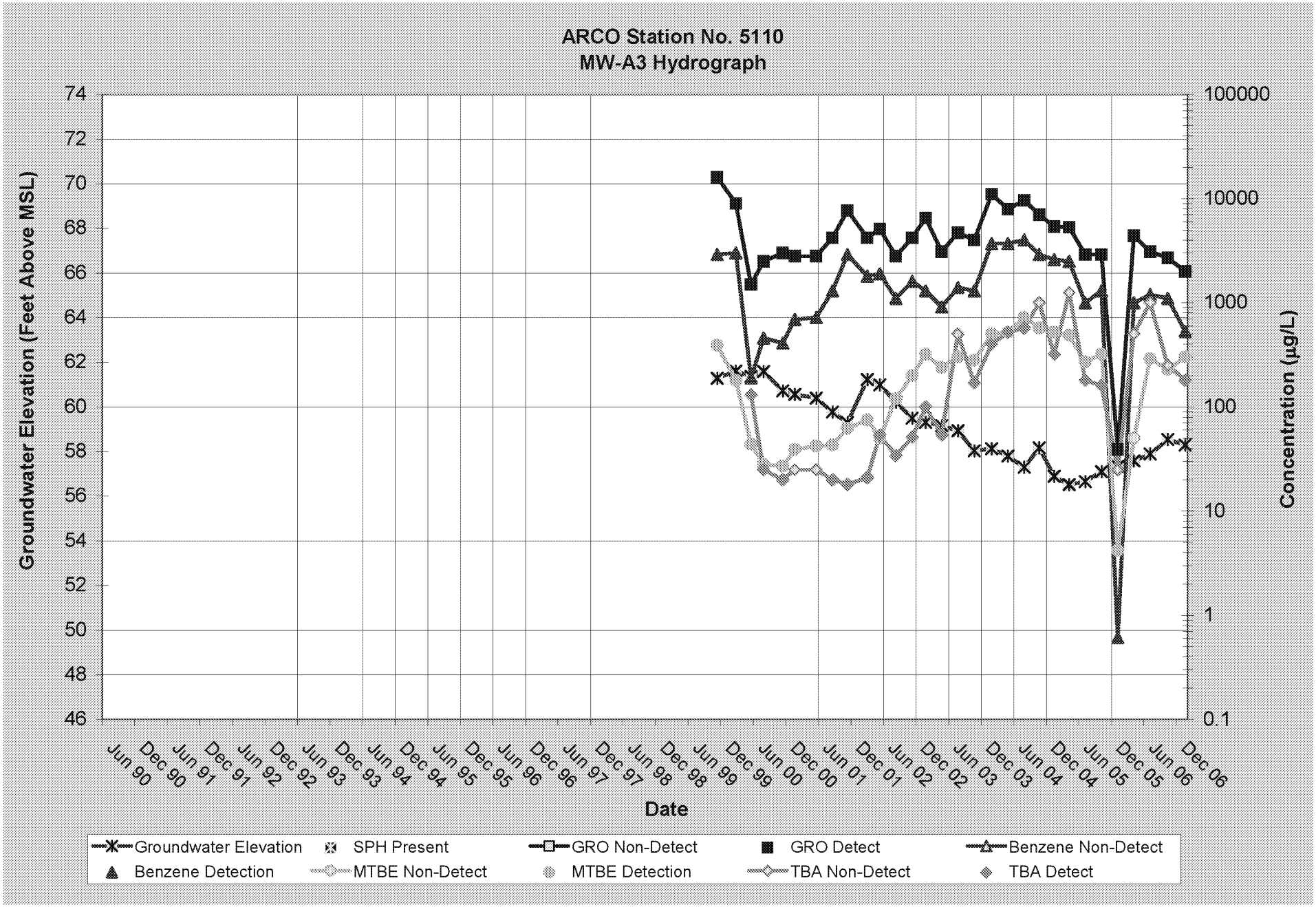
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



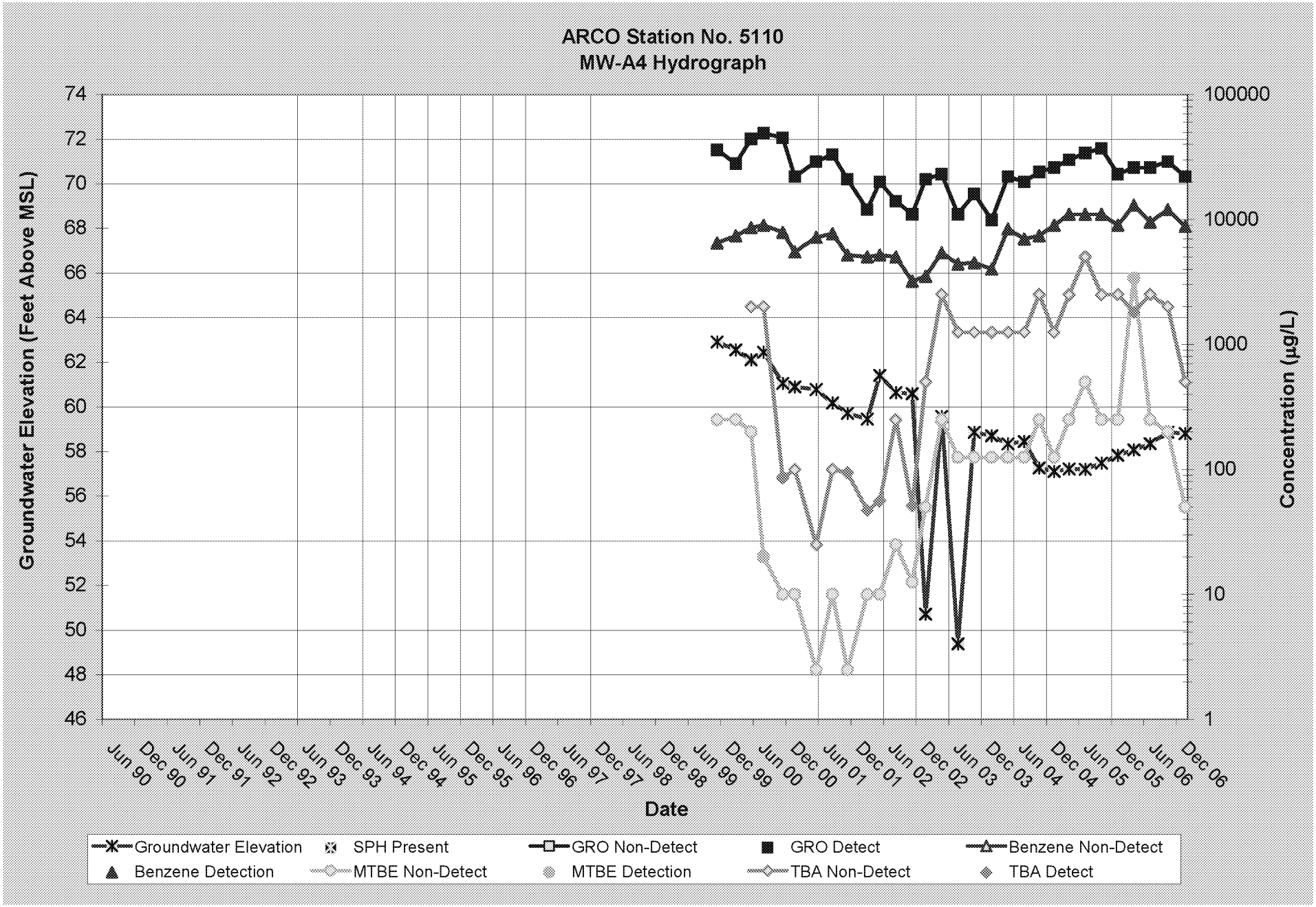
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



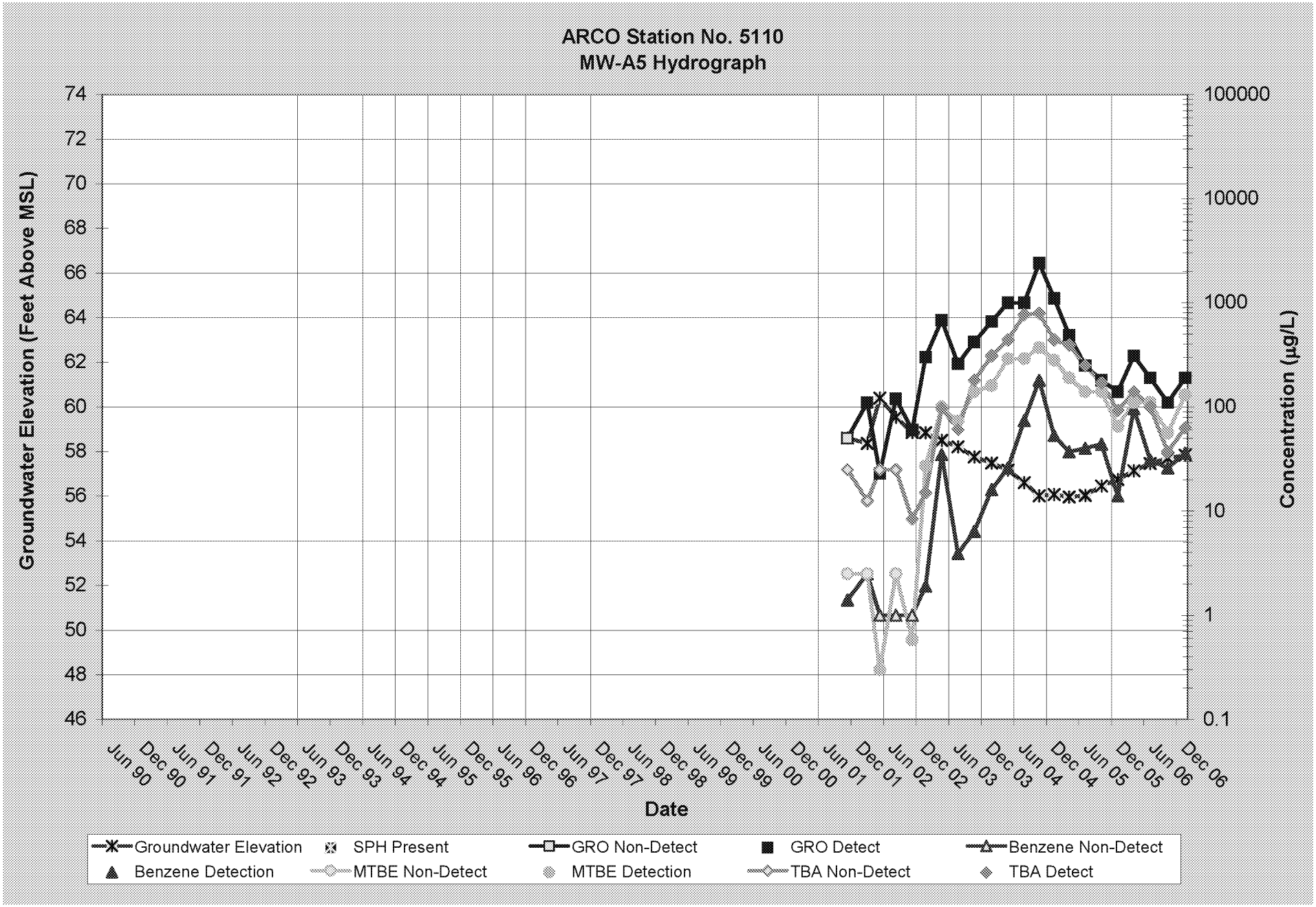
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



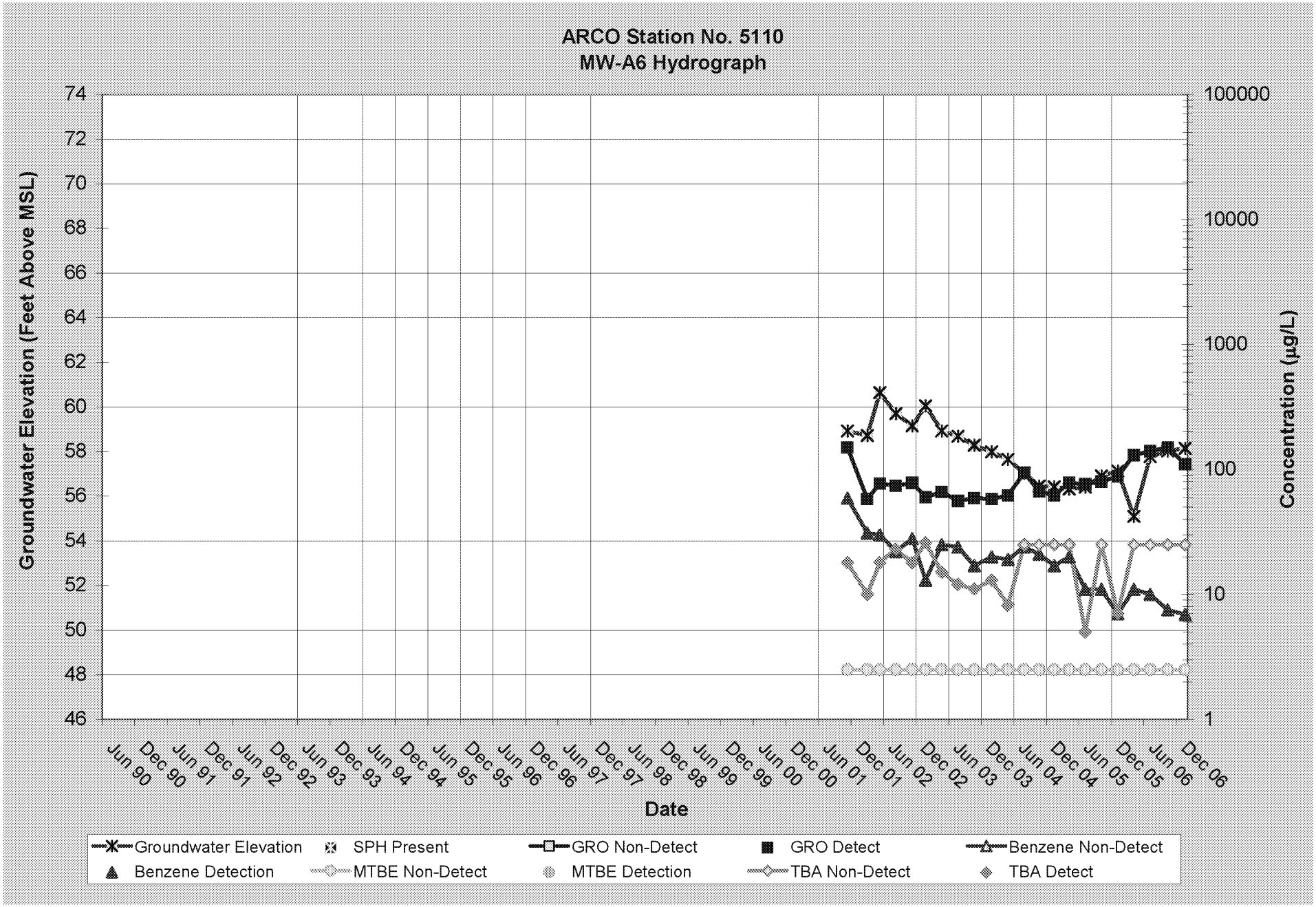
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



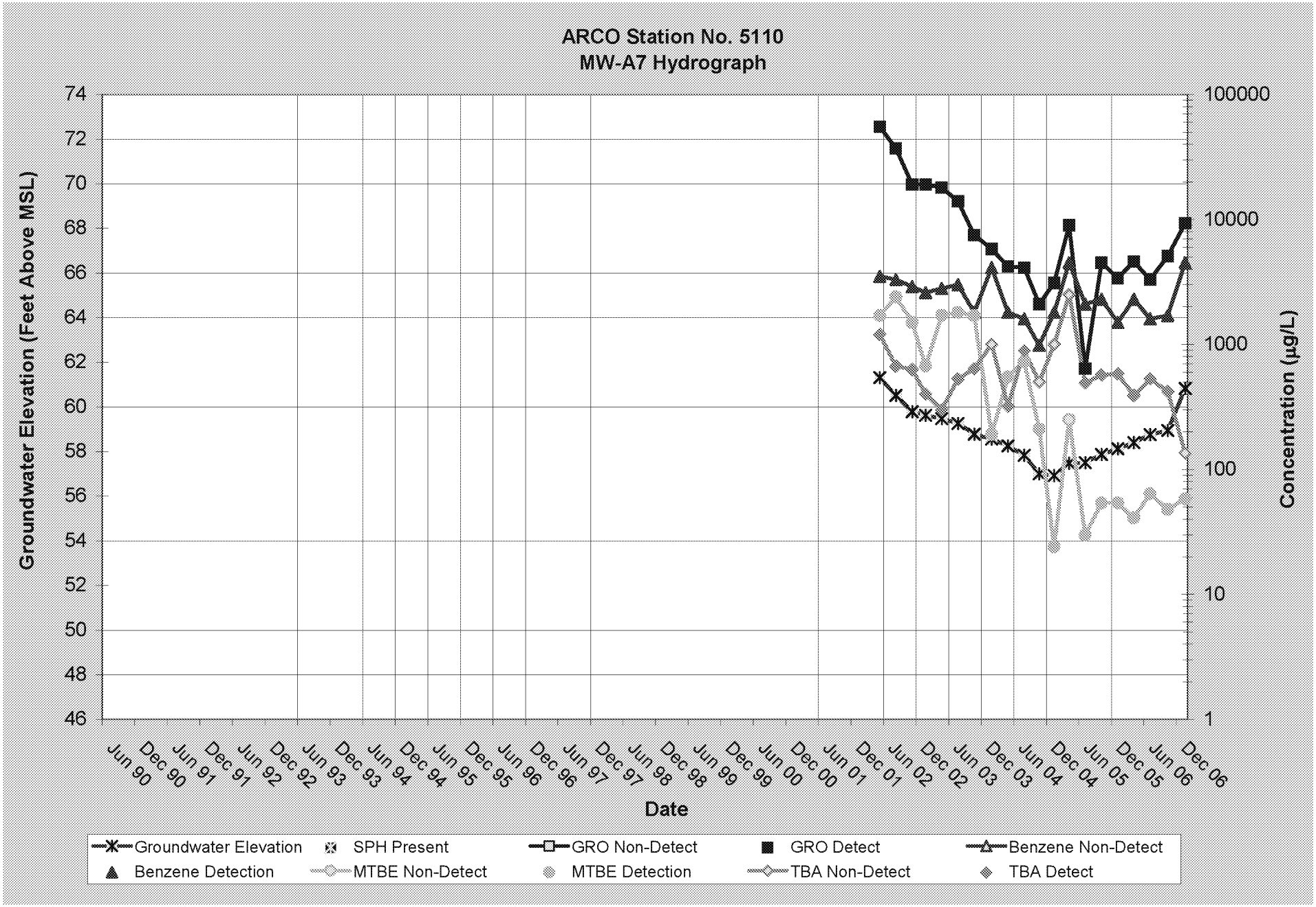
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



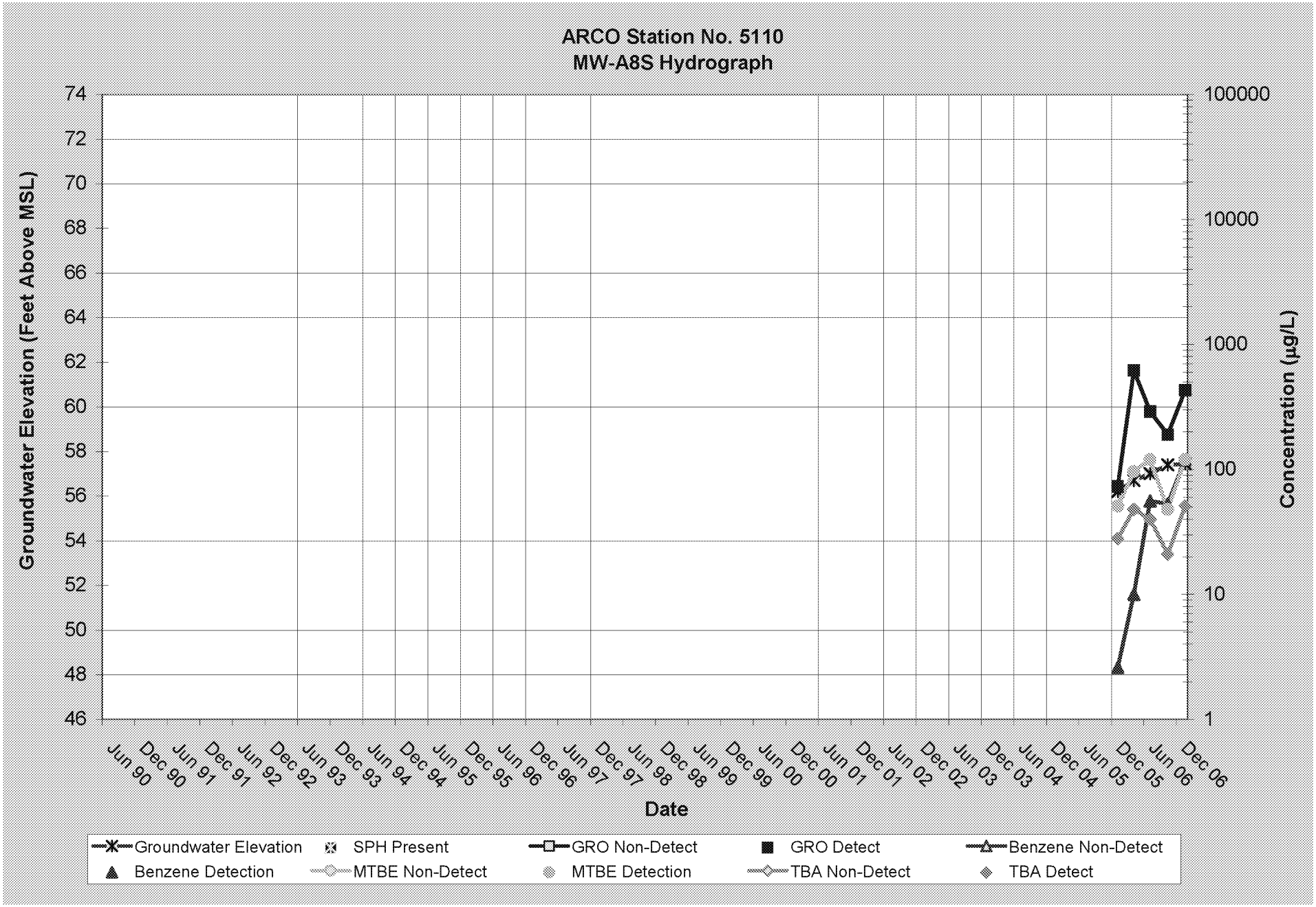
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



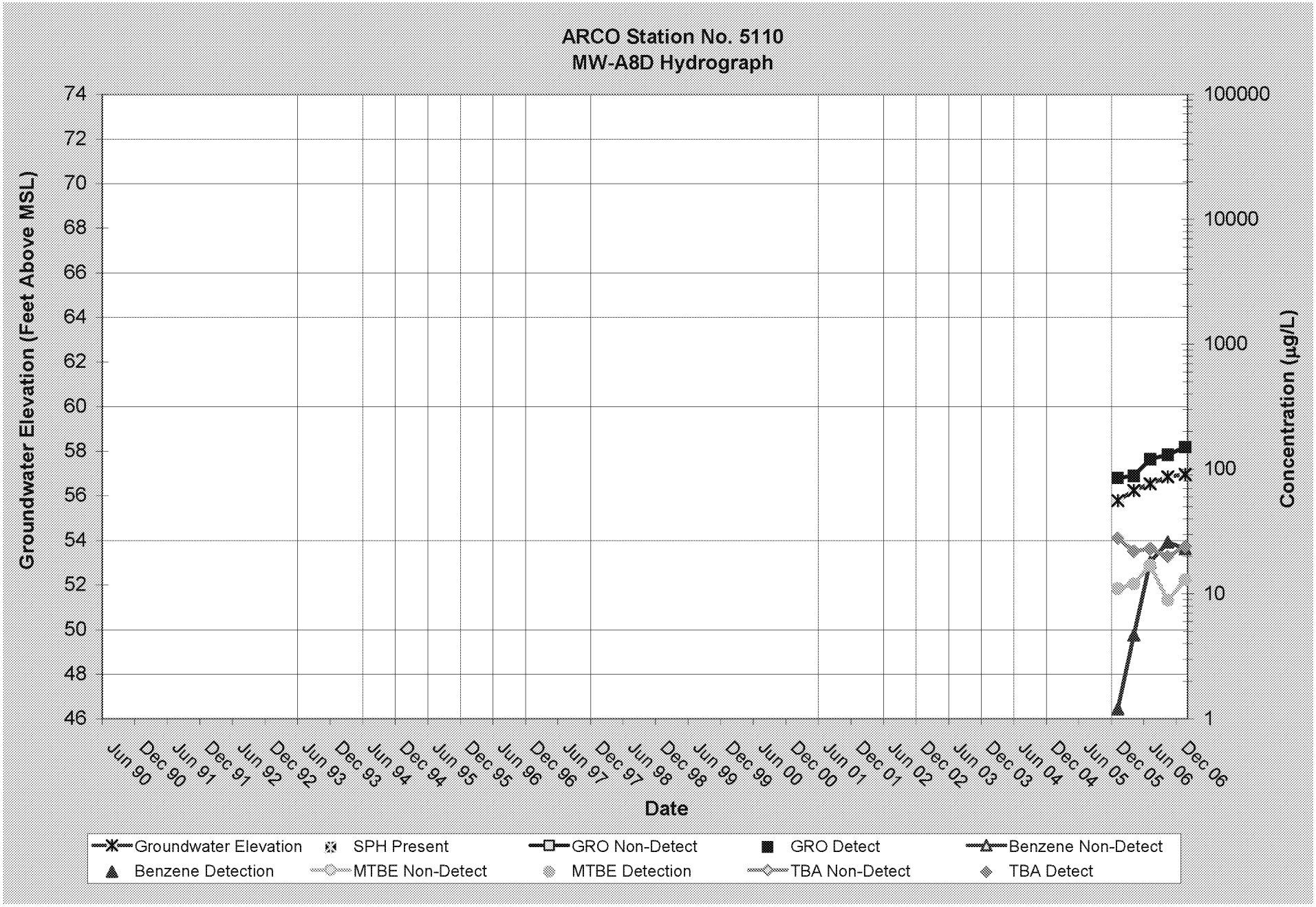
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



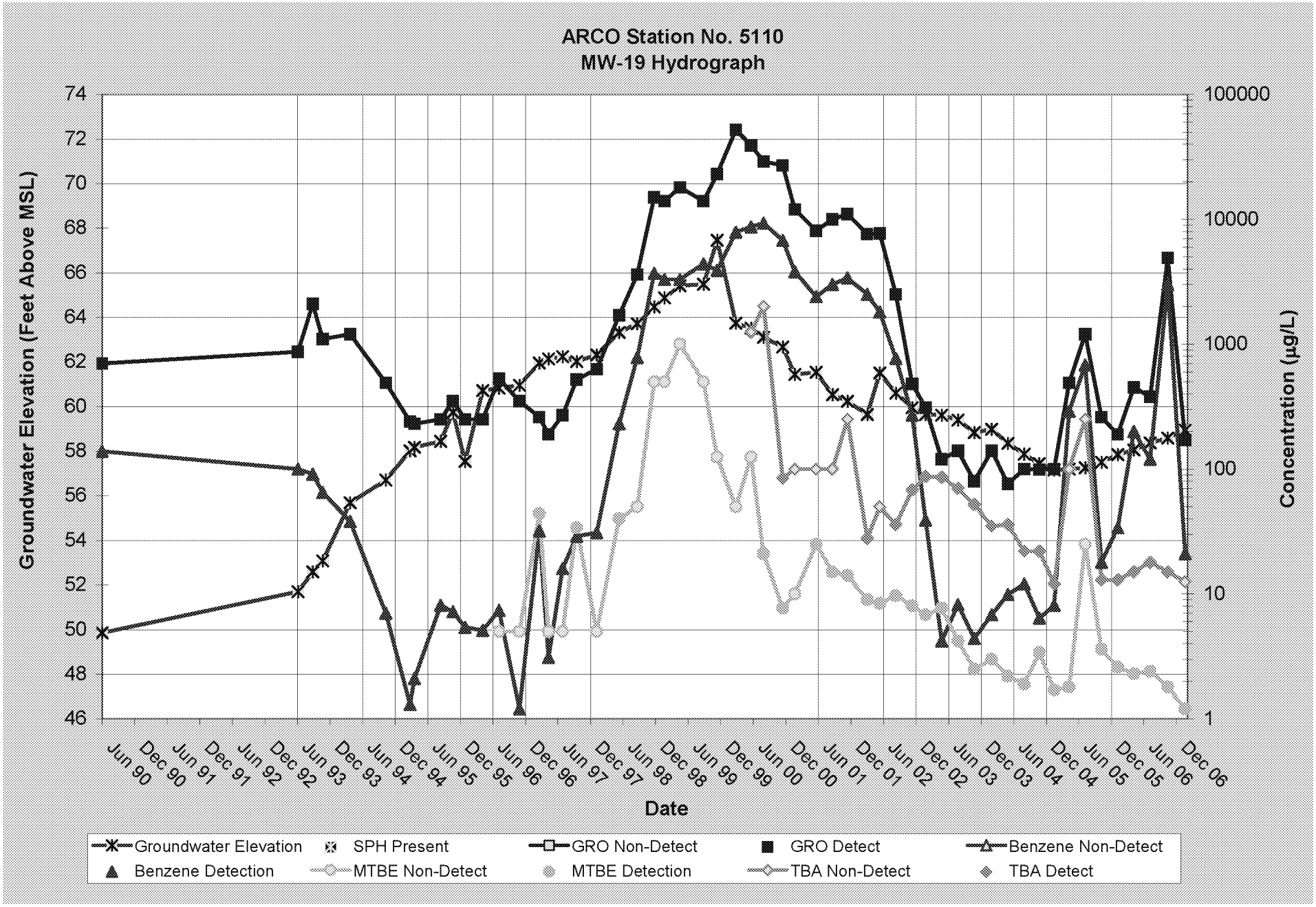
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



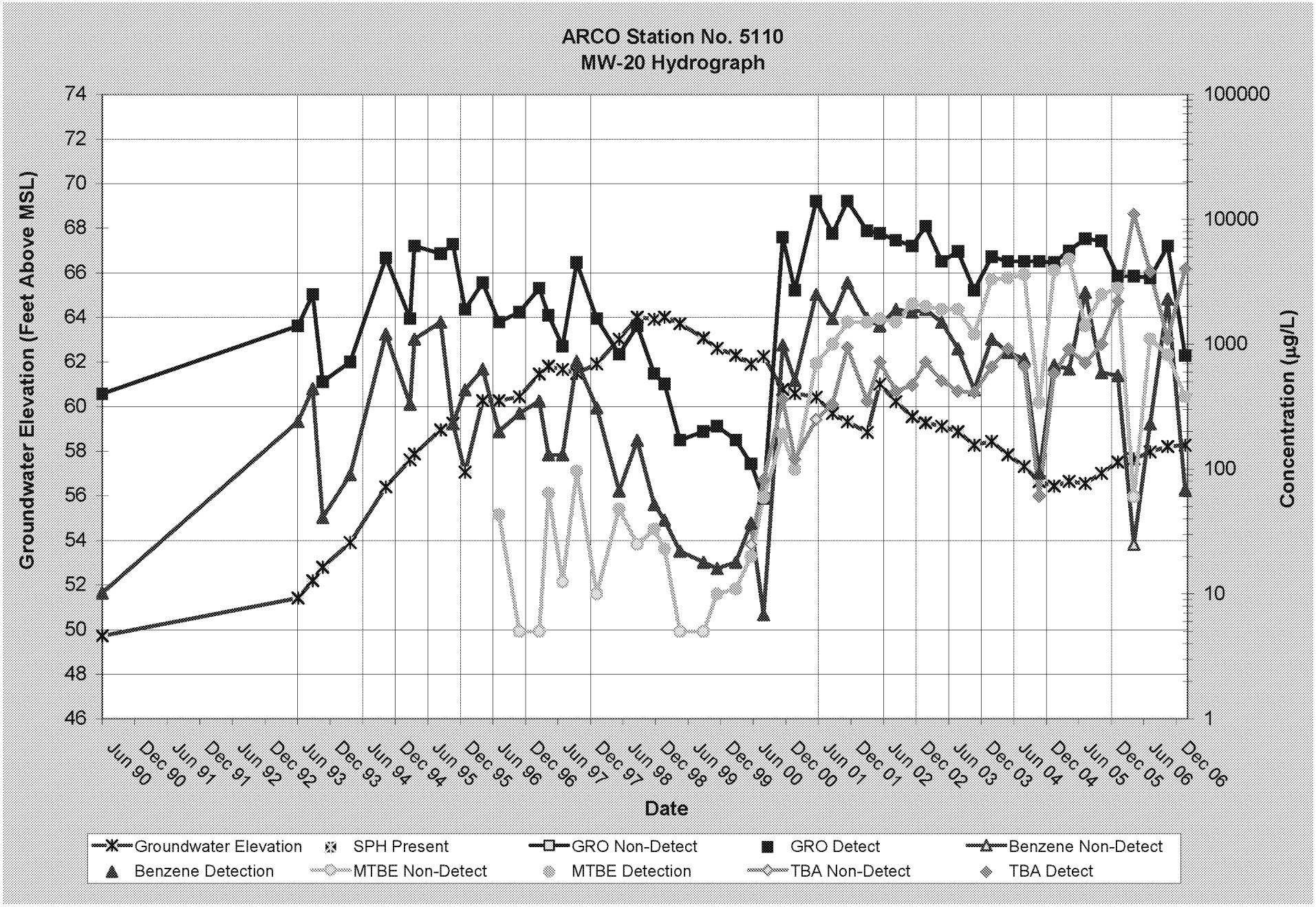
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



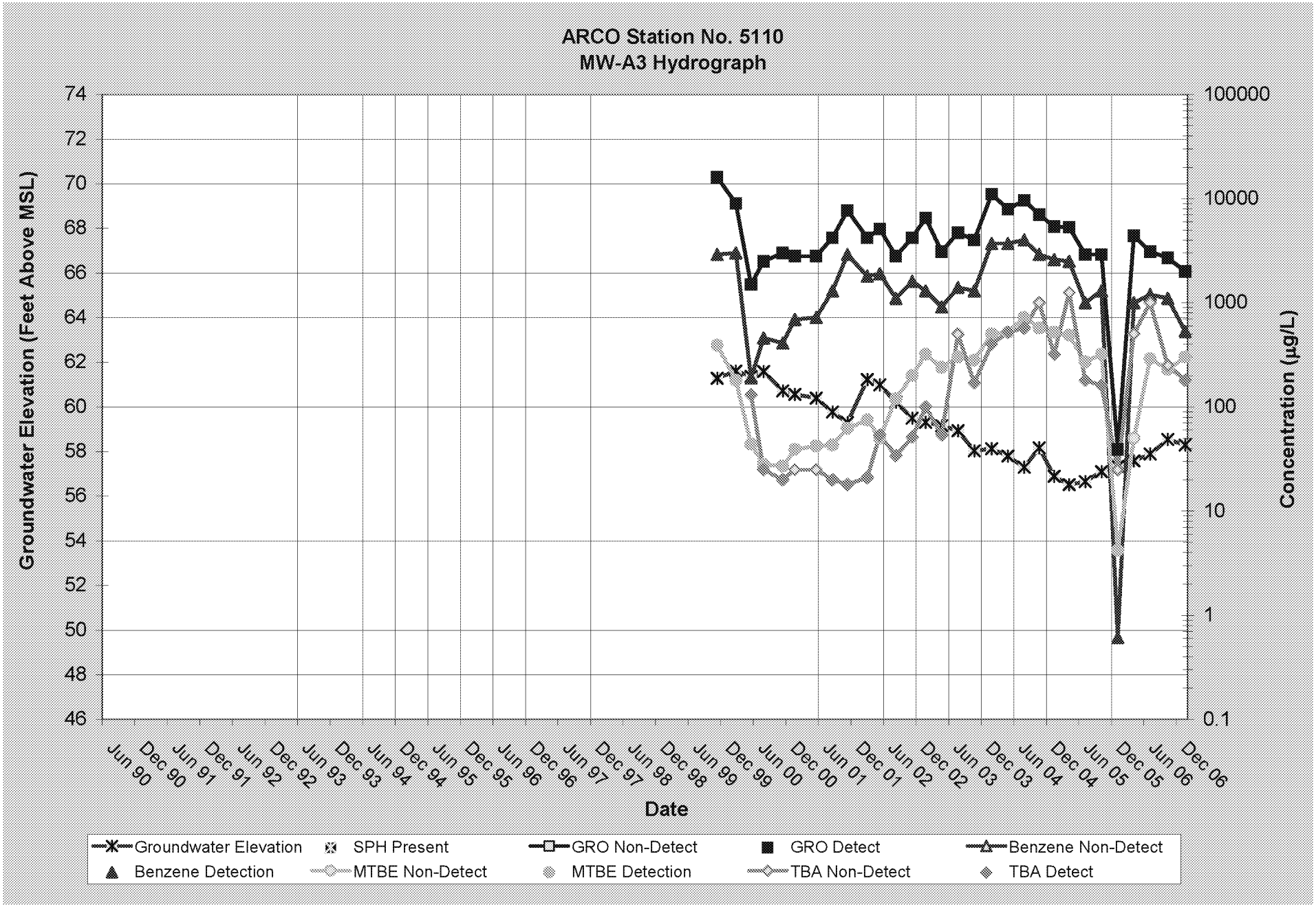
Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.



Notes

1. No analytical samples were collected if SPH was present in the well during the sampling event.
2. Non-detected analytical results are graphed at a concentration of one-half of the laboratory reporting limit.
3. Trend lines are presented for reference purposes only and do not represent professional interpretation.
4. For additional information about data for a given sampling event (such as no data plotted), refer to Table 2.

APPENDICES

APPENDIX A

INTRODUCTION

SECOR International Incorporated (SECOR), on behalf of the Atlantic Richfield Company (Atlantic Richfield), presents this *Site Conceptual Model Update (SCMU)* for ARCO Station No. 5110 (Site) located at 5731 Firestone Boulevard, in South Gate, California (Figures 1 and 2). This report was prepared in response to the Los Angeles Regional Water Quality Control Board (LARWQCB) letters dated February 28, 2003 and August 27, 2003, titled *Implementation of Final Draft Guidelines for the Investigation and Cleanup of MTBE and Other Oxygenates* (Appendix A). The LARWQCB assigned the Site an investigation and cleanup priority of B2.

SECOR has prepared this report to present a detailed written and graphical description of the Site characteristics and known distribution of petroleum hydrocarbon constituents in soil and groundwater beneath the Site. The SCMU is based on currently available information.

SITE DESCRIPTION

Site Description

ARCO Station No. 5110 is an operating retail gasoline station and mini-mart located at the northwest corner of Firestone Boulevard and Garfield Avenue in South Gate, California. The Site is located at an elevation of approximately 107 feet above mean sea level (msl). Local topography slopes to the south-southwest at approximately 0.017 feet per foot (USGS, 1964). The Los Angeles River is located approximately 2,000 feet west of the Site. The Site currently maintains one 20,000-gallon, and one split 24,000-gallon (two 12,000-gallon chambers), Xerxes double-walled fiberglass underground storage tanks (USTs), and four fuel dispenser islands containing a total of eight fuel dispensers. All product piping consists of double-contained fiberglass product lines. All dispensers are equipped with under-dispenser containment sumps. A drive-through carwash facility and associated clarifier are located at the northwestern perimeter of the Site.

Surrounding Land Use

The ARCO Vinvale Terminal is located approximately 500 feet north of ARCO Station No. 5110 (Figure 2). The Vinvale Terminal covers an area of approximately 35 acres and currently is used for the storage and on-loading of gasoline and diesel fuel products for Atlantic Richfield retail outlets in the Los Angeles metropolitan area.

Surrounding Water Use

The Site is located within the Central Basin Pressure Area of the Central Groundwater basin of the Los Angeles Coastal Plain. The two main formations in this area, Lakewood and San Pedro, contain a series of distinct water-bearing zones that are separated by less-permeable zones or aquiclude. The Lakewood Formation is composed of four hydrostratigraphic zones: the Bellflower Aquiclude, the Exposition Aquifer, an unnamed aquiclude, and the Gage Aquifer. In the Site vicinity, the Bellflower Aquiclude extends from approximately 20 to 85 feet bgs. The underlying Exposition Aquifer can be divided into a middle hydrostratigraphic zone extending from approximately 85 to 210 feet bgs, and a deep hydrostratigraphic zone extending from approximately 210 to 275 feet bgs.

Locally, the Bellflower Aquiclude contains a relatively high percentage of sand and functions as an unconfined to semi-confined aquifer instead of a confining layer. This is the case at ARCO Station 5110

where groundwater is encountered within the Bellflower Aquiclude at depths ranging from approximately 40 to 57 feet bgs.

APPENDIX B

SITE BACKGROUND

This section presents a summary of historical assessment investigation activities that have been completed at the Site to date. Site maps showing historical soil boring/remedial well locations and historical UST, dispenser, and product line sample locations are included as Figures 3 through 5. A Site map showing hydrocarbon concentrations in soil is included as Figure 6. Historical soil analytical results are summarized in Table 1. Historical groundwater analytical and elevation data are summarized in Table 2. Well construction details are summarized in Table 3.

- In September and October 1989, James M. Montgomery Consulting Engineers, Inc. (JMM) observed the removal of four steel USTs and completed an initial site investigation consisting of the installation of three soil borings (A-1 through A-3) and two groundwater monitoring wells (MW-19 and MW-20). The soil borings and monitoring wells were completed to depths ranging from 57 to 71 feet below ground surface (bgs). Soil samples collected below the USTs contained a maximum total petroleum hydrocarbon as gasoline (TPHg) concentration of 7,900 milligrams per kilogram (mg/kg, 3B-17). Soil samples collected from the soil borings and monitoring wells contained a maximum concentration of 16,000 mg/kg TPHg (A-3-25'). Groundwater was encountered at approximately 57 feet bgs. Hydrocarbon impact was reportedly limited to the area in and around the former USTs (JMM, 1990). Historical figures showing the UST soil sample locations are included in Appendix B.

- In June 1990, JMM installed one nested soil vapor extraction (SVE)/groundwater monitoring well (D-1) and two SVE wells (D-2 and D-3). Soil samples contained TPHg concentrations ranging from below laboratory detection limits to 8,600 mg/kg (JMM, 1990). Groundwater samples contained TPHg concentrations ranging from 400 (MW-19) to 1,600 (D-1) micrograms per liter (µg/L), and benzene concentrations ranging from 10.2 µg/L (MW-20) to 800 µg/L (D-1).

- In March 1991, W.W. Irwin conducted a SVE test to evaluate SVE as a viable remedial alternative (W.W. Irwin, 1991). The radius of influence was determined to range from 76 to 100 feet. Vapor-phase TPHg concentrations ranged from 6,600 to 43,000 parts per million by volume (ppmv). Complete details and results of the SVE pilot test are presented in W.W. Irwin's *Report on Venting Test* dated March 27, 1991.

- In December 1992, JMM completed four additional soil borings (D-4 through D-7) to a depth of approximately 50 feet bgs (JMM, 1993). TPHg was not detected above the laboratory detection limits (<10 mg/kg). Detectable benzene concentrations ranged from 0.005 mg/kg (D-6-10') to 0.33 mg/kg (D-4-50').

- On April 5 and 6, 1994, Pacific Environmental Group, Inc. (PEG) installed one dual nested SVE well (VEW-1) and three triple-nested SVE wells (VEW-2 through VEW-4) to a depth of 60 feet bgs (PEG, 1995). Detectable TPHg concentrations ranged from 1.4 mg/kg (VEW-4-50') to 6,300 mg/kg (VEW-3-30'). Detectable benzene concentrations ranged from 0.006 mg/kg (VEW-1-30') to 60 mg/kg (VEW-2-25').

- Prior to January 30, 1998, PEG installed two off-Site groundwater monitoring wells (MW-A1 and MW-A2) adjacent to the Site. MW-A1 was completed in the southbound lane of Garfield Avenue. MW-A2 was completed in the eastbound lane of Firestone Boulevard. A technical report detailing the installation of these wells was not available.

- On December 1, 1999, SECOR completed two additional on-Site monitoring wells (MW-A3 and

MW-A4). Wells MW-A3 and MW-A4 were completed at the southeast and northwest corners of the Site, respectively, and screened from approximately 35 to 65 feet bgs. A detectable level of TPHg was identified in one soil sample at a concentration of 1.8 mg/kg (MW-A3-40'). Detectable benzene concentrations ranged from 0.0028 mg/kg (MW-A3-55') to 0.21 mg/kg (MW-A3-40). Methyl-tertiary-butyl ether (MTBE) concentrations were identified in one soil sample at a concentration of 0.037 mg/kg (MW-A3-40'; SECOR, 2000).

- On October 21 and 30, 2001, SECOR installed two additional off-Site monitoring wells MW-A5 and MW-A6, respectively. Monitoring well MW-A5 was installed in the eastbound lane of Firestone Boulevard, south of the Site. Monitoring well MW-A6 was installed in the sidewalk of the northbound lane of Garfield Avenue, east of the Site. Groundwater monitoring wells MW-A5 and MW-A6 were completed to a total depth of approximately 65 feet bgs. The well casings were constructed of four-inch diameter Schedule 40 PVC, and were screened (0.020-inch slot) from approximately 30 to 65 feet bgs (SECOR, 2001).

- On January 24 and 25, 2002, SECOR over-drilled and abandoned four SVE wells (VEW-1, VEW-3, VEW-4, and D-2), and one groundwater monitoring well (D-1). The wells were abandoned to accommodate scheduled demolition/renovation activities including removal and replacement of the USTs and re-location of the station building (SECOR, 2002a).

- From January through March, 2002, the Site was completely demolished and re-constructed. Demolition activities included removal of four 10,000-gallon, double-walled fiberglass USTs, all product dispensers, all associated subsurface product piping, dispenser island canopy, a clarifier associated with the former carwash, and demolition of the former station building. Renovation activities included installation of new USTs at the southern perimeter of the Site, new dispenser islands, new subsurface product and electrical piping, a new dispenser island canopy, new station building and carwash. A total of 27 soil samples were collected from beneath the USTs, clarifier, dispensers, and product lines and from the bottom of the new tankpit. Detectable concentrations of adsorbed-phase petroleum hydrocarbons were identified in 18 of the 27 submitted samples. The highest concentrations of adsorbed-phase hydrocarbons were detected in samples collected beneath the USTs (SECOR, 2002b). The maximum hydrocarbon concentrations were as follows: gasoline range organics (C4-C12; GRO) – 8,800 mg/kg (TK-4A-17); benzene – 16 mg/kg (TK-4A-17); MTBE – 8.1 mg/kg (TK-1B-17); and tertiary butanol (TBA) – 24 mg/kg (TK-4B-17). A total of approximately 2,115 tons of hydrocarbon-impacted soil was generated during the UST removal activities and transported to TPS Technologies, in Adelanto, California for disposal/recycling.

- On February 14, 2002, one 20,000-gallon, and one split 24,000-gallon (two 12,000-gallon chambers), Xerxes double-walled fiberglass USTs were installed in a new tankpit located at the southern end of the Site. New double-contained fiberglass product piping was installed from the USTs to four new dispenser islands, and under-dispenser containment sumps were installed below the new dispensers. A new clarifier was installed on-Site for use with the new on-Site car wash facility. Prior to installation of the new USTs, four baseline soil samples (NTK-1A-18', NTK-1B-18', NTK-2A-18', and NTK-2B-18') were collected from the bottom of the new tankpit excavation (SECOR, 2002b).

- In March 2002, SECOR supervised the trenching and installation of approximately 400 feet of subsurface remedial conveyance piping at the Site. The remedial piping was installed to implement possible future SVE activities at the Site. Subsurface piping was constructed using one inch (AS), two inch (SVE), and six inch diameter PVC lines and was extended to existing vapor extraction wells D-3 and VEW-2, and to 18-inch diameter well boxes installed in strategic locations to accommodate possible future remedial well installation at the Site.

- On April 16, 2002, SECOR advanced one soil boring within the former UST basin and converted it to a dual-nested groundwater monitoring/SVE well (MW-A7), to replace abandoned groundwater monitoring well D-1 (SECOR, 2002a). MW-A7 was constructed using two-inch (SVE) and four-inch (groundwater monitoring) diameter PVC casing screened (0.020-inch slot) from approximately ten to 30 feet bgs and 35 to 60 feet bgs, respectively. A total of 12 soil samples were collected and analyzed. Detectable concentrations of petroleum hydrocarbon constituents were identified in all 12 samples. Maximum petroleum hydrocarbon concentrations were identified as follows: GRO – 1,400 mg/kg (MW-A7-30); benzene – 1.5 mg/kg (MW-A7-25); MTBE – 7.7 mg/kg (MW-A7-20); and TBA – 16 mg/kg (MW-A7-20).

- In a letter dated February 28, 2003, entitled *Implementation of Final Draft Guidelines for the Investigation and Cleanup of MTBE and Other Oxygenates,* the LARWQCB assigned the Site a cleanup priority of B2 (issued to all sites greater than 1,000 feet and less than 3,000 feet from a receptor, with or without MTBE/oxygenates detection: Appendix A).

- SECOR submitted a Remedial Action Plan (RAP) dated June 25, 2003, in which SECOR proposed the installation of an air sparge (AS)/soil vapor extraction (SVE) system. In the RAP, SECOR proposed using existing SVE wells VEW-2 and D-3, monitoring well MW-A7, and installing five AS/SVE wells to implement the proposed AS/SVE remedial system.

- In a letter dated August 27, 2003, the LARWQCB approved the installation of the five proposed AS/SVE wells and installation of the proposed remedial AS/SVE system (Appendix A).

- From September 29 through October 4, 2003, SECOR installed five triple nested AS/SVE wells (AS/SVE-1 through AS/SVE-5). A total of 70 soil samples were collected and analyzed from soil borings AS/SVE-1 through AS/SVE-5. The maximum concentrations of adsorbed-phase hydrocarbons were identified as follows: GRO – 6,700 mg/kg (AS/SVE-2-45), benzene – 12 mg/kg (AS/SVE-2-45), and MTBE – 11 mg/kg (AS/SVE-2-30). AS wells were completed using 1-inch diameter Schedule 80 PVC with a 2-foot stainless steel air sparge point set to depths ranging from approximately 60 to 68 feet bgs. The nested SVE wells were completed using Schedule 40 PVC with 0.020 slotted screen intervals extending from approximately 7 to 27 and 35 to 55 feet bgs.

- Two soil samples were submitted from soil boring AS/SVE-2 (AS/SVE-2-58 and AS/SVE-2-65) for physical property data analysis to determine soil classification, particle size and distribution, and hydraulic conductivity (K). Sample AS/SVE-2-58 and AS/SVE-2-65 are silty sands representative of the aquifer material with vertical K values of 1.51×10^{-4} and 4.42×10^{-5} centimeters per second (cm/s), respectively. A value of 10^{-6} is the approximate K value for clay and is considered the standard for a competent confining layer. Laboratory physical property data were included in SECOR's Fourth Quarter 2003 Site Conceptual Model Update Report, dated January 15, 2004.

- On October 12, 2005 SECOR installed off-Site, dual-nested groundwater monitoring well MW-A8. A total of 18 soil samples were collected and analyzed. GRO and benzene were not identified above the laboratory reporting limit (RL) in any of the samples. MTBE was identified in the 65 foot sample at a concentration of 0.0067 mg/kg (MW-A8-65) and TBA was identified in the 90 foot sample at a concentration of 0.095 mg/kg (MW-A8-90). Well MW-A8 was completed using Schedule 40 PVC with 0.020 slotted screen intervals extending from approximately 43 to 63 and 74 to 93 feet bgs.

- Quarterly groundwater monitoring and sampling has been conducted at the Site since June 1993.

Record Fee Title Holder Information

Based on historical groundwater analytical data, the following adjacent properties may potentially be impacted by releases originating from ARCO Station No. 5110 (Property Grant Deed's were provided in the Second Quarter 2003 SCMU).

- ARCO Station #5110
  Property Address: 5731 East Firestone Boulevard, South Gate, California
  Assessor's Parcel Number: 6232-002-004
  Owner: Atlantic Richfield Company
  Mailing Address: 4 Centerpointe Drive, La Palma, California 90623
  Source: Atlantic Richfield files

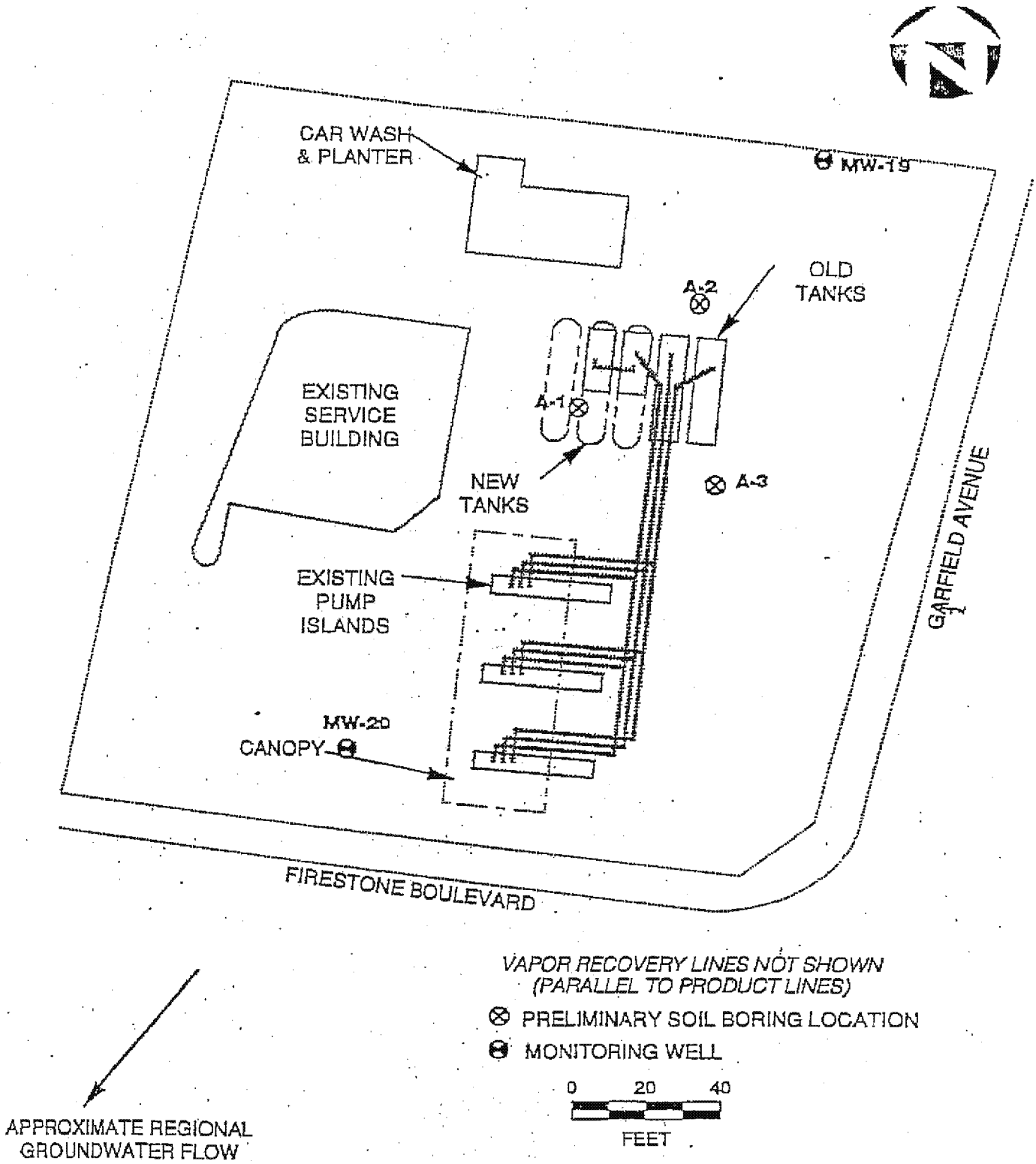
- McDonald's Restaurant
  Property Address: 5700 Firestone Boulevard, South Gate, California, located south of the Site, across Firestone Boulevard.
  Assessor's Parcel Number: 6232-009-003
  Owner: Nevada Investment Holdings, Inc.
  Mailing Address: 220 Congress Park Drive, Suite 230, Delray Beach, Florida 33445
  Source: Los Angeles County Recorder & Los Angeles County Assessor's Office

- Gonzales Chrysler-Plymouth Car Dealership
  Property Address: 5820 Firestone Boulevard, South Gate, California, located southeast of the Site, across Firestone Boulevard
  Assessor's Parcel Number: 6232-007-021 and 6232-007-022 (formerly known as 6232- 007-009 and 6232-007-010)
  Owner: Silvestre Gonzales
  Mailing Address: 9500 Rayo Avenue, South Gate, California 90280
  Source: Los Angeles County Recorder & Los Angeles County Assessor's Office

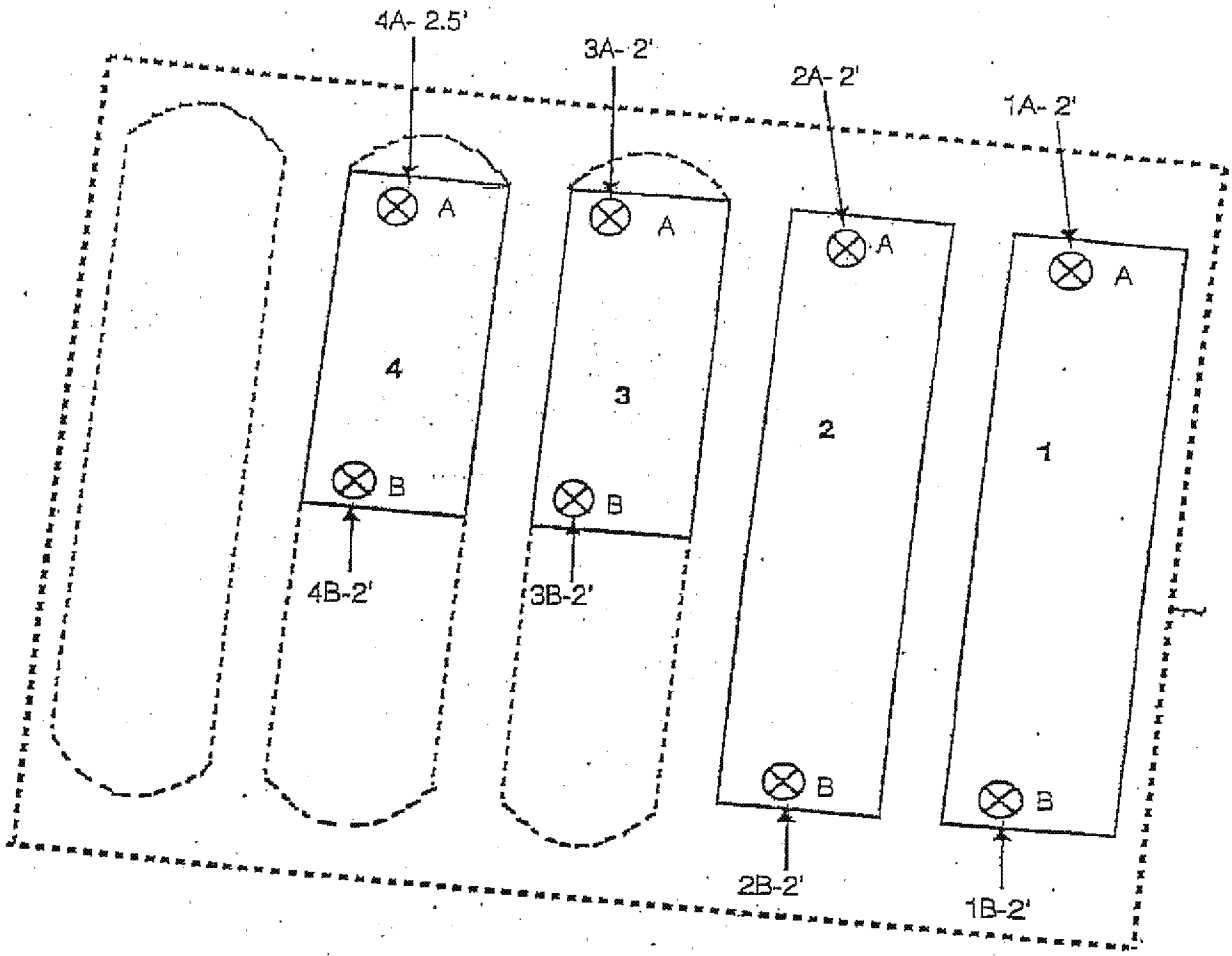
- Denny's Restaurant
  Property Address: 5811 Firestone Boulevard, South Gate, California, located east of the Site, across Garfield Avenue
  Assessor's Parcel Number: 6232-004-016
  Owner: Prime Cut Grill South Gate Inc.
  Mailing Address: 5811 Firestone Boulevard, South Gate, California
  Source: KnowX LLC (Real Estate Records Research Company).

APPENDIX C

HISTORIC FIGURES



ARCO AM/PM #5110
Site Map and Preliminary Sample Locaitons
Figure 2



0 5 10
FEET

SAMPLE A-3

1 TANK 1

APPROXIMATE LOCATION OF NEW TANK

APPROXIMATE EXTENT OF EXCAVATION

ARCO SERVICE STATION #5110
SAMPLE LOCATIONS BENEATH REMOVED TANKS
FIGURE 3

APPENDIX D

SITE GEOLOGY AND HYDROGEOLOGY

Site Geology

ARCO Station 5110 is located on the floodplain between the Los Angeles River and the Rio Hondo River. The Site is located within the Central Block physiographic province of the Los Angeles Basin (Yerkes, et al., 1965). The Central Block is a 55-mile long, wedge-shaped block oriented in a northwest-southeast direction in the middle portion of the Los Angeles Basin. It is bounded on the southwest by the northwest-trending Newport-Inglewood Uplift structural zone, on the northeast by the Whittier fault and the Elysian-Repetto-Coyote Hills sequence, on the southeast by the Santa Ana Mountains, and on the northwest by the Santa Monica Mountains (California Department of Water Resources, or CDWR, 1961).

The Site is underlain by approximately 20 feet of Holocene alluvial deposits consisting primarily of silt, clay, and discontinuous lenses of sand. These sediments represent river system deposits derived from the ancestral Los Angeles and Rio Hondo Rivers. The Upper Pleistocene Lakewood Formation extends from approximately 20 to 275 feet bgs. The upper part of the Lakewood Formation consists predominantly of fine-grained silt and clay while the lower portion of the Lakewood Formation contains greater percentages of sand with some gravel lenses. The Lower Pleistocene San Pedro Formation extends from a depth of approximately 275 to 1,200 feet bgs, and consists of marine and continental gravel, sand, sandy silt, silt and clay (PEG, 1998).

The maximum depth explored at ARCO Station No. 5110 is 94 feet bgs or the SHZ. Soil encountered during subsurface drilling investigations can be separated into five primary lithologic horizons: 1) interbedded sand, silty sand, silt, and thinly bedded clay from approximately near surface grade to 30 feet bgs; 2) sand from approximately 30 to 45 feet bgs; 3) thinly bedded clay, silt, and silty sand from approximately 45 to 55 feet bgs; 4) sand from approximately 55 to 65 feet bgs; and 5) silt and silty sand from approximately 65 to 70 feet bgs (maximum depth explored). A Site map with cross-sectional index lines is included as Figure 7. Generalized cross sections A-A' and B-B' depict the subsurface lithology and are included as Figures 8 and 9, respectively. Historical soil boring logs were provided in the Fourth Quarter 2003 SCMU.

Site Hydrogeology

Based on information obtained by SECOR during completion of assessment work at the Site and at the adjacent Vinvale Terminal, groundwater in the Site vicinity is encountered in four distinct water bearing zones (WBZ; SECOR, 2004). The encountered depth and vertical extent of these zones is approximately as follows:

- Shallow Hydrostratigraphic Zone (SHZ) - Typically encountered between 40 to 50 feet bgs and extends to 88 to 96 feet bgs. It is correlated to the more permeable zones of the Bellflower Aquiclude. Groundwater in this zone flows in a southeast to southwesterly direction at a shallow gradient that has averaged 0.002 ft/ft over the last three years. The SHZ is underlain by five to 15 feet of low-permeability silts and clays.

- Middle Hydrostratigraphic Zone (MHZ) - Typically encountered at 100 to 115 feet bgs and extends to 160 to 180 feet bgs. It is correlated to the regional Exposition Aquifer. Groundwater in this zone flows in a south to southwesterly direction at a shallow gradient that has averaged 0.001 ft/ft. The MHZ is underlain by 20 to 40 feet of low-permeability silts and clays.

- Unnamed Hydrostratigraphic Zone (UHZ) - The next successive water bearing zone was identified by the interpretation of geophysical logs and boring logs collected during the installation of well

clusters CW-1, CW-2, and CW-3 (Montgomery Watson, 1993). It is interpreted from 200 to 280 feet bgs and correlated to the regional Gage Aquifer. This WBZ is not currently monitored by any wells associated with the Vinvale Terminal and no soil or groundwater quality data is known for this depth interval. The Gage Aquifer is separated from the fourth hydrostratigraphic zone by at least 20 feet of probably cohesive, clay-rich sediments.

- Deep Hydrostratigraphic Zone (DHZ) - The upper portion of the fourth WBZ, identified as the DHZ, has been encountered between 300 and 320 feet in cluster wells CW-1, CW-2 and CW-3. Based on SECOR's reevaluation of the "Fire Well" 1923 drillers' log and the cluster well data, the DHZ appears to correlate to the regional Hollydale Aquifer, however, historic work suggests that the Hollydale may be discontinuous in this area (CDWR, 1961). Groundwater in this zone flows in a southeast to northeasterly direction at a shallow gradient that has averaged 0.003 ft/ft over the last three years.

Depth to groundwater in the on-Site wells has ranged from a low of 57.21 feet bgs in August 2003 (MW-19) to a high of 36.45 feet bgs in May 1999 (MW-A2). Groundwater levels across the Site rose steadily from June 1990 through approximately the end of 1999 (approximately 13 feet), and then began dropping and have continued to drop (approximately nine feet) through the Third Quarter 2004. Since the Third Quarter 2004, groundwater levels across the Site appear to have increased by approximately two feet over the last two and a half years.

APPENDIX E

MUNICIPAL WELL SURVEY

Public Well Information

SECOR researched the location of potential municipal/public supply wells using the following sources: 1) Geographic Environmental Information Management System (GEIMS) database via the Geotracker website (www.geotracker.swrcb.ca.gov); 2) Los Angeles Department of Water Resources (LADWR) Watermaster website (www.dpla.water.ca.gov/sd/groundwater/wells); 3) Los Angeles Department of Public Works (LADPW) website (www.ladpw.org); 4) Water Replenishment District of Southern California (WRD), 5) City of Southgate, 6) and Environmental Data Resources, Inc. (EDR) website (www.edrnet.com). A total of 18 wells were identified within a one-mile radius of the Site. A summary of the available well information is summarized in Table 4. A Site map showing wells identified within a one-mile radius is included as Figure 1.

- The closest identified wells that are known to be actively used for municipal supply are the City of South Gate Wells 02S/12W-31Q03 (SG-24) and 02S/12W-31Q02 (SG-25). These wells are located approximately 1,800 feet southwest of the Site in a clustered area east of the Los Angeles River and west of the Long Beach Freeway.

APPENDIX F

HYDROCARBON IMPACTED SOIL

This section briefly summarizes the extent of petroleum hydrocarbons in soil (including the capillary fringe) at the Site. The information was compiled through the analysis of soil samples collected during site assessment activities.

Hydrocarbon Distribution in Soil

Based on analytical data collected from UST removal and replacement operations and numerous assessment activities, the highest concentrations of adsorbed-phase hydrocarbons were identified beneath the former USTs, and at the eastern end of the former central dispenser island. Soil samples collected beneath the USTs in February 2002, contained GRO concentrations up to 8,800 mg/kg (TK-4A-17), benzene concentrations up to 16 mg/kg (TK-4A-17), and MTBE concentrations up to 8.1 mg/kg (TK-1B-17). Soil samples collected from borings installed within and peripheral to the former USTs indicated that elevated concentrations of TPHg and benzene, toluene, ethyl-benzene, and total xylenes (BTEX) extend from approximately ten feet bgs to 60 feet bgs in the area of the former USTs. Analytical data from recent soil borings installed within the area of the former USTs (MW-A7, AS/SVE-1 and AS/SVE-2) indicated that elevated concentrations of MTBE (11 mg/kg; AS/SVE-2-30) and TBA (16 mg/kg; MW-A7-20) were identified within the upper 20 feet of the soil column, with lower concentrations of MTBE and TBA extending to approximately 65 feet bgs. Analytical data indicates that the former USTs are the primary source area for adsorbed-phase hydrocarbon contamination at the Site. The lateral extent of the adsorbed-phase hydrocarbon plume in the vicinity of the former USTs appears to be defined to the west by VEW-1, to the north by D-6, to the east by D-4, and to the south by D-3. A site map showing hydrocarbon concentrations in soil is included as Figure 6. Historical soil analytical results are summarized in Table 1.

During Site demolition and renovation activities conducted in February 2002, soil samples collected beneath the eastern end of the central dispenser island indicated elevated concentrations of GRO (3,500 mg/kg; D-6-2) and total xylenes (360 mg/kg; D-6-2). Additionally, soil excavated from the eastern end of the new tankpit at the southern end of the Site was stained dark gray and contained hydrocarbon odors. Soil samples collected from shoring soil boring SB-5, installed along the northeast perimeter of the new tankpit, contained TPHg concentrations up to 1,200 mg/kg (SB-5-5). Soil samples collected from the base of the new tankpit contained MTBE concentrations of up to 0.59 mg/kg (NTK-1B-18). Recent soil borings AS/SVE-4 and AS/SVE-3 identified elevated concentrations of GRO (3,100 mg/kg; AS/SVE-4-15) and benzene (2.6 mg/kg; AS/SVE-4-30) within the upper 30 feet of the soil column. It appears that the former central dispenser island was an additional source area for adsorbed-phase hydrocarbon contamination. The lateral extent of the adsorbed-phase hydrocarbon plume in this area is predominantly defined to the east by MW-A3, and to the west by AS/SVE-5.

Low-level concentrations of adsorbed-phase hydrocarbons have been identified from 40 to 65 feet bgs, within the capillary fringe and saturated zones, in nearly all borings installed on-and off-Site. Fluctuating groundwater elevations (which have fluctuated as much as 17 feet in MW-19) have likely smeared and transported adsorbed-phase petroleum hydrocarbons across the Site within the capillary fringe.

APPENDIX G

HYDROCARBON IMPACTED GROUNDWATER

All groundwater samples were relinquished to Test America of Irvine, California for chemical analysis. SECOR and Test America adhered to strict chain-of-custody procedures from sample collection to sample analysis. All groundwater samples were analyzed for the following analytes and in accordance with the appropriate Environmental Protection Agency (EPA) method:

- Gasoline range organics C_4-C_{12} (GRO) by EPA Method 8015B; and
- BTEX, di-isopropyl ether (DIPE), ethyl-tertiary-butyl ether (ETBE), tertiary-amyl-methyl ether (TAME), TBA, MTBE, and ethanol by EPA Method 8260B.

QUARTERLY GROUNDWATER MONITORING AND SAMPLING

A groundwater gradient map and hydrocarbon concentration maps for GRO, benzene, MTBE, and TBA for this quarter are presented as Figures 11 through 14, respectively. Hydrographs for individual wells are presented in the graphs section. The laboratory analytical report with chain-of-custody documentation, groundwater sampling field data sheets, and waste disposal documents are included in Appendix N, O, and P, respectively. Historical groundwater analytical and elevation results are summarized in Table 2.

Dissolved-Phase Hydrocarbon Plume

The ARCO Vinvale Terminal is located approximately 500 feet north of ARCO Station No. 5110 (Figure 2). The Vinvale Terminal covers an area of approximately 35 acres and currently is used for the storage and on-loading of gasoline and diesel fuel products for ARCO retail outlets in the Los Angeles metropolitan area. The Vinvale Terminal maintains ten aboveground storage tanks (ASTs) for various grades of refined products and one slop oil AST. The total tank working capacity is approximately 34 million gallons. A multi-bay fuel loading rack is located in the southwestern portion of the Vinvale Terminal.

Based on the historical quarterly groundwater analytical results, it appears that dissolved-phase GRO and BTEX constituents are migrating southward from the ARCO Vinvale Terminal to ARCO Station No. 5110, resulting in commingling of the groundwater plume on the northern portion of the station property. This is evidenced by historically elevated concentrations of GRO and BTEX in monitoring wells MW-A4 and MW-19, which are located north and northeast (up-gradient) of the former and existing USTs and associated dispensers and product lines at the Site. The highest historical concentration of GRO (52,000 µg/L on March 21, 2000) was identified in MW-19. The highest historical concentration of benzene (13,000 µg/L on May 2, 2006) was identified in MW-A4. Well MW-19 has historically had non detectable to very low concentrations of fuel oxygenates, suggesting that the dissolved-phase plume at the northern portion of the Site represents a commingling of plumes with the Vinvale Terminal. Wells MW-A7, MW-A3, MW-A4, MW-A2, and MW-20 contain elevated concentrations of GRO, BTEX, and fuel oxygenates, and appear to indicate contamination associated with operation of the former USTs and dispensers at the Site, which distributed the fuel additive MTBE.

MTBE was first analyzed for and detected at the Site in July 1996. The highest concentrations of MTBE have historically been detected in former monitoring well D-1 (abandoned January 24, 2002), located immediately north of the former USTs. The highest historical MTBE concentration of 11,000 µg/L was detected in D-1 in December 1999. Currently the highest MTBE concentration was detected in MW-20 (4,800 µg/L) on May 3, 2005. The maximum TBA concentration was reported in well MW-20 on May 2,

2006, at a concentration of 11,000 µg/L. Elevated concentrations of fuel oxygenates, primarily MTBE and TBA, have historically been limited to the on-Site wells.

On February 13, 2007, SECOR conducted the First Quarter 2007 Groundwater Monitoring and Sampling event at the Site. A total of eleven groundwater monitoring wells (MW-19, MW-20, and MW-A1 through MW-8S/D) were gauged and sampled. Depth to groundwater in the on- and off-Site groundwater monitoring wells ranged from 49.40 to 51.90 feet bgs. The groundwater flow direction was to the south at a gradient of approximately 0.003 feet per foot. First Quarter 2007 data suggests that GRO and benzene concentrations have decreased in the northern portion (MW-19, MW-20, and MW-A4) of the Site. GRO and benzene concentrations in MW-19 decreased from 4,900 µg/L (Q4-2006) to 170 µg/L (Q1-2007) and from 3,000 µg/L (Q4-2006) to 21 µg/L (Q1-2007), respectively. GRO and benzene concentrations in MW-20 decreased from 6,100 µg/L (Q4-2006) to 810 µg/L (Q1-2007) and 2,300 µg/L (Q4-2006) to 68 µg/L (Q1-2007), respectively. GRO and benzene concentrations in MW-A4 decreased from 29,000 µg/L (Q4-2006) to 22,000 µg/L (Q1-2007) and 12,000 µg/L (Q4-2006) to 8,800 µg/L (Q1-2007), respectively. MTBE and TBA levels remained realitively stable, with exception of MW-20 which saw significant increases in TBA concentrations from 1,100 µg/L (Q4-2006) to 4,000 µg/L (Q1-2007). The southern portion of the plume (MW-A8S/A8D) had an increase in GRO, benzene, MTBE, and TBA with maximum concentrations of 430 µg/L, 120 µg/L, 120 µg/L, and 51 µg/L in MW-A8S, and 150 µg/L, 23 µg/L, 13 µg/L, and 24 J µg/L in MW-A8D, respectively.

APPENDIX H

PLUME TRAVEL TIME ESTIMATE

On July 15, 2006, SECOR submitted a revised Plume Travel Time report. A conservative estimate of the plume travel time was made using BIOSCREEN, a Microsoft Excel spreadsheet analytical model based on the Domenico analytical solute transport model. The nearest municipal well receptor was identified as well 02S/12W-31Q02, located approximately 1,800 feet southwest of the Site. The revised plume travel time estimate was based on the time for 3,400 μg/L of MTBE to reach the nearest receptor well (3,400 μg/L was the primary maximum contaminant level for MTBE).

Based on the model, SECOR determined the most likely scenario is a plume travel time of 103 years. The complete Plume Travel Time Report was completed in the Second Quarter 2006 SCMU.

APPENDIX I

HISTORIC SOURCE REMOVAL AND REMEDIATION ACTIVITIES

Enhanced Fluid Recovery

From July 1999 through January 2002, enhanced fluid recovery (EFR) was performed approximately monthly with a vacuum truck as an interim remedial action due to elevated concentrations of MTBE identified in D-1. EFR was also performed briefly at wells MW-20, MW-A5, and MW-A6. During the EFR activities, a total of approximately 17,391 gallons of hydrocarbon-impacted groundwater was removed from the Site. EFR activities were discontinued after D-1 was abandoned in January 2002. A summary of historical EFR events is presented in Table 5.

Source Removal and Excavation

The source of the discharge has been removed and replaced. On February 7, 2002, four 10,000-gallon, double-walled fiberglass USTs and their associated subsurface product piping and dispensers were removed from the Site. On February 14, 2002, one 20,000-gallon, and one split 24,000-gallon (two 12,000-gallon chambers), Xerxes double-walled fiberglass USTs were installed at the southern end of the Site. New double-contained fiberglass product piping was installed from the USTs to four new dispenser islands, and under-dispenser containment sumps were installed below the new dispensers. A new clarifier was installed on-Site for use with the new carwash facility.

Extensive excavation and trenching was performed at the Site during installation of the new USTs (new tankpit located at the southern perimeter of the Site), dispensers, subsurface product and electrical piping, and new canopy footings. Additionally, the footprint of the new station building, dispenser islands, and carwash were excavated a minimum of two feet and re-compacted with clean imported soil. During preparation of the former tankpit for backfilling, approximately 200 tons of soil and pea gravel was removed from the bottom of the tankpit. Soil excavated from the bottom of the former tankpit emitted volatile organic compounds (VOC) concentrations in excess of 1,000 ppmv as measured in the field with a hand held photo-ionization detector (PID).

A new tankpit was excavated at the southern end of the Site. Soil excavated at the northeastern corner of the new tankpit was visibly stained (grayish) and impacted with petroleum hydrocarbons, likely associated with the former dispensers. The new tankpit was excavated to a total depth of approximately 18 feet bgs. Soil encountered from 15 to 18 feet bgs was stained a greenish color, and emitted VOC concentrations above 50 ppmv. Due to the encountered hydrocarbon contamination, the majority of soil generated from the new tankpit excavation was hauled off Site for disposal. A total of approximately 1,500 tons of soil were excavated from the new tankpit, of which approximately 500 tons, primarily from the upper half of the western end of the tankpit, were re-used on-Site as backfill material for the former tankpit.

During the station renovation activities, a limited remedial over-excavation of hydrocarbon-impacted soil was performed at the eastern end of the former middle dispenser island. A five by five foot wide excavation was completed to a depth of five feet bgs to remove hydrocarbon-impacted soil identified in dispenser sample D-6-2'.

A total of approximately 2,115 tons of petroleum hydrocarbon-impacted soil was removed from the Site during the Site demolition and renovation activities and transported to TPS Technologies Soil Recycling (TPS) in Adelanto, California for disposal/recycling (SECOR, 2002).

AS/SVE Remedial System Operation Summary

During the First Quarter 2004, SECOR finalized installation of an AS/SVE remedial system at the Site. The system consists of a Paragon Systems ET-250 oxidizer connected to six dual-nested SVE wells (SVE-1 through SVE-5, and MW-A7). An Ingersoll-Rand rotary screw air compressor is connected to five AS wells (AS-1 through AS-5). SVE operational summary data is included in Tables 6 and 7.

The SVE system was started on April 7, 2004, and samples were collected from each individual well, and from the influent and effluent vapor stream to the thermal oxidizer. Undiluted vapor analytical results in the process stream at startup were identified as follows: GRO – 8,400 ppmv, benzene – 92 ppmv, and MTBE - <27 ppmv. Vapor analytical results from the SVE system process stream and from individual wells are summarized in Tables 8 and 9, respectively.

After sampling, the system was shut down. Effluent vapor samples were analyzed on 24-hour turnaround to ensure the system was destroying vapors to within the South Coast Air Quality Management District (SCAQMD) required benzene limit of 0.24 ppmv. Benzene was detected in the effluent stream at 0.19 ppmv, just below the SCAQMD limit.

The SVE system was restarted on April 13, 2004, the dilution valve was opened 100%, effluent samples were collected, and the system was shut down. Analytical results were <0.059 ppmv for benzene.

On April 16, 2004, the SVE system was started and left to continually operate. Samples were collected weekly for the first month to ensure the oxidizer was capable of destroying hydrocarbon vapors to within the SCAQMD benzene requirement.

From system start-up through September 23, 2004 vapors were extracted from the shallow zone intervals of AS/SVE-1, AS/SVE-2, AS/SVE-3, AS/SVE-4, AS/SVE-5, and MW-A7. All wells used for SVE are dual nested. On September 23, 2004, the shallow zone wells were closed and the deeper zone wells were opened due to decreasing hydrocarbon vapor concentrations to the thermal oxidizer.

During the First Quarter 2005, the AS wells were developed with a vacuum truck to remove accumulated sediment. Before commencing startup of the AS system, a one day step and steady rate AS test will be conducted to determine the required breakthrough pressures and an estimated radius of influence for AS.

In March 2005, the Paragon system was converted to catalytic mode due to steadily decreasing influent vapor concentrations.

On April 14, 2005, the SVE system was shut down due to expiration of the various locations SCAQMD PTO. A site-specific PTO application was submitted to the SCAQMD and SECOR received the site-specific PTO during the Third Quarter 2005.

On October 4, 2005 the Paragon SVE system was re-started in catalytic mode and continued operation into the beginning of the First Quarter, 2006. On January 17, 2006, SECOR initiated the startup of the system and performed confirmation sampling for system discharge monitoring. Zthe system was shut off this same day (Jan. 17, 2006) due to problems with the system optimization. The system remained off until May 9, 2006.

The system was shut down on June 12, 2006 for repair of the air sparge compressor. The system remained off until the installation of a catalytic unit on September 8, 2006.

Current Operational Status

On September 8, 2006, SECOR initiated the startup of the system and performed confirmation sampling for system discharge monitoring. The system operation was changed from Thermal to Catalytic and a new catalyst for the SVE system was also installed. The system pulled fresh air from September 8, 2006 to September 19, 2006 to insure the system was in compliance with SCAQMD regulations. On September 19, 2006 the SVE system was connected to the well heads to begin pulling vapors.

The SVE system could not meet the effluent limits given in the new AQMD permit and was shut down on November 21, 2006. The current system was converted to a carbon system during the First Quarter of 2007 with a minimum of two carbon vessels each containing 1,000 pounds of carbon. As of November 21, 2006, approximately 50,283 pounds of GRO has been destroyed by vapor extraction (Figure 16). Individual SVE well monitoring data collected in the field is summarized in Table 10. Air sparge well data is summarized in Table 11. Daily operational logs are included in Tables 12a, 12b and 12c.

Vapor samples collected on November 8, 2006 identified GRO, benzene and MTBE concentrations of 1,500 ppmv, less than 1.2 ppmv, and less than 2.8 ppmv, respectively, in the un-diluted process stream. The system should be started up in the Second Quarter 2007 following a carbon change.

Proposed Supplemental Remediation

SECOR is proposing to supplement the remedial efforts at the Site by utilizing oxygen diffusion technology in selected wells off-site and on-site. Off-site wells MW-A2 and MW-A5 were selected as suitable for the installation of slow oxygen releasing compounds ORC™. This process requires minimal maintenance and suited for the wells that are located on the street, where access to the wells would require traffic control. The proposed oxygen releasing material ORC releases oxygen up to a year and stimulates the growth of naturally occurring microbes to rapidly degrade a wide range of aerobically degradable contaminants including the gasoline range organics and the oxygenates found at the Site.

On-site wells MW-20, MW-A4, MW-A3 and possibly MW-19 are suited for the installation of Oxygen diffusers. The Oxygen diffusion technology currently being used is iSOC™ which utilizes specially designed passive membrane oxygen diffusers installed in the wells slightly above the bottom of the wells in the phreatic zone. SECOR's experience with oxygen diffusion used on similar sites show significant reduction in both GRO and MTBE concentrations in the vicinity of the wells. SECOR anticipates the installation of these supplemental remedial technologies in the next quarter based upon RWQCB approval of the methodology. Based on the results of the initial phase, the technology can be expanded to other wells.

APPENDIX J

CONCLUSIONS

Proposed Additional Groundwater Monitoring Well Installation

In 2005-Q3 SCMU SECOR proposed to install MW-A8 and possibly MW-A9, to further delineate the down-gradient extent of dissolved-phase hydrocarbons, based on increased concentrations identified in down-gradient wells MW-A2 and MW-A5. On October 12, 2005, SECOR installed off-Site dual nested MW-A8 to further delineate the down-gradient extent of the dissolved-phase hydrocarbons. On January 31, 2006 MW-A8s and MW-A8d were sampled and the analytical was included in the First Quarter 2006 report. SECOR has yet to determine the necessity of an additional groundwater monitoring well (MW-A9).

DATA GAPS

No significant data gaps currently exist with regard to the Site. SECOR will update the Municipal Well Survey during the Second Quarter 2007.

APPENDIX K

STANDARD LIMITATIONS

All work was performed under the supervision of a registered geologist as defined in the Registered Geologist Act of the California Code of Regulations. The information contained in this report represents our professional opinions, and is based in part on information supplied by the client. These opinions are based on currently available information and are arrived at in accordance with currently accepted hydrogeologic and engineering practices at this time and location. Other than this, no warranty is implied or intended.

APPENDIX L

REFERENCES

California Department of Water Resources (CDWR), 1961. Planned Utilization of the Ground Water Basins of the Coastal Plain of Los Angeles County: Appendix A – Groundwater Geology. CDWR Bulletin 104, 181 p.

James M. Montgomery Consulting Engineers, Inc. (JMM), 1990. *Preliminary Site Assessment and Environmental Oversight of Tank Removals*, ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, March.

James M. Montgomery Consulting Engineers, Inc. (JMM), 1990. *Installation of Vapor Extraction Wells and Groundwater Monitoring Well*, ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, December.

James M. Montgomery Consulting Engineers, Inc. (JMM), 1993. *Site Assessment Report – Vadose Zone Soils*, ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, February 10.

Pacific Environmental Group, Inc., 1995. *Off-Site Hydropunch™ Groundwater Assessment*, ARCO Vinvale Terminal. August 28.

Pacific Environmental Group, Inc. (PEG), 1998. *Hydrogeological Characterization and SPH Recovery Enhancement Report*, ARCO Vinvale Terminal, 8601 South Garfield Avenue, South Gate, California, October 2.

SECOR International Inc. (SECOR), 2000, *Well Installation Report,* ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, January 25.

SECOR International Inc. (SECOR), 2001, *Additional Monitoring Well Installation Report,* ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, December 4.

SECOR International Inc. (SECOR), 2002a, *Well Abandonment and Re-Installation Report,* ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, July 2.

SECOR International Inc. (SECOR), 2002b, *Site Demolition and Renovation Report,* ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, July 9.

SECOR International Inc. (SECOR), 2003, *Remedial Action Plan*, ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, June 25.

SECOR International Inc. (SECOR), 2004, *Sentinel Well Installation Report*, Atlantic Richfield Vinvale

Terminal, 8601 South Garfield Avenue, South Gate, California, May.

SECOR International Inc. (SECOR), 2005, *Site Conceptual Model Update,* ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, April 15.

SECOR International Inc. (SECOR), 2006, *Updated MTBE Plume Travel Time Estimate,* ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, July 15.

United States Geological Survey (USGS), 1964, South Gate Quadrangle, 7.5 minute topographic, photo revised 1981.

W.W. Irwin, Inc. (1991), *Soil Vent Test*, ARCO Station No. 5110, 5731 East Firestone Blvd, South Gate, California, March 27.

Yerkes, R.F., McCulloh, T.H., Schoellhamer, J.E. and J.G. Vedder, 1965. Geology of the Los Angeles Basin, California – An Introduction. USGS Professional Paper 420-A. United States Government Printing Office, Washington, D.C., pp. A1-A57.

APPENDIX M

AGENCY CORRESPONDENCE

California Regional Water Quality Control Board

Los Angeles Region

Over 50 Years Serving Coastal Los Angeles and Ventura Counties

Recipient of the 2001 *Environmental Leadership Award* from Keep California Beautiful

Winston H. Hickox
Secretary for Environmental Protection

Gray Davis
Governor

320 W. 4th Street, Suite 200, Los Angeles, California 90013
Phone (213) 576-6600 FAX (213) 576-6640 - Internet Address: http://www.swrcb.ca.gov/rwqcb4

February 28, 2003

Mr. Ralph Moran
ARCO Products Company
P.O. Box 5077
Buena Park, CA 90622

IMPLEMENTATION OF FINAL DRAFT GUIDELINES FOR INVESTIGATION AND CLEANUP OF MTBE AND OTHER OXYGENATES: 1. DEVELOPMENT OF PRELIMINARY SITE CONCEPTUAL MODEL; 2. INTERIM REMEDIAL ACTION REPORT; 3. SITE CHARACTERIZATION REPORT; 4. FINAL REMEDIAL ACTION PLAN; AND 5. PERIODIC PROGRESS, UPDATE, AND MONITORING REPORTS.
ARCO #5110
5731 FIRESTONE BOULEVARD, SOUTH GATE (FILE NO. I-12074) (Priority B2)

Dear Mr. Moran:

BACKGROUND

Methyl tertiary butyl ether (MTBE) has been used as an octane booster in the United States since the late 1970's and added to gasoline to comply with Clean Air Act mandates since 1979. The use of MTBE increased dramatically in the early 1990's as a result of Clean Air Act Amendment requirements for reformulated gasoline. Although MTBE in gasoline helps lessen air pollution, it has become a significant contaminant in groundwater. Relative to other fuel hydrocarbons, MTBE has a high solubility in water, a low retardation rate in groundwater aquifers, and is slow to biodegrade. These properties, combined with its high percentage in gasoline (11% to 15%), cause the potential for high source area concentrations, long plumes in groundwater, and long residence times in the subsurface environment. MTBE also has taste and odor characteristics that can impair water quality at very low concentrations. There have been impacts on drinking water wells at dozens of sites throughout California. Most notably, in the greater Los Angeles area, within the Charnock Sub-Basin, a primary local source of drinking water for the City of Santa Monica and the Southern California Water Company.

Governor Davis issued Executive Order D-5-99 on March 25, 1999, and signed Senate Bill 989 on October 8, 1999. These documents recognize that if not managed properly, MTBE can cause significant adverse impacts to current and future beneficial uses of ground and surface waters. As a result, Final Draft Guidelines for Investigation and Cleanup of MTBE and Other Oxygenates (Final Draft Guidelines) have been developed by the State Water Resources Control Board, Division of Clean Water Programs-Underground Storage Tank Program. The Final Draft Guidelines (copy attached) are intended to assist managers and staff at state and local regulatory agencies with the task of overseeing the investigation and cleanup of sites where there have been or may have been releases of MTBE-laden petroleum fuels or other oxygenates [i.e., tertiary butyl alcohol (TBA), ethyl tertiary butyl ether (ETBE), di-isopropyl ether (DIPE), tertiary amyl methyl ether (TAME), methanol (MeOH), and ethanol (EtOH)]. The Final Draft Guidelines provide definitions for areas that are most vulnerable to groundwater

contamination, provide a priority ranking scheme for oxygenate release sites, outline a decision making framework for determining appropriate actions, and propose a timeframe for completing site management milestones.

The Final Draft Guidelines provide a framework for prioritizing resources to work on sites with MTBE or other fuel oxygenate contamination. A complete description of the seven-step process is contained within the Final Draft Guidelines (Pages 6 through 11). The Los Angeles Regional Water Quality Control Board (LARWQCB) is conservatively interpreting the Final Draft Guidelines, which will result in certain Underground Storage Tank (UST) leak cases being included within higher priorities for investigation and cleanup. During March 2001, the LARWQCB issued directive letters to all sites identified with investigation and cleanup priority of A1 [i.e., all sites less than 1,000 feet to a receptor, sites less than 3,000 feet to a receptor that have failed to provide required test results for MTBE and other fuel oxygenates, selected free product sites, and sites in close proximity to sensitive receptors (e.g., schools)]. In January 2002, the LARWQCB issued directive letters to all sites identified with investigation and cleanup priority of B1 [i.e., all sites greater than 1,000 feet and less than 3,000 feet from a receptor, selected free product sites, sites in close proximity to sensitive receptors, and/or sites containing high concentrations of oxygenates]. Now, we have reviewed the information contained in the case file for this site and have assigned an initial investigation and cleanup priority of B2 to this site [i.e., all sites greater than 1,000 feet and less than 3,000 feet from a receptor, with or without MTBE/oxygenates detection].

IMPLEMENTATION OF FINAL DRAFT GUIDELINES

Step 1: Initial Investigation/Scoping

In accordance with Step 1 (Initial Investigation/Scoping), we have reviewed the information contained in the UST case file for the site, including the most recent technical report entitled "Atlantic Richfield Company Quarterly Report" dated Quarter 4, 2002, prepared by SECOR. Based upon our review and evaluation, we find that groundwater beneath the subject site is impacted by petroleum hydrocarbons and/or the gasoline additive MTBE released from UST systems. The site is located within an area determined to be vulnerable to groundwater contamination, as defined in the Final Draft Guidelines. The site overlies an aquifer used as a community water supply and the distance to the closest municipal or domestic supply well (No. 02S12W31Q02S) is approximately 1,825 feet from the site. Based upon this information we have assigned an Initial Investigation Priority Class B2 to the site. You have been identified as the responsible party for the site and, as such, are directed to perform the following corrective action steps:

1. Develop a Preliminary Site Conceptual Model;
2. Develop a technical report detailing the results of all soil and groundwater assessment completed and submit a workplan to complete any remaining soil and/or groundwater investigations necessary to fully define the lateral and vertical extent of any free product or dissolved petroleum hydrocarbon plume(s), to include MTBE or other fuel oxygenate contamination onsite and offsite;

3. Develop a technical report detailing the results of any corrective actions completed and submit a workplan to perform any interim cleanup necessary to contain or control the spread or migration of any residual contamination;
4. Complete an evaluation to estimate plume travel time;
5. Determine a final cleanup remedy;
6. Perform quarterly groundwater monitoring and provide updates to the Site Conceptual Model; and
7. Perform a verification-monitoring program.

All steps are to be developed and performed on an expedited schedule to reduce any adverse impacts to water quality resulting from UST system leaks that have resulted at the site.

Step 2: Develop Preliminary Site Conceptual Model/Assign Investigation Priority Classification

Develop a Preliminary Site Conceptual Model (PSCM) Report consistent with the Final Draft Guidelines-Appendix C (Page 15). As stated above, we have already assigned an Initial Investigation Priority Class B to the site. Under this Initial Investigation Priority and for the purpose of developing the PSCM, the travel time to the nearest production well/receptor is conservatively estimated to be greater than one year and less than 3 years. The technical report (Preliminary Site Conceptual Model) containing the results of this evaluation shall be submitted to this Regional Board by **July 15, 2003.**

The PSCM must incorporate, at a minimum; all the components listed under Appendix C of the "Final Draft Guidelines for Investigation and Cleanup of MTBE and Other Oxygenates" dated March 27, 2000. The PSCM should provide a detailed written and graphical representation of the release scenario, site characteristics (geology, hydrogeology, isoconcentration contour maps for TPH, benzene and MTBE etc.) and the likely distribution of chemicals at the site. It should also identify all pathways for impact to potential receptors from potential sources through transport of chemicals in air, soil and water. The information contained within the PSCM for site assessment activities is critical in making determinations on the extent of assessment completed and whether any additional hydrogeologic assessment work is necessary at the site.

If the Site Characterization Report indicates that additional soil borings or groundwater monitoring wells are needed to fully define the extent of soil and/or groundwater contamination, then a workplan to complete any remaining assessment must be incorporated into your revised PSCM. The same type of evaluation is required for any cleanup action taken to date or needed to implement a final cleanup plan at the site. Technical reports previously submitted to the Regional Board detailing the results of any soil and/or groundwater assessment, periodic monitoring, or cleanup do not have to be resubmitted. However, you need to repackage the information, so that the PSCM is a complete stand-alone document. Periodic updates to the PSCM are required on a quarterly basis as required in Step 5 below and as defined in Step 5 of the Final Draft Guidelines.

Step 3: Interim Remedial Action

Develop an Interim Remedial Action (IRA) Report detailing the results of any cleanup actions completed to date. At a minimum, the site IRA should:

1. Provide documentation that all existing UST systems operating do not have any ongoing releases. Use the Final Draft Guidelines, Appendix D (Finding Leaks in Tank Systems) as a guide for completing this evaluation;
2. Provide realistic estimates of the total volume(s) of fuels released;
3. Identify all method(s) used for cleanup of petroleum hydrocarbon fuel contamination (i.e., excavation, free product removal, vapor extraction, pump and treat, etc.). Identify any active cleanup systems in place, operational or not, together with complete details on system design, operation status, and cleanup effectiveness;
4. Provide the total mass in pounds for total petroleum hydrocarbon gasoline fuels (TPH_G), total petroleum hydrocarbon diesel fuels (TPH_D), benzene, toluene, ethylbenzene, and xylenes (BTEX), MTBE, and other fuel oxygenates removed from the subsurface from all cleanup operations employed to date; and
5. Identify the IRA that should be implemented to further reduce the residual mass of petroleum hydrocarbon fuels, BTEX compounds, MTBE, and other oxygenates in soil, groundwater and/or vapor phase beneath the site. The IRA should be compatible with and developed into a final remedial action plan for the site.

The technical report (Interim Remedial Action) containing the results of the IRA evaluation together with a detailed workplan to conduct any interim remedial action measures necessary to control or contain the spread of residual contamination shall be submitted to this Regional Board by **July 15, 2003**.

Step 4: Site Characterization/Determine Plume Travel Time

Develop a comprehensive Site Characterization (SC) Report detailing the results of all soil and groundwater assessments completed at the site. At a minimum, the report should include:

1. Site maps depicting the locations of all soil samples, soil test borings, groundwater monitoring wells, vapor extraction, or air sparging wells;
2. A detailed location map of the area surrounding the site to include streets, property locations and land uses (i.e., residential, commercial or industrial with site name, etc.) 250 feet upgradient, 250 feet lateral to the direction of groundwater flow, and a minimum of 500 feet downgradient of any identified contamination plume(s);
3. Soil boring logs and well drilling logs from prior work;
4. Develop scaled lithologic cross sections for the site based upon the existing soil and groundwater data/information. A minimum of three cross sections shall be developed from soil sampling programs and from the installation of groundwater monitoring wells and/or vapor wells. Cross sections shall provide the lithologic column with Unified Soil Classification System abbreviations and symbols;
5. Scaled groundwater contour maps depicting the direction of groundwater flow and gradient across the subject site. If the groundwater flow direction fluctuates over time, then historical groundwater contour maps reflecting these changes shall be provided;
6. Groundwater contaminant plume maps for TPH_G, TPH_D, BTEX, MTBE, and for all fuel oxygenates detected shall be illustrated in plan view and contain constituent concentrations;
7. A tabular summary showing: monitoring well identification number, monitoring well screened and blank intervals, completion depths, survey elevations, survey reference point, slot size(s), annular seal interval, water elevation ranges, and free product thickness, if any; and

8. A tabular data summary showing all historical soil and groundwater chemical and physical data to date.

The technical report (Site Characterization Report) detailing the results of all soil and groundwater assessments completed together with a workplan to conduct any supplemental hydrogeologic assessment needed to fully define the extent of any remaining free product and/or dissolved petroleum hydrocarbons, including oxygenates, to non-detect levels, shall be submitted to this Regional Board by **July 15, 2003.**

Determine Plume Travel Time

Acceptable methods that can be used to estimate plume travel time to reach a receptor should include the application of mainstream or industry-recognized fate and transport analytical models (e.g., Domenico Analytical Solution, 1987; Finite-Mass Advection/Dispersion Analytical Model by Fried, 1975; Freeze and Cherry 1975; and Bear 1972). Alternatively, advection/dispersion analytical models in Excel format developed by Regional Board staff may also be used (applicable to cases with a one-time release or continuous source release) and are available on our website (http://www.swrcb.ca.gov/rwqcb4 under LARWQCB Programs – UST - Models). Extensive or detailed modeling effort is not required nor is that the objective of this phase of the investigation. However, the analytical model used should be calibrated with available site-specific data, using conservative assumptions for mass released, source area, source concentration, groundwater velocity, groundwater direction (constant), dispersivities, decay rate, etc. Available site-specific data on geology or hydrogeology may be quite useful in this regard. For example, groundwater site characterization evaluation, type of soil and aquifer materials, and uninterrupted vertical profile of site stratigraphy may be used together to make conservative estimates of groundwater velocity. A technical report (as an integral part of the Site Conceptual Model Report) on this phase of the investigation shall, at a minimum include:

1. Detailed documentation of the analytical model used, including its limitations, conditions, and assumptions;
2. Detailed descriptions and layouts of the process used to arrive at the model conclusions and justification for the model assumptions applied, including literature sources;
3. Detailed and extensive discussions on model conclusions;
4. Recommendations on any additional site work that can reduce model uncertainties and further refine the Site Conceptual Model;
5. Any site- or region-specific data applied during the modeling process, including hydrogeologic data and historical soil and groundwater analytical data to date (if applicable); and
6. Any information on atypical site-specific conditions that may cause solutions to the analytical model to be unrealistic or less-conservative, such as:

    a. Whether the site is near an area with aggressive pumping (characteristic of municipal or drinking water wells) which can alter the natural flow of water and thus affect the direction of groundwater flow and velocity;
    b. The presence of heterogeneous aquifer materials that may cause contaminants to travel at greater velocities than the flow pathway applied for the analytical model (e.g. the existence of fractured rock and limestone caverns);

c. The existence of conduits and geologic faults, and
d. Multiple or continuous releases; and releases from different locations, that can create multiple sources or cause increases in contaminant source concentrations.

The technical report containing an evaluation to estimate Plume Travel Time, in accordance with the guidance provided above, shall be submitted to this Regional Board by **October 15, 2003.**

Step 5: Update Site Conceptual Model/Assign Cleanup Priority Classification

Update Site Conceptual Model

This step provides for the update to the PSCM on a periodic basis, to incorporate any new and/or updated information or data (i.e., results of any additional assessment and/or any remedial activities completed during the reporting period, a complete discussion of current site conditions, a complete discussion and trend analysis on analytical groundwater data, and provide a technical Workplan for additional assessment and/or cleanup as determined by a review and evaluation of historical and current data, etc.). Quarterly technical reports shall be submitted to update the PSCM developed as part of Step 2. The SCM validation process shall be initiated starting with the quarter after the PSCM is established. The first update to the PSCM is due to this Regional Board by **October 15, 2003,** for the July through September 2003 quarter. The Site Conceptual Model Update is a stand-alone document that provides a complete update to the PSCM. The Site Conceptual Model Update must contain all the components that are currently required in the Quarterly Groundwater Monitoring Reports, therefore, a separate Quarterly Groundwater Monitoring Report is not required.

Step 6: Corrective Action/Remediation

The need for performing active cleanup may vary based upon many factors (e.g., release history, mass released into the environment, hot spot areas, site specific and regional geology, and interim cleanup actions implemented, etc.). As stated above in Step 3, a technical report containing the results of the IRA evaluation together with a workplan to conduct any interim remedial action necessary to control or contain the spread of residual contamination at the subject site shall be submitted to this Regional Board by **July 15, 2003**. In order to reduce any ongoing threat to water quality and potential impacts to nearby sensitive receptors from UST releases, a technical report containing a Final RAP, together with a time schedule for implementation shall be developed and submitted to this Regional Board by **January 15, 2004**.

Step 7: Verification Monitoring

Verification monitoring is an integral part of performing interim and final cleanup remedies at UST release sites. These monitoring programs will be necessary in order to determine whether any interim and/or final RAP implemented has achieved its intended purpose and will be required for all sites to determine the effectiveness of remedial actions implemented. The nature and scope of the verification-monitoring program shall be determined subsequent to

completing full implementation of the RAP and shall be approved by this Regional Board prior to implementation.

LANDOWNER OR IMPACTED SITE NOTIFICATION REQUIREMENTS

Additionally, pursuant to recent changes of the California Health and Safety Code (section 25299.37.2) and Division 7 of the Porter Cologne Water Quality Control Act under Assembly Bill 681, this Regional Board is required to notify all current fee title holders of record for the site or sites impacted by releases from underground storage tanks prior to considering corrective action and cleanup or case closure.

If site assessment and/or monitoring data provided for corrective action work ongoing at the site indicate that release(s) from the underground storage tank systems have impacted offsite property(ies), then please provide the name, mailing address, and phone number for all record fee title holders for the site and any offsite property(ies) impacted by releases from the subject site, together with a copy of the county record of current ownership (grant deed or deed of trust), available from the County Recorder's Office, for each property affected, or by completing this Regional Board's "Certification Declaration for Compliance with Fee Title Holder Notification Requirements," (copy attached) for each site. **If this information has been provided in the past, then you need not provide it again.** Copies of all technical reports required above together with any periodic updates are to be sent directly to the property owner of the site and to any other property owner(s) impacted by UST releases from the site. The cover letter transmitting your technical reports to this Regional Board shall state that the technical reports were sent directly to all property owner(s) of the site as well as any offsite property owner impacted by the UST release(s). The cover letter shall provide a list of all property owners sent technical reports and the date the technical reports were sent.

NEW REGULATORY REQUIREMENT FOR ELECTRONIC SUBMISSION OF LABORATORY DATA TO THE STATE GEOTRACKER INTERNET DATABASE

On June 28, 2001, the State Water Resources Control Board-Underground Storage Tank Program manager, Mrs. Liz Haven, sent you a letter informing you of the new requirements for submission of electronic laboratory data for Underground Storage Tank Program reports. These requirements are contained in emergency regulations (CCR Title 23, Chapter 16, Article 12, Sections 2729 and 2729.1) recently adopted by the State Water Resources Control Board (Board), and became effective September 1, 2001. The Board adopted these regulations to implement Assembly Bill 2886 (Chapter 727, Statutes of 2000, "AB 2886"). The regulations and other background information are available on the Internet by going to http://geotracker.swrcb.ca.gov and clicking on "AB 2886". The emergency regulations (Water Code Sections 13195-13198) require persons to ensure electronic submission of laboratory data (i.e. soil or water chemical analysis) and locational data (i.e. location and elevation of groundwater monitoring wells), via the Internet to the SWRCB's GeoTracker database.

In accordance with the above regulations, you are required to submit all future laboratory data over the Internet in the Electronic Deliverable Format to the SWRCB's GeoTracker database for any soil and/or groundwater samples obtained after September 1, 2001. This would include any

sampling completed for underground storage tank system removal, site assessment activities, periodic groundwater monitoring, and post cleanup verification sampling. In accordance with the above regulations, you are also required to submit locational data for all groundwater monitoring wells (i.e., latitude, longitude, and elevation survey data) together with groundwater information (i.e., elevation, depth to free product, monitoring well status, etc.) and a site map commencing January 1, 2002. Hard copy paper reports are still required.

REPORTING REQUIREMENTS

The Final Draft Guidelines, Appendix B (Technical References) contains a partial listing of documents related to site investigation and remediation that can be used for development of workplans required by this Regional Board. The technical reports shall be submitted to this Regional Board according to the schedule contained in Table 1-Technical Report Type and Due Dates listed below. The technical reports for items: 1-[Preliminary Site Conceptual Model (PSCM) Report]; 2-[Interim Remedial Action (IRA) Report and Workplan]; and 3-[Site Characterization (SC) Report and Workplan] identified in Table 1 below must be submitted as a single stand alone technical report. **Pursuant to section 13267(b) of the California Water Code, failure to submit the required technical report acceptable to the Executive Officer, by the due dates specified, may result in the imposition of civil liability penalties by this Regional Board of up to $1,000.00 per day for each day each technical report is not received pursuant to section 13268 of the California Water Code. This Regional Board can assess these civil liability penalties at any time after the due dates specified below and without further warning.**

Table 1-Technical Report Type and Due Dates

Technical Report Type [1,2,3,4]	Due Dates
1. Preliminary Site Conceptual Model (PSCM) Report (Step 2-Final Draft Guidelines)	July 15, 2003
2. Interim Remedial Action (IRA) Report and Workplan (Step 3-Final Draft Guidelines)	July 15, 2003
3. Site Characterization (SC) Report and Workplan (Step 4-Final Draft Guidelines)	July 15, 2003
4. Estimate of Plume Travel Time (Step 4-Final Draft Guidelines)	October 15, 2003 (Yearly thereafter by October 15)
5. Update Site Conceptual Model (SCM) Reports (Step 5-Final Draft Guidelines)	October 15, 2003 (Quarterly thereafter by the following dates: January 15, April 15, July 15, and October 15)
6. Final Remedial Action Plan (RAP) (Step 6-Final Draft Guidelines)	January 15, 2004
7. Quarterly Monitoring and Progress Reports[5]	October 15, 2003 (Quarterly thereafter by the following dates: January 15, April 15, July 15, and October 15)

[1]-At a minimum, all workplans and final reports shall conform to the Guidelines for Report Submittals published by the Los Angeles County Department of Public Works and the California Underground Storage Tank Regulations.
[2]-All workplans are to contain an appropriate Health and Safety Plan commensurate with the level of work to be completed.

[3]-All analytical testing and sampling shall conform to the Leaking Underground Storage Tanks Program-Update Laboratory Testing Requirements, dated June 22, 2000.
[4]-All technical reports shall be prepared by or under the direction of a registered geologist, certified engineering geologist, or registered civil engineer with appropriate experience.
[5]-Quarterly Groundwater Monitoring and Progress Reports are to be included as part of the Site Conceptual Model Updates.

If you have any questions or need additional information, please call Ms. Heesu Park at (213) 576-6705, or Mr. Gregg Kwey at (213) 576-6702.

Sincerely,

Original Signed by

Dennis A. Dickerson
Executive Officer

Enclosures:

1. Final Draft Guidelines for Investigation and Cleanup of MTBE and Other Oxygenates (March 27, 2000)
2. Guidelines for Report Submittals published by the Los Angeles County Department of Public Works (June 1993)
3. Leaking Underground Storage Tanks Program-Update Laboratory Testing Requirements (June 22, 2000)
4. Leaking Underground Storage Tank Program Certification Declaration for Compliance with Fee Title Holder Notification Requirements

Cc: Robert Sams, Office of Chief Counsel, State Water Resources Control Board
Michael Lauffer, Office of Chief Counsel, State Water Resources Control Board
Hari Patel, State Water Resources Control Board, UST Cleanup Fund
Tim Smith, Los Angeles County DPW, Environmental Programs Division
Bruce Mowry, Water Replenishment District of Southern California
Gareth Roberts, SECOR

California Regional Water Quality Control Board

Los Angeles Region

Over 50 Years Serving Coastal Los Angeles and Ventura Counties
Recipient of the 2001 *Environmental Leadership Award* from Keep California Beautiful

320 W. 4th Street, Suite 200, Los Angeles, California 90013
Phone (213) 576-6600 FAX (213) 576-6640 - Internet Address: http://www.swrcb.ca.gov/rwqcb4

Winston H. Hickox
Secretary for Environmental Protection

Gray Davis
Governor

August 27, 2003

Mr. Ralph Moran
Atlantic Richfield Company
4 Centerpointe Drive
La Palma, CA 90623

IMPLEMENTATION OF FINAL DRAFT GUIDELINES FOR INVESTIGATION AND CLEANUP OF MTBE AND OTHER OXYGENATES: 1. DEVELOPMENT OF PRELIMINARY SITE CONCEPTUAL MODEL; 2. INTERIM REMEDIAL ACTION REPORT; 3. SITE CHARACTERIZATION REPORT; 4. FINAL REMEDIAL ACTION PLAN; AND 5. PERIODIC PROGRESS, UPDATE, AND MONITORING REPORTS.
ARCO #5110
5731 FIRESTONE BOULEVARD, SOUTH GATE (FILE NO. I-12074) (Priority B2)

Dear Mr. Moran:

We have reviewed your " Remedial Action Plan," dated June 25, 2003, and "Preliminary Site Conceptual Model", dated July 15, 2003, prepared by your consultant, SECOR International, Inc., for the subject site. We would like to acknowledge the overall good job in putting together the Preliminary Site Conceptual Model in accordance with the Appendix C requirements contained within the Final Draft MTBE Guidelines and the workplan submitted for supplemental site assessment and an expanded cleanup program. As we are implementing this new and more comprehensive approach managing high priority leaking underground storage tank cases, we feel strongly that in the end, it will reduce future impacts to water quality, provide for increased protection of sensitive receptors, and reduce the overall cost and time in performing assessment and cleanup activities.

In reference to the above documents, we have the following comments:

I. Corrective Action

Based on the historical Soil Vapor Extraction (SVE) testing and subsurface lithology and hydrogeology, Air Sparging (AS)/SVE is proposed to remove adsorbed-phase hydrocarbons from the former tankpit and dispenser areas and reduce dissolved-phase hydrocarbons. Your consultant proposes installing five AS/SVE wells to implement the remedial system. We concur with your workplan provided the following requirements are meet:

1. As already indicated, you are required to submit a Final Remedial Action Plan detailing the results of the interim corrective action and workplan for additional remedial action to this

Regional Board by **January 15, 2004**. This report must contain a scaled site-plan map with construction diagram for the existing soil vapor extraction and air sparging wells, and cross section profiles showing these wells, contamination plume, and lithological information. At a minimum, the following parameters must be included in your technical report:

- Scaled map showing the location of all wells and detailed layout of remediation system (i.e., piping and treatment system).
- Vapor flow rate.
- Pressure (or vacuum).
- Hours of system operation.
- Laboratory test results (in μg/L) including QA/QC data.
- Tabular and graphical summaries of contaminants removed versus time.
- Contamination mass removal rates and cumulative mass removed.
- Influent concentrations and concentrations at each vapor extraction well.

2. The undiluted soil vapor samples must be analyzed monthly for total petroleum hydrocarbons in gasoline (TPHg) using EPA Method 8015(M); for benzene, toluene, ethylbenzene, xylenes (BTEX), methyl tertiary butyl ether (MTBE), di-isopropyl ether (DIPE), ethyl tertiary butyl ether (ETBE), tertiary amyl methyl ether (TAME) and tertiary butyl alcohol (TBA) using EPA Method 8260B; and for oxygen and carbon dioxide content.

II. General

1. All necessary permits must be obtained from the appropriate agencies prior to the start of work.

2. All work must be performed by or under the direction of a registered geologist, certified engineering geologist, or registered civil engineer. A statement is required in the report that the registered professional in direct responsible charge actually supervised or personally conducted all the work associated with the project. All technical submittals must contain a wet ink signature and seal by one of the registered professionals.

3. All reports must conform to the "Guidelines for Report Submittals" published by the Los Angeles County Department of Public Works.

4. Please notify Ms. Heesu Park at least seven (7) days prior to the start of field work, so she can schedule to be present.

5. Copies of all technical reports are to be sent directly to the fee title holder of the site and to any other property owner(s) impacted by the underground storage tank (UST) releases from the site. The cover letter transmitting your technical reports to this Regional Board shall state that the technical reports were sent directly to all the fee title holder of the site as well as any offsite property owner impacted by the UST release(s). The cover letter shall provide

a list of all property owners sent technical reports and the date the technical reports were sent.

III. Site Conceptual Model (SCM) Update

In order to implement the final remediation of the petroleum hydrocarbon plume associated with the above referenced site, the Preliminary Site Conceptual Model must be updated on a quarterly basis. You are required to submit the next Site Conceptual Model Update by **October 15, 2003.** Subsequent Site Conceptual Model Updates are to be submitted according to the following schedule:

Reporting Period	Report Due Date
January – March	April 15TH
April – June	July 15TH
July – September	October 15TH
October – December	January 15TH

The Site Conceptual Model Update is a stand-alone document that provides a complete update to the PSCM. The Site Conceptual Model Update must contain all the components that are currently required in the Quarterly Groundwater Monitoring Reports. Therefore, a separate Quarterly Groundwater Monitoring Report is not required. In addition, the Site Conceptual Model Update must contain the results of any additional assessment and/or any remedial activities completed during the reporting period, a complete discussion on current site conditions, a complete discussion and trend analysis on analytical groundwater data, and provide a technical Work Plan for additional assessment and/or cleanup as determined by a review and evaluation of historical and current data. The Site Conceptual Model Update must also contain an annual revision of the Plume Travel Time data. Revised Plume Travel Time data must be submitted with the Site Conceptual Model Update during the April – June reporting period, which is due to the Regional Board by July 15, of each year. Additional revisions to the Plume Travel Time data may be required based on site-specific conditions.

IV. Enforcement

Pursuant to Section 13267(b) of the California Water Code, You are hereby directed to submit the periodic Updates to Site Conceptual Model Report by **October 15, 2003** and the Final Remedial Action Plan by **January 15, 2004.**

Pursuant to Section 13268 of the California Water Code, failure to submit the required technical reports, acceptable to the Executive Officer by the due dates specified above, may result in the imposition of civil liability penalties by this Regional board of up to $1,000 per day for each day the required technical reports are delinquent from these due dates. After these dates, civil liability penalties can be assessed by the Regional Board and without further warning.

If you have any questions or need additional information, please call Ms. Heesu Park at (213) 576-6705.

Sincerely,

Original Signed by

Gregg Kwey
Senior Water Resources Control Engineer

Cc: Hari Patel, State Water Resources Control Board, UST Cleanup Fund
Nardy Drew, Los Angeles County DPW, Environmental Programs Division
Bruce Mowry, Water Replenishment District of Southern California
Gareth Roberts, SECOR

California Regional Water Quality Control Board

Los Angeles Region

Over 51 Years Serving Coastal Los Angeles and Ventura Counties

Recipient of the 2001 *Environmental Leadership Award* from Keep California Beautiful

Terry Tamminen
Secretary for Environmental Protection

Arnold Schwarzenegger
Governor

320 W. 4th Street, Suite 200, Los Angeles, California 90013
Phone (213) 576-6600 FAX (213) 576-6640 - Internet Address: http://www.swrcb.ca.gov/rwqcb4

June 15, 2004

To: All Interested Parties

UNDERGROUND STORAGE TANKS PROGRAM – NEW GUIDELINES FOR ELECTRONIC SUBMITTAL OF QUARTERLY GROUNDWATER MONITORING REPORT

Starting on July 1, 2004, all parties who are directed by the Los Angeles Regional Water Quality Control Board's Underground Storage Tank (UST) Program to submit quarterly groundwater monitoring reports (QMRs) will have an option to submit these reports in an electronic format. This option is intended to save resources for both the public and private sectors, as well as to identify potential problems in advance of implementing new regulations (revisions to title 23 and title 27) to submit these reports electronically over the internet to the Sate Board's Geotracker system. The following guidelines are to be used for submitting the electronic QMRs.

I. Electronic Format

QMR's submitted to the Regional Board contain the following required information at a minimum: 1) cover page, 2) table of contents, 3) project summary 4) signature page, 5) figures and maps [area and site maps, direction of flow, monitoring locations, plume concentrations, free product, etc.], 6) data summary tables, 7) contaminant mass removal summary, if applicable, and 8) other relevant information [e.g., boring logs, analytical laboratory report, chain of custody, waste disposal manifest, health and safety plan, etc]. The electronic QMRs shall be converted into a Portable Deliverable Format (PDF), readable by the *Acrobat Reader (version 6.0)*, and copied onto a CD-ROM for submittal. No duplicate hard copies of the whole report are necessary. However, the cover page, table of contents, text of the report, signature page, data summary tables, and figures in the report shall be still submitted in hard copy along with the CD-ROM, which contains the full report including body of the report, appendices, and attachments. The submittal shall have a secured page or pouch to contain the CD-ROM. The CD-ROM submittal shall contain a CD-ROM case and both CD-ROM and the case shall be labeled with the site address and the monitoring quarter. Submit one hard copy (portion of the report as specified below) and one CD-ROM for each individual report per site.

II. Contents of the Quarterly Groundwater Monitoring Report

The quarterly groundwater monitoring report shall include, but not limited to, the following components:

1) Cover page containing the title of the report, address of the site, Regional Board File number, the period of quarterly groundwater monitoring, affiliation that produced the report, and the date of the report (**hard copy and CD**).
2) Table of contents and narrative text of the report (**hard copy and CD**).

3) Signature page for whom is responsible for the report (**hard copy and CD**).
4) Summary tables of current-quarter and historical monitoring data (**hard copy and CD**).
5) Figures (**hard copy and CD**).
6) Maps **(on CD)**
7) Contaminant mass removal summary, if applicable (**on CD**).
8) All attachments containing relevant information (e.g., boring logs, analytical laboratory report, chain of custody, waste disposal manifest, etc.) (**on CD**).

III. Limitations

This guideline is **not** a substitute of the State Board Electronic Data Format (EDF) submittal to the GeoTracker Database under the requirements of AB2886. The electronic report format discussed in this letter is only pertinent to changing the format of the hard copy reports that have been regularly submitted to this Regional Board, and does not fulfill any and all other requirements. Regional Board staff reserve the right to evaluate the need for the electronic report on a case by case basis.

IV Public Access to the Electronic Report

The Regional Board will make the proper electronic equipment (CD-ROM reader) available in the file review room to facilitate the public access to the information contained in the electronic report on CD. The standard Regional Board File Review procedures are applicable to review the CDs as well.

If you have any questions regarding this matter, please contact Dr. Yue Rong at (213) 576-6710 or at yrong@rb4.swrcb.ca.gov.

Sincerely,

Original signed by

Dennis A. Dickerson
Executive Officer

APPENDIX N

LABORATORY REPORTS AND CHAIN OF CUSTODY

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

LABORATORY REPORT

Prepared For: SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project: ARCO 0031, South Gate

Sampled: 02/13/07
Received: 02/14/07
Issued: 02/28/07 19:54

NELAP #01108CA California ELAP#1197 CSDLAC #10256

The results listed within this Laboratory Report pertain only to the samples tested in the laboratory. The analyses contained in this report were performed in accordance with the BPGCLN Technical Specifications, applicable federal, state, local regulations and certification requirements as well as the methodologies as described in laboratory SOPs reviewed by the BPGCLN. This Laboratory Report is confidential and is intended for the sole use of TestAmerica and its client. This report shall not be reproduced, except in full, without written permission from TestAmerica. The Chain(s) of Custody, 2 pages, are included and are an integral part of this report. This entire report was reviewed and approved for release.

CASE NARRATIVE

SAMPLE RECEIPT: Samples were received intact, at 4°C, on ice and with chain of custody documentation. Custody seals intact.

HOLDING TIMES: All samples were analyzed within prescribed holding times and/or in accordance with the TestAmerica Sample Acceptance Policy unless otherwise noted in the report.

PRESERVATION: Samples requiring preservation were verified prior to sample analysis. Results were qualified where the sample container did not meet the method preservation requirements.

QA/QC CRITERIA: All analyses met method criteria, except as noted in the report with data qualifiers.

COMMENTS: Results that fall between the MDL and RL are 'J' flagged.

SUBCONTRACTED: No analyses were subcontracted to an outside laboratory.

LABORATORY ID	CLIENT ID	MATRIX
IQB1508-01	MW-A1	Water
IQB1508-02	MW-A2	Water
IQB1508-03	MW-A3	Water
IQB1508-04	MW-A4	Water
IQB1508-05	MW-A5	Water
IQB1508-06	MW-A6	Water
IQB1508-07	MW-A7	Water
IQB1508-08	MW-A8S	Water
IQB1508-09	MW-A8D	Water

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

LABORATORY ID	CLIENT ID	MATRIX
IQB1508-10	DUP-5110-20070213	Water
IQB1508-11	TB-5110-20070213B	Water

Reviewed By:

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE FUEL HYDROCARBONS (EPA 5030/8015M)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-01 (MW-A1 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	30	50	**34**	1	02/23/07	02/23/07	J,DX
Surrogate: 4-BFB (FID) (65-140%)					*93 %*				
Sample ID: IQB1508-02 (MW-A2 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	600	1000	**4200**	20	02/23/07	02/23/07	PV
Surrogate: 4-BFB (FID) (65-140%)					*88 %*				
Sample ID: IQB1508-03 (MW-A3 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	150	250	**2000**	5	02/23/07	02/23/07	
Surrogate: 4-BFB (FID) (65-140%)					*90 %*				
Sample ID: IQB1508-04 (MW-A4 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	1500	2500	**22000**	50	02/23/07	02/23/07	PV
Surrogate: 4-BFB (FID) (65-140%)					*89 %*				
Sample ID: IQB1508-05 (MW-A5 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	30	50	**190**	1	02/23/07	02/23/07	
Surrogate: 4-BFB (FID) (65-140%)					*87 %*				
Sample ID: IQB1508-06 (MW-A6 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	30	50	**110**	1	02/23/07	02/23/07	
Surrogate: 4-BFB (FID) (65-140%)					*89 %*				
Sample ID: IQB1508-07 (MW-A7 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	1200	2000	**9300**	40	02/23/07	02/23/07	PV
Surrogate: 4-BFB (FID) (65-140%)					*86 %*				
Sample ID: IQB1508-08 (MW-A8S - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	30	50	**430**	1	02/23/07	02/23/07	PV
Surrogate: 4-BFB (FID) (65-140%)					*88 %*				

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE FUEL HYDROCARBONS (EPA 5030/8015M)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-09 (MW-A8D - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B23009	30	50	**150**	1	02/23/07	02/23/07	PV
Surrogate: 4-BFB (FID) (65-140%)					*86 %*				
Sample ID: IQB1508-10 (DUP-5110-20070213 - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B24008	750	1200	**2000**	25	02/24/07	02/24/07	
Surrogate: 4-BFB (FID) (65-140%)					*97 %*				
Sample ID: IQB1508-11 (TB-5110-20070213B - Water)									
Reporting Units: ug/l									
GRO (C4 - C12)	EPA 8015B	7B24001	30	50	ND	1	02/24/07	02/24/07	
Surrogate: 4-BFB (FID) (65-140%)					*86 %*				

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-01 (MW-A1 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21010	0.28	2.0	**2.7**	1	02/21/07	02/21/07	
Ethylbenzene	EPA 8260B	7B21010	0.25	2.0	**0.76**	1	02/21/07	02/21/07	J,DX
Toluene	EPA 8260B	7B21010	0.36	2.0	**1.0**	1	02/21/07	02/21/07	J,DX
o-Xylene	EPA 8260B	7B21010	0.30	2.0	ND	1	02/21/07	02/21/07	
m,p-Xylenes	EPA 8260B	7B21010	0.60	2.0	**0.93**	1	02/21/07	02/21/07	J,DX
Xylenes, Total	EPA 8260B	7B21010	0.90	4.0	**1.2**	1	02/21/07	02/21/07	J,DX
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21010	0.25	5.0	**1.1**	1	02/21/07	02/21/07	J,DX
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21010	0.28	5.0	ND	1	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21010	0.33	5.0	ND	1	02/21/07	02/21/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21010	0.32	5.0	**6.2**	1	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21010	3.1	50	**17**	1	02/21/07	02/21/07	J,DX
Ethanol	EPA 8260B	7B21010	100	150	ND	1	02/21/07	02/21/07	IO
Surrogate: Dibromofluoromethane (80-120%)					*102 %*				
Surrogate: Toluene-d8 (80-120%)					*101 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*101 %*				
Sample ID: IQB1508-02 (MW-A2 - Water)									
Reporting Units: ug/l									
Ethylbenzene	EPA 8260B	7B21010	1.0	8.0	**210**	4	02/21/07	02/21/07	
Toluene	EPA 8260B	7B21010	1.4	8.0	**8.2**	4	02/21/07	02/21/07	
o-Xylene	EPA 8260B	7B21010	1.2	8.0	**6.2**	4	02/21/07	02/21/07	J,DX
m,p-Xylenes	EPA 8260B	7B21010	2.4	8.0	**230**	4	02/21/07	02/21/07	
Xylenes, Total	EPA 8260B	7B21010	3.6	16	**240**	4	02/21/07	02/21/07	
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21010	1.0	20	ND	4	02/21/07	02/21/07	
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21010	1.1	20	ND	4	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21010	1.3	20	ND	4	02/21/07	02/21/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21010	1.3	20	ND	4	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21010	12	200	ND	4	02/21/07	02/21/07	
Ethanol	EPA 8260B	7B21010	400	600	ND	4	02/21/07	02/21/07	IO
Surrogate: Dibromofluoromethane (80-120%)					*103 %*				
Surrogate: Toluene-d8 (80-120%)					*101 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*102 %*				
Sample ID: IQB1508-02RE1 (MW-A2 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21024	2.8	20	**2100**	10	02/21/07	02/22/07	
Surrogate: Dibromofluoromethane (80-120%)					*120 %*				
Surrogate: Toluene-d8 (80-120%)					*102 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*102 %*				

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-03 (MW-A3 - Water)									
Reporting Units: ug/l									
Ethylbenzene	EPA 8260B	7B21010	0.25	2.0	**19**	1	02/21/07	02/21/07	
Toluene	EPA 8260B	7B21010	0.36	2.0	**0.73**	1	02/21/07	02/21/07	J,DX
o-Xylene	EPA 8260B	7B21010	0.30	2.0	**0.70**	1	02/21/07	02/21/07	J,DX
m,p-Xylenes	EPA 8260B	7B21010	0.60	2.0	**1.5**	1	02/21/07	02/21/07	J,DX
Xylenes, Total	EPA 8260B	7B21010	0.90	4.0	**2.2**	1	02/21/07	02/21/07	J,DX
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21010	0.25	5.0	**4.9**	1	02/21/07	02/21/07	J,DX
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21010	0.28	5.0	ND	1	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21010	0.33	5.0	**2.0**	1	02/21/07	02/21/07	J,DX
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21010	0.32	5.0	**300**	1	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21010	3.1	50	**180**	1	02/21/07	02/21/07	
Ethanol	EPA 8260B	7B21010	100	150	ND	1	02/21/07	02/21/07	IO
Surrogate: Dibromofluoromethane (80-120%)					*104 %*				
Surrogate: Toluene-d8 (80-120%)					*103 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*100 %*				
Sample ID: IQB1508-03RE1 (MW-A3 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21024	0.56	4.0	**530**	2	02/21/07	02/22/07	
Surrogate: Dibromofluoromethane (80-120%)					*114 %*				
Surrogate: Toluene-d8 (80-120%)					*104 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*106 %*				
Sample ID: IQB1508-04 (MW-A4 - Water)									
Reporting Units: ug/l									
Ethylbenzene	EPA 8260B	7B21010	5.0	40	**1000**	20	02/21/07	02/21/07	
Toluene	EPA 8260B	7B21010	7.2	40	**550**	20	02/21/07	02/21/07	
o-Xylene	EPA 8260B	7B21010	6.0	40	**170**	20	02/21/07	02/21/07	
m,p-Xylenes	EPA 8260B	7B21010	12	40	**1700**	20	02/21/07	02/21/07	
Xylenes, Total	EPA 8260B	7B21010	18	80	**1900**	20	02/21/07	02/21/07	
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21010	5.0	100	ND	20	02/21/07	02/21/07	
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21010	5.6	100	ND	20	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21010	6.6	100	ND	20	02/21/07	02/21/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21010	6.4	100	ND	20	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21010	62	1000	ND	20	02/21/07	02/21/07	
Ethanol	EPA 8260B	7B21010	2000	3000	ND	20	02/21/07	02/21/07	IO
Surrogate: Dibromofluoromethane (80-120%)					*103 %*				
Surrogate: Toluene-d8 (80-120%)					*103 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*100 %*				
Sample ID: IQB1508-04RE1 (MW-A4 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21024	28	200	**8800**	100	02/21/07	02/22/07	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-04RE1 (MW-A4 - Water) - cont.									
Reporting Units: ug/l									
Surrogate: Dibromofluoromethane (80-120%)					*118 %*				
Surrogate: Toluene-d8 (80-120%)					*104 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*103 %*				
Sample ID: IQB1508-05 (MW-A5 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21010	0.56	4.0	**36**	2	02/21/07	02/21/07	
Ethylbenzene	EPA 8260B	7B21010	0.50	4.0	**2.2**	2	02/21/07	02/21/07	J,DX
Toluene	EPA 8260B	7B21010	0.72	4.0	ND	2	02/21/07	02/21/07	
o-Xylene	EPA 8260B	7B21010	0.60	4.0	ND	2	02/21/07	02/21/07	
m,p-Xylenes	EPA 8260B	7B21010	1.2	4.0	**2.4**	2	02/21/07	02/21/07	J,DX
Xylenes, Total	EPA 8260B	7B21010	1.8	8.0	**2.6**	2	02/21/07	02/21/07	J,DX
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21010	0.50	10	**2.3**	2	02/21/07	02/21/07	J,DX
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21010	0.56	10	ND	2	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21010	0.66	10	ND	2	02/21/07	02/21/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21010	0.64	10	**130**	2	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21010	6.2	100	**63**	2	02/21/07	02/21/07	J,DX
Ethanol	EPA 8260B	7B21010	200	300	ND	2	02/21/07	02/21/07	IO
Surrogate: Dibromofluoromethane (80-120%)					*102 %*				
Surrogate: Toluene-d8 (80-120%)					*102 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*97 %*				
Sample ID: IQB1508-06 (MW-A6 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B24016	0.28	2.0	**6.9**	1	02/24/07	02/24/07	
Ethylbenzene	EPA 8260B	7B24016	0.25	2.0	ND	1	02/24/07	02/24/07	
Toluene	EPA 8260B	7B24016	0.36	2.0	ND	1	02/24/07	02/24/07	
o-Xylene	EPA 8260B	7B24016	0.30	2.0	ND	1	02/24/07	02/24/07	
m,p-Xylenes	EPA 8260B	7B24016	0.60	2.0	ND	1	02/24/07	02/24/07	
Xylenes, Total	EPA 8260B	7B24016	0.90	4.0	ND	1	02/24/07	02/24/07	
Di-isopropyl Ether (DIPE)	EPA 8260B	7B24016	0.25	5.0	ND	1	02/24/07	02/24/07	
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B24016	0.28	5.0	ND	1	02/24/07	02/24/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B24016	0.33	5.0	ND	1	02/24/07	02/24/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B24016	0.32	5.0	ND	1	02/24/07	02/24/07	
tert-Butanol (TBA)	EPA 8260B	7B24016	3.1	50	ND	1	02/24/07	02/24/07	
Ethanol	EPA 8260B	7B24016	100	150	ND	1	02/24/07	02/24/07	IB,IA
Surrogate: Dibromofluoromethane (80-120%)					*114 %*				
Surrogate: Toluene-d8 (80-120%)					*104 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*99 %*				

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-07 (MW-A7 - Water)									
Reporting Units: ug/l									
Ethylbenzene	EPA 8260B	7B21010	2.5	20	**310**	10	02/21/07	02/21/07	
Toluene	EPA 8260B	7B21010	3.6	20	**24**	10	02/21/07	02/21/07	
o-Xylene	EPA 8260B	7B21010	3.0	20	**51**	10	02/21/07	02/21/07	
m,p-Xylenes	EPA 8260B	7B21010	6.0	20	**370**	10	02/21/07	02/21/07	
Xylenes, Total	EPA 8260B	7B21010	9.0	40	**420**	10	02/21/07	02/21/07	
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21010	2.5	50	**2.9**	10	02/21/07	02/21/07	J,DX
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21010	2.8	50	ND	10	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21010	3.3	50	ND	10	02/21/07	02/21/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21010	3.2	50	**58**	10	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21010	31	500	**270**	10	02/21/07	02/21/07	J,DX
Ethanol	EPA 8260B	7B21010	1000	1500	ND	10	02/21/07	02/21/07	IO
Surrogate: Dibromofluoromethane (80-120%)					*104 %*				
Surrogate: Toluene-d8 (80-120%)					*104 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*100 %*				
Sample ID: IQB1508-07RE1 (MW-A7 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21024	11	80	**4500**	40	02/21/07	02/22/07	
Surrogate: Dibromofluoromethane (80-120%)					*120 %*				
Surrogate: Toluene-d8 (80-120%)					*104 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*102 %*				
Sample ID: IQB1508-08 (MW-A8S - Water)									
Reporting Units: ug/l									
Ethylbenzene	EPA 8260B	7B21010	0.25	2.0	**1.4**	1	02/21/07	02/21/07	J,DX
Toluene	EPA 8260B	7B21010	0.36	2.0	**2.1**	1	02/21/07	02/21/07	
o-Xylene	EPA 8260B	7B21010	0.30	2.0	ND	1	02/21/07	02/21/07	
m,p-Xylenes	EPA 8260B	7B21010	0.60	2.0	**0.60**	1	02/21/07	02/21/07	J,DX
Xylenes, Total	EPA 8260B	7B21010	0.90	4.0	ND	1	02/21/07	02/21/07	
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21010	0.25	5.0	**0.40**	1	02/21/07	02/21/07	J,DX
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21010	0.28	5.0	ND	1	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21010	0.33	5.0	**0.89**	1	02/21/07	02/21/07	J,DX
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21010	0.32	5.0	**120**	1	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21010	3.1	50	**51**	1	02/21/07	02/21/07	
Ethanol	EPA 8260B	7B21010	100	150	ND	1	02/21/07	02/21/07	IO
Surrogate: Dibromofluoromethane (80-120%)					*106 %*				
Surrogate: Toluene-d8 (80-120%)					*103 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*101 %*				
Sample ID: IQB1508-08RE1 (MW-A8S - Water)									**PC**
Reporting Units: ug/l									
Benzene	EPA 8260B	7B23011	0.56	4.0	**120**	2	02/23/07	02/23/07	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-08RE1 (MW-A8S - Water) - cont.									**PC**
Reporting Units: ug/l									
Surrogate: Dibromofluoromethane (80-120%)					*93 %*				
Surrogate: Toluene-d8 (80-120%)					*96 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*96 %*				
Sample ID: IQB1508-09 (MW-A8D - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21023	0.28	2.0	**23**	1	02/21/07	02/21/07	
Ethylbenzene	EPA 8260B	7B21023	0.25	2.0	**0.71**	1	02/21/07	02/21/07	J,DX
Toluene	EPA 8260B	7B21023	0.36	2.0	**0.59**	1	02/21/07	02/21/07	J,DX
o-Xylene	EPA 8260B	7B21023	0.30	2.0	ND	1	02/21/07	02/21/07	
m,p-Xylenes	EPA 8260B	7B21023	0.60	2.0	**0.61**	1	02/21/07	02/21/07	J,DX
Xylenes, Total	EPA 8260B	7B21023	0.90	4.0	ND	1	02/21/07	02/21/07	
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21023	0.25	5.0	**0.39**	1	02/21/07	02/21/07	J,DX
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21023	0.28	5.0	ND	1	02/21/07	02/21/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21023	0.33	5.0	ND	1	02/21/07	02/21/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21023	0.32	5.0	**13**	1	02/21/07	02/21/07	
tert-Butanol (TBA)	EPA 8260B	7B21023	3.1	50	**24**	1	02/21/07	02/21/07	J,DX
Ethanol	EPA 8260B	7B21023	100	150	ND	1	02/21/07	02/21/07	
Surrogate: Dibromofluoromethane (80-120%)					*112 %*				
Surrogate: Toluene-d8 (80-120%)					*102 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*100 %*				
Sample ID: IQB1508-10 (DUP-5110-20070213 - Water)									
Reporting Units: ug/l									
Ethylbenzene	EPA 8260B	7B21023	0.25	2.0	**16**	1	02/21/07	02/22/07	
Toluene	EPA 8260B	7B21023	0.36	2.0	**0.48**	1	02/21/07	02/22/07	J,DX
o-Xylene	EPA 8260B	7B21023	0.30	2.0	**0.58**	1	02/21/07	02/22/07	J,DX
m,p-Xylenes	EPA 8260B	7B21023	0.60	2.0	**1.2**	1	02/21/07	02/22/07	J,DX
Xylenes, Total	EPA 8260B	7B21023	0.90	4.0	**1.7**	1	02/21/07	02/22/07	J,DX
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21023	0.25	5.0	**5.1**	1	02/21/07	02/22/07	
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21023	0.28	5.0	ND	1	02/21/07	02/22/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21023	0.33	5.0	**2.3**	1	02/21/07	02/22/07	J,DX
tert-Butanol (TBA)	EPA 8260B	7B21023	3.1	50	**170**	1	02/21/07	02/22/07	
Ethanol	EPA 8260B	7B21023	100	150	ND	1	02/21/07	02/22/07	
Surrogate: Dibromofluoromethane (80-120%)					*111 %*				
Surrogate: Toluene-d8 (80-120%)					*102 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*103 %*				
Sample ID: IQB1508-10RE1 (DUP-5110-20070213 - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B22013	2.8	20	**640**	10	02/22/07	02/22/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B22013	3.2	50	**390**	10	02/22/07	02/22/07	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Method	Batch	MDL Limit	Reporting Limit	Sample Result	Dilution Factor	Date Extracted	Date Analyzed	Data Qualifiers
Sample ID: IQB1508-10RE1 (DUP-5110-20070213 - Water) - cont.									
Reporting Units: ug/l									
Surrogate: Dibromofluoromethane (80-120%)					*104 %*				
Surrogate: Toluene-d8 (80-120%)					*104 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*89 %*				
Sample ID: IQB1508-11 (TB-5110-20070213B - Water)									
Reporting Units: ug/l									
Benzene	EPA 8260B	7B21023	0.28	2.0	**0.55**	1	02/21/07	02/22/07	J,DX
Ethylbenzene	EPA 8260B	7B21023	0.25	2.0	ND	1	02/21/07	02/22/07	
Toluene	EPA 8260B	7B21023	0.36	2.0	ND	1	02/21/07	02/22/07	
o-Xylene	EPA 8260B	7B21023	0.30	2.0	ND	1	02/21/07	02/22/07	
m,p-Xylenes	EPA 8260B	7B21023	0.60	2.0	ND	1	02/21/07	02/22/07	
Xylenes, Total	EPA 8260B	7B21023	0.90	4.0	ND	1	02/21/07	02/22/07	
Di-isopropyl Ether (DIPE)	EPA 8260B	7B21023	0.25	5.0	ND	1	02/21/07	02/22/07	
Ethyl tert-Butyl Ether (ETBE)	EPA 8260B	7B21023	0.28	5.0	ND	1	02/21/07	02/22/07	
tert-Amyl Methyl Ether (TAME)	EPA 8260B	7B21023	0.33	5.0	ND	1	02/21/07	02/22/07	
Methyl-tert-butyl Ether (MTBE)	EPA 8260B	7B21023	0.32	5.0	ND	1	02/21/07	02/22/07	
tert-Butanol (TBA)	EPA 8260B	7B21023	3.1	50	ND	1	02/21/07	02/22/07	
Ethanol	EPA 8260B	7B21023	100	150	ND	1	02/21/07	02/22/07	
Surrogate: Dibromofluoromethane (80-120%)					*111 %*				
Surrogate: Toluene-d8 (80-120%)					*101 %*				
Surrogate: 4-Bromofluorobenzene (80-120%)					*98 %*				

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE FUEL HYDROCARBONS (EPA 5030/8015M)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23009 Extracted: 02/23/07											
Blank Analyzed: 02/23/2007 (7B23009-BLK1)											
GRO (C4 - C12)	ND	50	30	ug/l							
Surrogate: 4-BFB (FID)	*8.87*			*ug/l*	*10.0*		*89*	*65-140*			
LCS Analyzed: 02/23/2007 (7B23009-BS1)											
GRO (C4 - C12)	851	50	30	ug/l	800		106	85-115			
Surrogate: 4-BFB (FID)	*13.4*			*ug/l*	*10.0*		*134*	*65-140*			
Matrix Spike Analyzed: 02/23/2007 (7B23009-MS1)					**Source: IQB1508-01**						
GRO (C4 - C12)	247	50	30	ug/l	220	34	97	65-140			
Surrogate: 4-BFB (FID)	*9.48*			*ug/l*	*10.0*		*95*	*65-140*			
Matrix Spike Dup Analyzed: 02/23/2007 (7B23009-MSD1)					**Source: IQB1508-01**						
GRO (C4 - C12)	245	50	30	ug/l	220	34	96	65-140	1	20	
Surrogate: 4-BFB (FID)	*9.07*			*ug/l*	*10.0*		*91*	*65-140*			
Batch: 7B24001 Extracted: 02/24/07											
Blank Analyzed: 02/24/2007 (7B24001-BLK1)											
GRO (C4 - C12)	ND	50	30	ug/l							
Surrogate: 4-BFB (FID)	*7.58*			*ug/l*	*10.0*		*76*	*65-140*			
LCS Analyzed: 02/24/2007 (7B24001-BS1)											
GRO (C4 - C12)	811	50	30	ug/l	800		101	85-115			
Surrogate: 4-BFB (FID)	*13.7*			*ug/l*	*10.0*		*137*	*65-140*			
Matrix Spike Analyzed: 02/24/2007 (7B24001-MS1)					**Source: IQB1692-02**						
GRO (C4 - C12)	239	50	30	ug/l	220	ND	109	65-140			
Surrogate: 4-BFB (FID)	*8.33*			*ug/l*	*10.0*		*83*	*65-140*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE FUEL HYDROCARBONS (EPA 5030/8015M)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24001 Extracted: 02/24/07											
Matrix Spike Dup Analyzed: 02/24/2007 (7B24001-MSD1)						**Source: IQB1692-02**					
GRO (C4 - C12)	248	50	30	ug/l	220	ND	113	65-140	4	20	
Surrogate: 4-BFB (FID)	*9.68*			*ug/l*	*10.0*		*97*	*65-140*			
Batch: 7B24008 Extracted: 02/24/07											
Blank Analyzed: 02/24/2007 (7B24008-BLK1)											
GRO (C4 - C12)	ND	50	30	ug/l							
Surrogate: 4-BFB (FID)	*9.63*			*ug/l*	*10.0*		*96*	*65-140*			
LCS Analyzed: 02/24/2007 (7B24008-BS1)											
GRO (C4 - C12)	816	50	30	ug/l	800		102	85-115			
Surrogate: 4-BFB (FID)	*13.6*			*ug/l*	*10.0*		*136*	*65-140*			
Matrix Spike Analyzed: 02/24/2007 (7B24008-MS1)						**Source: IQB1708-02**					
GRO (C4 - C12)	252	50	30	ug/l	220	ND	115	65-140			
Surrogate: 4-BFB (FID)	*10.7*			*ug/l*	*10.0*		*107*	*65-140*			
Matrix Spike Dup Analyzed: 02/24/2007 (7B24008-MSD1)						**Source: IQB1708-02**					
GRO (C4 - C12)	260	50	30	ug/l	220	ND	118	65-140	3	20	
Surrogate: 4-BFB (FID)	*11.4*			*ug/l*	*10.0*		*114*	*65-140*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
Blank Analyzed: 02/21/2007 (7B21010-BLK1)											
Benzene	ND	2.0	0.28	ug/l							
Bromobenzene	ND	5.0	0.27	ug/l							
Bromochloromethane	ND	5.0	0.32	ug/l							
Bromodichloromethane	ND	2.0	0.30	ug/l							
Bromoform	ND	5.0	0.40	ug/l							
Bromomethane	ND	5.0	0.42	ug/l							
n-Butylbenzene	ND	5.0	0.37	ug/l							
sec-Butylbenzene	ND	5.0	0.25	ug/l							
tert-Butylbenzene	ND	5.0	0.22	ug/l							
Carbon tetrachloride	ND	5.0	0.28	ug/l							
Chlorobenzene	ND	2.0	0.36	ug/l							
Chloroethane	ND	5.0	0.40	ug/l							
Chloroform	ND	2.0	0.33	ug/l							
Chloromethane	ND	5.0	0.40	ug/l							
2-Chlorotoluene	ND	5.0	0.28	ug/l							
4-Chlorotoluene	ND	5.0	0.29	ug/l							
Dibromochloromethane	ND	2.0	0.28	ug/l							
1,2-Dibromo-3-chloropropane	ND	5.0	0.97	ug/l							
1,2-Dibromoethane (EDB)	ND	2.0	0.40	ug/l							
Dibromomethane	ND	2.0	0.36	ug/l							
1,2-Dichlorobenzene	ND	2.0	0.32	ug/l							
1,3-Dichlorobenzene	ND	2.0	0.35	ug/l							
1,4-Dichlorobenzene	ND	2.0	0.37	ug/l							
Dichlorodifluoromethane	ND	5.0	0.79	ug/l							
1,1-Dichloroethane	ND	2.0	0.27	ug/l							
1,2-Dichloroethane	ND	2.0	0.28	ug/l							
1,1-Dichloroethene	ND	5.0	0.42	ug/l							
cis-1,2-Dichloroethene	ND	2.0	0.32	ug/l							
trans-1,2-Dichloroethene	ND	2.0	0.27	ug/l							
1,2-Dichloropropane	ND	2.0	0.35	ug/l							
1,3-Dichloropropane	ND	2.0	0.32	ug/l							
2,2-Dichloropropane	ND	2.0	0.34	ug/l							
1,1-Dichloropropene	ND	2.0	0.28	ug/l							
cis-1,3-Dichloropropene	ND	2.0	0.22	ug/l							
trans-1,3-Dichloropropene	ND	2.0	0.32	ug/l							

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
Blank Analyzed: 02/21/2007 (7B21010-BLK1)											
Ethylbenzene	ND	2.0	0.25	ug/l							
Hexachlorobutadiene	ND	5.0	0.38	ug/l							
Isopropylbenzene	ND	2.0	0.25	ug/l							
p-Isopropyltoluene	ND	2.0	0.28	ug/l							
Methylene chloride	ND	5.0	0.95	ug/l							
Naphthalene	ND	5.0	0.41	ug/l							
n-Propylbenzene	ND	2.0	0.27	ug/l							
Styrene	ND	2.0	0.16	ug/l							
1,1,1,2-Tetrachloroethane	ND	5.0	0.27	ug/l							
1,1,2,2-Tetrachloroethane	ND	2.0	0.24	ug/l							
Tetrachloroethene	ND	2.0	0.32	ug/l							
Toluene	ND	2.0	0.36	ug/l							
1,2,3-Trichlorobenzene	ND	5.0	0.30	ug/l							
1,2,4-Trichlorobenzene	ND	5.0	0.48	ug/l							
1,1,1-Trichloroethane	ND	2.0	0.30	ug/l							
1,1,2-Trichloroethane	ND	2.0	0.30	ug/l							
Trichloroethene	ND	2.0	0.26	ug/l							
Trichlorofluoromethane	ND	5.0	0.34	ug/l							
1,2,3-Trichloropropane	ND	10	0.40	ug/l							
1,2,4-Trimethylbenzene	ND	2.0	0.23	ug/l							
1,3,5-Trimethylbenzene	ND	2.0	0.26	ug/l							
Vinyl chloride	ND	5.0	0.30	ug/l							
o-Xylene	ND	2.0	0.30	ug/l							
m,p-Xylenes	ND	2.0	0.60	ug/l							
Xylenes, Total	ND	4.0	0.90	ug/l							
Di-isopropyl Ether (DIPE)	ND	5.0	0.25	ug/l							
Ethyl tert-Butyl Ether (ETBE)	ND	5.0	0.28	ug/l							
tert-Amyl Methyl Ether (TAME)	ND	5.0	0.33	ug/l							
Methyl-tert-butyl Ether (MTBE)	ND	5.0	0.32	ug/l							
tert-Butanol (TBA)	ND	50	3.1	ug/l							
Ethanol	ND	150	100	ug/l							
Surrogate: Dibromofluoromethane	*25.3*			*ug/l*	*25.0*		*101*	*80-120*			
Surrogate: Toluene-d8	*25.1*			*ug/l*	*25.0*		*100*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.0*			*ug/l*	*25.0*		*100*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
LCS Analyzed: 02/21/2007 (7B21010-BS1)											
Benzene	22.8	2.0	0.28	ug/l	25.0		91	70-120			
Bromobenzene	24.2	5.0	0.27	ug/l	25.0		97	75-120			
Bromochloromethane	24.4	5.0	0.32	ug/l	25.0		98	70-130			
Bromodichloromethane	25.1	2.0	0.30	ug/l	25.0		100	70-135			
Bromoform	22.6	5.0	0.40	ug/l	25.0		90	55-130			
Bromomethane	26.4	5.0	0.42	ug/l	25.0		106	65-140			
n-Butylbenzene	24.9	5.0	0.37	ug/l	25.0		100	70-130			
sec-Butylbenzene	24.4	5.0	0.25	ug/l	25.0		98	70-125			
tert-Butylbenzene	24.4	5.0	0.22	ug/l	25.0		98	70-125			
Carbon tetrachloride	25.0	5.0	0.28	ug/l	25.0		100	65-140			
Chlorobenzene	23.1	2.0	0.36	ug/l	25.0		92	75-120			
Chloroethane	25.5	5.0	0.40	ug/l	25.0		102	60-140			
Chloroform	23.4	2.0	0.33	ug/l	25.0		94	70-130			
Chloromethane	25.8	5.0	0.40	ug/l	25.0		103	50-140			
2-Chlorotoluene	24.2	5.0	0.28	ug/l	25.0		97	70-125			
4-Chlorotoluene	24.6	5.0	0.29	ug/l	25.0		98	75-125			
Dibromochloromethane	24.0	2.0	0.28	ug/l	25.0		96	70-140			
1,2-Dibromo-3-chloropropane	24.9	5.0	0.97	ug/l	25.0		100	50-135			
1,2-Dibromoethane (EDB)	25.5	2.0	0.40	ug/l	25.0		102	75-125			
Dibromomethane	24.9	2.0	0.36	ug/l	25.0		100	70-125			
1,2-Dichlorobenzene	24.2	2.0	0.32	ug/l	25.0		97	75-120			
1,3-Dichlorobenzene	24.1	2.0	0.35	ug/l	25.0		96	75-120			
1,4-Dichlorobenzene	24.0	2.0	0.37	ug/l	25.0		96	75-120			
Dichlorodifluoromethane	30.8	5.0	0.79	ug/l	25.0		123	35-155			
1,1-Dichloroethane	23.7	2.0	0.27	ug/l	25.0		95	70-125			
1,2-Dichloroethane	23.8	2.0	0.28	ug/l	25.0		95	60-140			
1,1-Dichloroethene	19.4	5.0	0.42	ug/l	25.0		78	70-125			
cis-1,2-Dichloroethene	24.8	2.0	0.32	ug/l	25.0		99	70-125			
trans-1,2-Dichloroethene	24.9	2.0	0.27	ug/l	25.0		100	70-125			
1,2-Dichloropropane	24.5	2.0	0.35	ug/l	25.0		98	70-125			
1,3-Dichloropropane	25.2	2.0	0.32	ug/l	25.0		101	70-120			
2,2-Dichloropropane	24.1	2.0	0.34	ug/l	25.0		96	65-140			
1,1-Dichloropropene	24.1	2.0	0.28	ug/l	25.0		96	75-130			
cis-1,3-Dichloropropene	23.8	2.0	0.22	ug/l	25.0		95	75-125			
trans-1,3-Dichloropropene	24.6	2.0	0.32	ug/l	25.0		98	70-125			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
LCS Analyzed: 02/21/2007 (7B21010-BS1)											
Ethylbenzene	24.5	2.0	0.25	ug/l	25.0		98	75-125			
Hexachlorobutadiene	23.1	5.0	0.38	ug/l	25.0		92	65-135			
Isopropylbenzene	27.7	2.0	0.25	ug/l	25.0		111	75-130			
p-Isopropyltoluene	24.7	2.0	0.28	ug/l	25.0		99	75-125			
Methylene chloride	22.2	5.0	0.95	ug/l	25.0		89	55-130			
Naphthalene	26.2	5.0	0.41	ug/l	25.0		105	55-135			
n-Propylbenzene	25.4	2.0	0.27	ug/l	25.0		102	75-130			
Styrene	25.8	2.0	0.16	ug/l	25.0		103	75-130			
1,1,1,2-Tetrachloroethane	26.5	5.0	0.27	ug/l	25.0		106	70-130			
1,1,2,2-Tetrachloroethane	25.7	2.0	0.24	ug/l	25.0		103	55-130			
Tetrachloroethene	23.3	2.0	0.32	ug/l	25.0		93	70-125			
Toluene	23.9	2.0	0.36	ug/l	25.0		96	70-120			
1,2,3-Trichlorobenzene	24.9	5.0	0.30	ug/l	25.0		100	65-125			
1,2,4-Trichlorobenzene	24.6	5.0	0.48	ug/l	25.0		98	70-135			
1,1,1-Trichloroethane	24.3	2.0	0.30	ug/l	25.0		97	65-135			
1,1,2-Trichloroethane	25.1	2.0	0.30	ug/l	25.0		100	70-125			
Trichloroethene	23.6	2.0	0.26	ug/l	25.0		94	70-125			
Trichlorofluoromethane	24.1	5.0	0.34	ug/l	25.0		96	65-145			
1,2,3-Trichloropropane	19.8	10	0.40	ug/l	25.0		79	60-130			
1,2,4-Trimethylbenzene	25.4	2.0	0.23	ug/l	25.0		102	75-125			
1,3,5-Trimethylbenzene	25.2	2.0	0.26	ug/l	25.0		101	75-125			
Vinyl chloride	26.0	5.0	0.30	ug/l	25.0		104	55-135			
o-Xylene	23.8	2.0	0.30	ug/l	25.0		95	75-125			
m,p-Xylenes	48.3	2.0	0.60	ug/l	50.0		97	75-125			
Xylenes, Total	72.1	4.0	0.90	ug/l	75.0		96	70-125			
Di-isopropyl Ether (DIPE)	25.9	5.0	0.25	ug/l	25.0		104	60-135			
Ethyl tert-Butyl Ether (ETBE)	25.6	5.0	0.28	ug/l	25.0		102	65-135			
tert-Amyl Methyl Ether (TAME)	26.0	5.0	0.33	ug/l	25.0		104	60-135			
Methyl-tert-butyl Ether (MTBE)	26.1	5.0	0.32	ug/l	25.0		104	60-135			
tert-Butanol (TBA)	123	50	3.1	ug/l	125		98	70-135			
Ethanol	236	150	100	ug/l	250		94	40-155			
Surrogate: Dibromofluoromethane	*25.6*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: Toluene-d8	*25.4*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.2*			*ug/l*	*25.0*		*101*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
Matrix Spike Analyzed: 02/21/2007 (7B21010-MS1)						**Source: IQB1592-01**					
Benzene	22.6	2.0	0.28	ug/l	25.0	ND	90	65-125			
Bromobenzene	23.5	5.0	0.27	ug/l	25.0	ND	94	70-125			
Bromochloromethane	23.9	5.0	0.32	ug/l	25.0	ND	96	65-135			
Bromodichloromethane	24.4	2.0	0.30	ug/l	25.0	ND	98	70-135			
Bromoform	20.5	5.0	0.40	ug/l	25.0	ND	82	55-135			
Bromomethane	26.4	5.0	0.42	ug/l	25.0	ND	106	55-145			
n-Butylbenzene	24.7	5.0	0.37	ug/l	25.0	ND	99	65-135			
sec-Butylbenzene	23.8	5.0	0.25	ug/l	25.0	ND	95	70-125			
tert-Butylbenzene	23.9	5.0	0.22	ug/l	25.0	ND	96	65-130			
Carbon tetrachloride	24.5	5.0	0.28	ug/l	25.0	ND	98	65-140			
Chlorobenzene	23.0	2.0	0.36	ug/l	25.0	ND	92	75-125			
Chloroethane	25.4	5.0	0.40	ug/l	25.0	ND	102	55-140			
Chloroform	23.2	2.0	0.33	ug/l	25.0	ND	93	65-135			
Chloromethane	26.0	5.0	0.40	ug/l	25.0	ND	104	45-145			
2-Chlorotoluene	23.6	5.0	0.28	ug/l	25.0	ND	94	65-135			
4-Chlorotoluene	23.8	5.0	0.29	ug/l	25.0	ND	95	70-135			
Dibromochloromethane	22.2	2.0	0.28	ug/l	25.0	ND	89	65-140			
1,2-Dibromo-3-chloropropane	21.1	5.0	0.97	ug/l	25.0	ND	84	45-145			
1,2-Dibromoethane (EDB)	23.7	2.0	0.40	ug/l	25.0	ND	95	70-130			
Dibromomethane	23.4	2.0	0.36	ug/l	25.0	ND	94	65-135			
1,2-Dichlorobenzene	23.8	2.0	0.32	ug/l	25.0	ND	95	75-125			
1,3-Dichlorobenzene	23.7	2.0	0.35	ug/l	25.0	ND	95	75-125			
1,4-Dichlorobenzene	23.6	2.0	0.37	ug/l	25.0	ND	94	75-125			
Dichlorodifluoromethane	32.6	5.0	0.79	ug/l	25.0	ND	130	25-155			
1,1-Dichloroethane	23.2	2.0	0.27	ug/l	25.0	ND	93	65-130			
1,2-Dichloroethane	22.6	2.0	0.28	ug/l	25.0	ND	90	60-140			
1,1-Dichloroethene	18.9	5.0	0.42	ug/l	25.0	ND	76	60-130			
cis-1,2-Dichloroethene	24.3	2.0	0.32	ug/l	25.0	ND	97	65-130			
trans-1,2-Dichloroethene	24.5	2.0	0.27	ug/l	25.0	ND	98	65-130			
1,2-Dichloropropane	23.7	2.0	0.35	ug/l	25.0	ND	95	65-130			
1,3-Dichloropropane	24.0	2.0	0.32	ug/l	25.0	ND	96	65-135			
2,2-Dichloropropane	24.6	2.0	0.34	ug/l	25.0	ND	98	60-145			
1,1-Dichloropropene	23.8	2.0	0.28	ug/l	25.0	ND	95	70-135			
cis-1,3-Dichloropropene	23.2	2.0	0.22	ug/l	25.0	ND	93	70-130			
trans-1,3-Dichloropropene	23.5	2.0	0.32	ug/l	25.0	ND	94	65-135			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
Matrix Spike Analyzed: 02/21/2007 (7B21010-MS1)						**Source: IQB1592-01**					
Ethylbenzene	24.2	2.0	0.25	ug/l	25.0	ND	97	65-130			
Hexachlorobutadiene	22.7	5.0	0.38	ug/l	25.0	ND	91	60-135			
Isopropylbenzene	26.8	2.0	0.25	ug/l	25.0	ND	107	70-135			
p-Isopropyltoluene	24.2	2.0	0.28	ug/l	25.0	ND	97	65-130			
Methylene chloride	21.7	5.0	0.95	ug/l	25.0	ND	87	50-135			
Naphthalene	23.8	5.0	0.41	ug/l	25.0	ND	95	50-140			
n-Propylbenzene	25.0	2.0	0.27	ug/l	25.0	ND	100	70-135			
Styrene	24.9	2.0	0.16	ug/l	25.0	ND	100	50-145			
1,1,1,2-Tetrachloroethane	25.8	5.0	0.27	ug/l	25.0	ND	103	65-140			
1,1,2,2-Tetrachloroethane	23.4	2.0	0.24	ug/l	25.0	ND	94	55-135			
Tetrachloroethene	22.9	2.0	0.32	ug/l	25.0	ND	92	65-130			
Toluene	23.7	2.0	0.36	ug/l	25.0	ND	95	70-125			
1,2,3-Trichlorobenzene	24.2	5.0	0.30	ug/l	25.0	ND	97	60-135			
1,2,4-Trichlorobenzene	24.2	5.0	0.48	ug/l	25.0	ND	97	65-135			
1,1,1-Trichloroethane	24.1	2.0	0.30	ug/l	25.0	ND	96	65-140			
1,1,2-Trichloroethane	24.2	2.0	0.30	ug/l	25.0	ND	97	65-130			
Trichloroethene	23.1	2.0	0.26	ug/l	25.0	ND	92	65-125			
Trichlorofluoromethane	24.1	5.0	0.34	ug/l	25.0	ND	96	60-145			
1,2,3-Trichloropropane	17.4	10	0.40	ug/l	25.0	ND	70	55-135			
1,2,4-Trimethylbenzene	24.4	2.0	0.23	ug/l	25.0	ND	98	55-135			
1,3,5-Trimethylbenzene	24.4	2.0	0.26	ug/l	25.0	ND	98	70-130			
Vinyl chloride	27.0	5.0	0.30	ug/l	25.0	ND	108	45-140			
o-Xylene	23.8	2.0	0.30	ug/l	25.0	ND	95	65-125			
m,p-Xylenes	47.8	2.0	0.60	ug/l	50.0	ND	96	65-130			
Xylenes, Total	71.6	4.0	0.90	ug/l	75.0	ND	95	60-130			
Di-isopropyl Ether (DIPE)	25.7	5.0	0.25	ug/l	25.0	0.31	102	60-140			
Ethyl tert-Butyl Ether (ETBE)	25.0	5.0	0.28	ug/l	25.0	ND	100	60-135			
tert-Amyl Methyl Ether (TAME)	25.2	5.0	0.33	ug/l	25.0	ND	101	60-140			
Methyl-tert-butyl Ether (MTBE)	92.8	5.0	0.32	ug/l	25.0	72	83	55-145			
tert-Butanol (TBA)	1200	50	3.1	ug/l	125	1100	80	65-140			
Ethanol	317	150	100	ug/l	250	ND	127	40-155			
Surrogate: Dibromofluoromethane	*25.7*			*ug/l*	*25.0*		*103*	*80-120*			
Surrogate: Toluene-d8	*25.4*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.3*			*ug/l*	*25.0*		*101*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
Matrix Spike Dup Analyzed: 02/21/2007 (7B21010-MSD1)						**Source: IQB1592-01**					
Benzene	22.7	2.0	0.28	ug/l	25.0	ND	91	65-125	0	20	
Bromobenzene	23.4	5.0	0.27	ug/l	25.0	ND	94	70-125	0	20	
Bromochloromethane	24.3	5.0	0.32	ug/l	25.0	ND	97	65-135	2	25	
Bromodichloromethane	25.0	2.0	0.30	ug/l	25.0	ND	100	70-135	2	20	
Bromoform	21.4	5.0	0.40	ug/l	25.0	ND	86	55-135	4	25	
Bromomethane	25.9	5.0	0.42	ug/l	25.0	ND	104	55-145	2	25	
n-Butylbenzene	24.1	5.0	0.37	ug/l	25.0	ND	96	65-135	2	20	
sec-Butylbenzene	23.2	5.0	0.25	ug/l	25.0	ND	93	70-125	3	20	
tert-Butylbenzene	23.2	5.0	0.22	ug/l	25.0	ND	93	65-130	3	20	
Carbon tetrachloride	24.8	5.0	0.28	ug/l	25.0	ND	99	65-140	1	25	
Chlorobenzene	22.6	2.0	0.36	ug/l	25.0	ND	90	75-125	2	20	
Chloroethane	25.1	5.0	0.40	ug/l	25.0	ND	100	55-140	1	25	
Chloroform	23.2	2.0	0.33	ug/l	25.0	ND	93	65-135	0	20	
Chloromethane	25.7	5.0	0.40	ug/l	25.0	ND	103	45-145	1	25	
2-Chlorotoluene	23.1	5.0	0.28	ug/l	25.0	ND	92	65-135	2	20	
4-Chlorotoluene	23.8	5.0	0.29	ug/l	25.0	ND	95	70-135	0	20	
Dibromochloromethane	23.0	2.0	0.28	ug/l	25.0	ND	92	65-140	4	25	
1,2-Dibromo-3-chloropropane	21.8	5.0	0.97	ug/l	25.0	ND	87	45-145	3	30	
1,2-Dibromoethane (EDB)	24.3	2.0	0.40	ug/l	25.0	ND	97	70-130	2	25	
Dibromomethane	23.8	2.0	0.36	ug/l	25.0	ND	95	65-135	2	25	
1,2-Dichlorobenzene	23.5	2.0	0.32	ug/l	25.0	ND	94	75-125	1	20	
1,3-Dichlorobenzene	23.6	2.0	0.35	ug/l	25.0	ND	94	75-125	0	20	
1,4-Dichlorobenzene	23.0	2.0	0.37	ug/l	25.0	ND	92	75-125	3	20	
Dichlorodifluoromethane	32.2	5.0	0.79	ug/l	25.0	ND	129	25-155	1	30	
1,1-Dichloroethane	22.9	2.0	0.27	ug/l	25.0	ND	92	65-130	1	20	
1,2-Dichloroethane	23.0	2.0	0.28	ug/l	25.0	ND	92	60-140	2	20	
1,1-Dichloroethene	18.6	5.0	0.42	ug/l	25.0	ND	74	60-130	2	20	
cis-1,2-Dichloroethene	24.1	2.0	0.32	ug/l	25.0	ND	96	65-130	1	20	
trans-1,2-Dichloroethene	24.2	2.0	0.27	ug/l	25.0	ND	97	65-130	1	20	
1,2-Dichloropropane	24.1	2.0	0.35	ug/l	25.0	ND	96	65-130	2	20	
1,3-Dichloropropane	24.2	2.0	0.32	ug/l	25.0	ND	97	65-135	1	25	
2,2-Dichloropropane	24.6	2.0	0.34	ug/l	25.0	ND	98	60-145	0	25	
1,1-Dichloropropene	23.4	2.0	0.28	ug/l	25.0	ND	94	70-135	2	20	
cis-1,3-Dichloropropene	23.7	2.0	0.22	ug/l	25.0	ND	95	70-130	2	20	
trans-1,3-Dichloropropene	24.1	2.0	0.32	ug/l	25.0	ND	96	65-135	3	25	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21010 Extracted: 02/21/07											
Matrix Spike Dup Analyzed: 02/21/2007 (7B21010-MSD1)						**Source: IQB1592-01**					
Ethylbenzene	23.8	2.0	0.25	ug/l	25.0	ND	95	65-130	2	20	
Hexachlorobutadiene	21.4	5.0	0.38	ug/l	25.0	ND	86	60-135	6	20	
Isopropylbenzene	26.5	2.0	0.25	ug/l	25.0	ND	106	70-135	1	20	
p-Isopropyltoluene	23.7	2.0	0.28	ug/l	25.0	ND	95	65-130	2	20	
Methylene chloride	21.8	5.0	0.95	ug/l	25.0	ND	87	50-135	1	20	
Naphthalene	24.2	5.0	0.41	ug/l	25.0	ND	97	50-140	2	30	
n-Propylbenzene	24.5	2.0	0.27	ug/l	25.0	ND	98	70-135	2	20	
Styrene	24.6	2.0	0.16	ug/l	25.0	ND	98	50-145	1	30	
1,1,1,2-Tetrachloroethane	26.2	5.0	0.27	ug/l	25.0	ND	105	65-140	2	20	
1,1,2,2-Tetrachloroethane	24.1	2.0	0.24	ug/l	25.0	ND	96	55-135	3	30	
Tetrachloroethene	22.2	2.0	0.32	ug/l	25.0	ND	89	65-130	3	20	
Toluene	23.3	2.0	0.36	ug/l	25.0	ND	93	70-125	2	20	
1,2,3-Trichlorobenzene	23.9	5.0	0.30	ug/l	25.0	ND	96	60-135	1	20	
1,2,4-Trichlorobenzene	23.8	5.0	0.48	ug/l	25.0	ND	95	65-135	2	20	
1,1,1-Trichloroethane	24.1	2.0	0.30	ug/l	25.0	ND	96	65-140	0	20	
1,1,2-Trichloroethane	24.4	2.0	0.30	ug/l	25.0	ND	98	65-130	1	25	
Trichloroethene	22.7	2.0	0.26	ug/l	25.0	ND	91	65-125	2	20	
Trichlorofluoromethane	23.7	5.0	0.34	ug/l	25.0	ND	95	60-145	2	25	
1,2,3-Trichloropropane	18.2	10	0.40	ug/l	25.0	ND	73	55-135	4	30	
1,2,4-Trimethylbenzene	24.0	2.0	0.23	ug/l	25.0	ND	96	55-135	2	25	
1,3,5-Trimethylbenzene	24.0	2.0	0.26	ug/l	25.0	ND	96	70-130	2	20	
Vinyl chloride	26.2	5.0	0.30	ug/l	25.0	ND	105	45-140	3	30	
o-Xylene	23.4	2.0	0.30	ug/l	25.0	ND	94	65-125	2	20	
m,p-Xylenes	46.9	2.0	0.60	ug/l	50.0	ND	94	65-130	2	25	
Xylenes, Total	70.3	4.0	0.90	ug/l	75.0	ND	94	60-130	2	20	
Di-isopropyl Ether (DIPE)	26.0	5.0	0.25	ug/l	25.0	0.31	103	60-140	1	25	
Ethyl tert-Butyl Ether (ETBE)	25.7	5.0	0.28	ug/l	25.0	ND	103	60-135	3	25	
tert-Amyl Methyl Ether (TAME)	26.0	5.0	0.33	ug/l	25.0	ND	104	60-140	3	30	
Methyl-tert-butyl Ether (MTBE)	95.2	5.0	0.32	ug/l	25.0	72	93	55-145	3	25	
tert-Butanol (TBA)	1170	50	3.1	ug/l	125	1100	56	65-140	3	25	*BB*
Ethanol	299	150	100	ug/l	250	ND	120	40-155	6	30	
Surrogate: Dibromofluoromethane	*26.2*			*ug/l*	*25.0*		*105*	*80-120*			
Surrogate: Toluene-d8	*25.4*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.5*			*ug/l*	*25.0*		*102*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
Blank Analyzed: 02/21/2007 (7B21023-BLK1)											
Benzene	ND	2.0	0.28	ug/l							
Bromobenzene	ND	5.0	0.27	ug/l							
Bromochloromethane	ND	5.0	0.32	ug/l							
Bromodichloromethane	ND	2.0	0.30	ug/l							
Bromoform	ND	5.0	0.40	ug/l							
Bromomethane	ND	5.0	0.42	ug/l							
n-Butylbenzene	ND	5.0	0.37	ug/l							
sec-Butylbenzene	ND	5.0	0.25	ug/l							
tert-Butylbenzene	ND	5.0	0.22	ug/l							
Carbon tetrachloride	ND	5.0	0.28	ug/l							
Chlorobenzene	ND	2.0	0.36	ug/l							
Chloroethane	ND	5.0	0.40	ug/l							
Chloroform	ND	2.0	0.33	ug/l							
Chloromethane	ND	5.0	0.40	ug/l							
2-Chlorotoluene	ND	5.0	0.28	ug/l							
4-Chlorotoluene	ND	5.0	0.29	ug/l							
Dibromochloromethane	ND	2.0	0.28	ug/l							
1,2-Dibromo-3-chloropropane	ND	5.0	0.97	ug/l							
1,2-Dibromoethane (EDB)	ND	2.0	0.40	ug/l							
Dibromomethane	ND	2.0	0.36	ug/l							
1,2-Dichlorobenzene	ND	2.0	0.32	ug/l							
1,3-Dichlorobenzene	ND	2.0	0.35	ug/l							
1,4-Dichlorobenzene	ND	2.0	0.37	ug/l							
Dichlorodifluoromethane	ND	5.0	0.79	ug/l							
1,1-Dichloroethane	ND	2.0	0.27	ug/l							
1,2-Dichloroethane	ND	2.0	0.28	ug/l							
1,1-Dichloroethene	ND	5.0	0.42	ug/l							
cis-1,2-Dichloroethene	ND	2.0	0.32	ug/l							
trans-1,2-Dichloroethene	ND	2.0	0.27	ug/l							
1,2-Dichloropropane	ND	2.0	0.35	ug/l							
1,3-Dichloropropane	ND	2.0	0.32	ug/l							
2,2-Dichloropropane	ND	2.0	0.34	ug/l							
1,1-Dichloropropene	ND	2.0	0.28	ug/l							
cis-1,3-Dichloropropene	ND	2.0	0.22	ug/l							
trans-1,3-Dichloropropene	ND	2.0	0.32	ug/l							

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
Blank Analyzed: 02/21/2007 (7B21023-BLK1)											
Ethylbenzene	ND	2.0	0.25	ug/l							
Hexachlorobutadiene	ND	5.0	0.38	ug/l							
Isopropylbenzene	ND	2.0	0.25	ug/l							
p-Isopropyltoluene	ND	2.0	0.28	ug/l							
Methylene chloride	2.14	5.0	0.95	ug/l							*J,DX*
Naphthalene	ND	5.0	0.41	ug/l							
n-Propylbenzene	ND	2.0	0.27	ug/l							
Styrene	ND	2.0	0.16	ug/l							
1,1,1,2-Tetrachloroethane	ND	5.0	0.27	ug/l							
1,1,2,2-Tetrachloroethane	ND	2.0	0.24	ug/l							
Tetrachloroethene	ND	2.0	0.32	ug/l							
Toluene	ND	2.0	0.36	ug/l							
1,2,3-Trichlorobenzene	ND	5.0	0.30	ug/l							
1,2,4-Trichlorobenzene	ND	5.0	0.48	ug/l							
1,1,1-Trichloroethane	ND	2.0	0.30	ug/l							
1,1,2-Trichloroethane	ND	2.0	0.30	ug/l							
Trichloroethene	ND	2.0	0.26	ug/l							
Trichlorofluoromethane	ND	5.0	0.34	ug/l							
1,2,3-Trichloropropane	ND	10	0.40	ug/l							
1,2,4-Trimethylbenzene	ND	2.0	0.23	ug/l							
1,3,5-Trimethylbenzene	ND	2.0	0.26	ug/l							
Vinyl chloride	ND	5.0	0.30	ug/l							
o-Xylene	ND	2.0	0.30	ug/l							
m,p-Xylenes	ND	2.0	0.60	ug/l							
Xylenes, Total	ND	4.0	0.90	ug/l							
Di-isopropyl Ether (DIPE)	ND	5.0	0.25	ug/l							
Ethyl tert-Butyl Ether (ETBE)	ND	5.0	0.28	ug/l							
tert-Amyl Methyl Ether (TAME)	ND	5.0	0.33	ug/l							
Methyl-tert-butyl Ether (MTBE)	ND	5.0	0.32	ug/l							
tert-Butanol (TBA)	ND	50	3.1	ug/l							
Ethanol	ND	150	100	ug/l							
Surrogate: Dibromofluoromethane	*26.0*			*ug/l*	*25.0*		*104*	*80-120*			
Surrogate: Toluene-d8	*25.2*			*ug/l*	*25.0*		*101*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.3*			*ug/l*	*25.0*		*101*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
LCS Analyzed: 02/21/2007 (7B21023-BS1)											
Benzene	22.8	2.0	0.28	ug/l	25.0		91	70-120			
Bromobenzene	23.9	5.0	0.27	ug/l	25.0		96	75-120			
Bromochloromethane	23.9	5.0	0.32	ug/l	25.0		96	70-130			
Bromodichloromethane	24.1	2.0	0.30	ug/l	25.0		96	70-135			
Bromoform	21.5	5.0	0.40	ug/l	25.0		86	55-130			
Bromomethane	25.2	5.0	0.42	ug/l	25.0		101	65-140			
n-Butylbenzene	24.6	5.0	0.37	ug/l	25.0		98	70-130			
sec-Butylbenzene	24.3	5.0	0.25	ug/l	25.0		97	70-125			
tert-Butylbenzene	24.5	5.0	0.22	ug/l	25.0		98	70-125			
Carbon tetrachloride	25.0	5.0	0.28	ug/l	25.0		100	65-140			
Chlorobenzene	22.9	2.0	0.36	ug/l	25.0		92	75-120			
Chloroethane	24.6	5.0	0.40	ug/l	25.0		98	60-140			
Chloroform	23.1	2.0	0.33	ug/l	25.0		92	70-130			
Chloromethane	24.4	5.0	0.40	ug/l	25.0		98	50-140			
2-Chlorotoluene	24.0	5.0	0.28	ug/l	25.0		96	70-125			
4-Chlorotoluene	24.2	5.0	0.29	ug/l	25.0		97	75-125			
Dibromochloromethane	22.9	2.0	0.28	ug/l	25.0		92	70-140			
1,2-Dibromo-3-chloropropane	23.9	5.0	0.97	ug/l	25.0		96	50-135			
1,2-Dibromoethane (EDB)	24.9	2.0	0.40	ug/l	25.0		100	75-125			
Dibromomethane	24.0	2.0	0.36	ug/l	25.0		96	70-125			
1,2-Dichlorobenzene	24.0	2.0	0.32	ug/l	25.0		96	75-120			
1,3-Dichlorobenzene	23.6	2.0	0.35	ug/l	25.0		94	75-120			
1,4-Dichlorobenzene	23.3	2.0	0.37	ug/l	25.0		93	75-120			
Dichlorodifluoromethane	27.0	5.0	0.79	ug/l	25.0		108	35-155			
1,1-Dichloroethane	23.4	2.0	0.27	ug/l	25.0		94	70-125			
1,2-Dichloroethane	22.7	2.0	0.28	ug/l	25.0		91	60-140			
1,1-Dichloroethene	18.9	5.0	0.42	ug/l	25.0		76	70-125			
cis-1,2-Dichloroethene	24.7	2.0	0.32	ug/l	25.0		99	70-125			
trans-1,2-Dichloroethene	25.1	2.0	0.27	ug/l	25.0		100	70-125			
1,2-Dichloropropane	23.8	2.0	0.35	ug/l	25.0		95	70-125			
1,3-Dichloropropane	24.4	2.0	0.32	ug/l	25.0		98	70-120			
2,2-Dichloropropane	24.2	2.0	0.34	ug/l	25.0		97	65-140			
1,1-Dichloropropene	23.9	2.0	0.28	ug/l	25.0		96	75-130			
cis-1,3-Dichloropropene	22.9	2.0	0.22	ug/l	25.0		92	75-125			
trans-1,3-Dichloropropene	23.3	2.0	0.32	ug/l	25.0		93	70-125			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
LCS Analyzed: 02/21/2007 (7B21023-BS1)											
Ethylbenzene	24.4	2.0	0.25	ug/l	25.0		98	75-125			
Hexachlorobutadiene	22.1	5.0	0.38	ug/l	25.0		88	65-135			
Isopropylbenzene	27.9	2.0	0.25	ug/l	25.0		112	75-130			
p-Isopropyltoluene	24.5	2.0	0.28	ug/l	25.0		98	75-125			
Methylene chloride	24.2	5.0	0.95	ug/l	25.0		97	55-130			
Naphthalene	25.6	5.0	0.41	ug/l	25.0		102	55-135			
n-Propylbenzene	25.6	2.0	0.27	ug/l	25.0		102	75-130			
Styrene	25.3	2.0	0.16	ug/l	25.0		101	75-130			
1,1,1,2-Tetrachloroethane	25.7	5.0	0.27	ug/l	25.0		103	70-130			
1,1,2,2-Tetrachloroethane	24.4	2.0	0.24	ug/l	25.0		98	55-130			
Tetrachloroethene	23.2	2.0	0.32	ug/l	25.0		93	70-125			
Toluene	23.6	2.0	0.36	ug/l	25.0		94	70-120			
1,2,3-Trichlorobenzene	23.8	5.0	0.30	ug/l	25.0		95	65-125			
1,2,4-Trichlorobenzene	23.3	5.0	0.48	ug/l	25.0		93	70-135			
1,1,1-Trichloroethane	24.3	2.0	0.30	ug/l	25.0		97	65-135			
1,1,2-Trichloroethane	24.1	2.0	0.30	ug/l	25.0		96	70-125			
Trichloroethene	23.8	2.0	0.26	ug/l	25.0		95	70-125			
Trichlorofluoromethane	23.1	5.0	0.34	ug/l	25.0		92	65-145			
1,2,3-Trichloropropane	19.5	10	0.40	ug/l	25.0		78	60-130			
1,2,4-Trimethylbenzene	24.7	2.0	0.23	ug/l	25.0		99	75-125			
1,3,5-Trimethylbenzene	25.1	2.0	0.26	ug/l	25.0		100	75-125			
Vinyl chloride	25.2	5.0	0.30	ug/l	25.0		101	55-135			
o-Xylene	23.5	2.0	0.30	ug/l	25.0		94	75-125			
m,p-Xylenes	48.0	2.0	0.60	ug/l	50.0		96	75-125			
Xylenes, Total	71.5	4.0	0.90	ug/l	75.0		95	70-125			
Di-isopropyl Ether (DIPE)	24.6	5.0	0.25	ug/l	25.0		98	60-135			
Ethyl tert-Butyl Ether (ETBE)	24.0	5.0	0.28	ug/l	25.0		96	65-135			
tert-Amyl Methyl Ether (TAME)	24.3	5.0	0.33	ug/l	25.0		97	60-135			
Methyl-tert-butyl Ether (MTBE)	24.5	5.0	0.32	ug/l	25.0		98	60-135			
tert-Butanol (TBA)	95.5	50	3.1	ug/l	125		76	70-135			
Ethanol	176	150	100	ug/l	250		70	40-155			
Surrogate: Dibromofluoromethane	*25.8*			*ug/l*	*25.0*		*103*	*80-120*			
Surrogate: Toluene-d8	*25.4*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*24.9*			*ug/l*	*25.0*		*100*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
Matrix Spike Analyzed: 02/21/2007 (7B21023-MS1)						**Source: IQB1770-06**					
Benzene	24.2	2.0	0.28	ug/l	25.0	0.40	95	65-125			
Bromobenzene	25.3	5.0	0.27	ug/l	25.0	ND	101	70-125			
Bromochloromethane	26.5	5.0	0.32	ug/l	25.0	ND	106	65-135			
Bromodichloromethane	26.4	2.0	0.30	ug/l	25.0	ND	106	70-135			
Bromoform	23.6	5.0	0.40	ug/l	25.0	ND	94	55-135			
Bromomethane	26.4	5.0	0.42	ug/l	25.0	ND	106	55-145			
n-Butylbenzene	24.9	5.0	0.37	ug/l	25.0	ND	100	65-135			
sec-Butylbenzene	24.5	5.0	0.25	ug/l	25.0	ND	98	70-125			
tert-Butylbenzene	24.8	5.0	0.22	ug/l	25.0	ND	99	65-130			
Carbon tetrachloride	25.2	5.0	0.28	ug/l	25.0	ND	101	65-140			
Chlorobenzene	24.0	2.0	0.36	ug/l	25.0	ND	96	75-125			
Chloroethane	25.9	5.0	0.40	ug/l	25.0	ND	104	55-140			
Chloroform	24.9	2.0	0.33	ug/l	25.0	ND	100	65-135			
Chloromethane	23.8	5.0	0.40	ug/l	25.0	ND	95	45-145			
2-Chlorotoluene	24.8	5.0	0.28	ug/l	25.0	ND	99	65-135			
4-Chlorotoluene	25.0	5.0	0.29	ug/l	25.0	ND	100	70-135			
Dibromochloromethane	25.1	2.0	0.28	ug/l	25.0	ND	100	65-140			
1,2-Dibromo-3-chloropropane	25.9	5.0	0.97	ug/l	25.0	ND	104	45-145			
1,2-Dibromoethane (EDB)	27.0	2.0	0.40	ug/l	25.0	ND	108	70-130			
Dibromomethane	26.4	2.0	0.36	ug/l	25.0	ND	106	65-135			
1,2-Dichlorobenzene	25.6	2.0	0.32	ug/l	25.0	ND	102	75-125			
1,3-Dichlorobenzene	25.0	2.0	0.35	ug/l	25.0	ND	100	75-125			
1,4-Dichlorobenzene	24.6	2.0	0.37	ug/l	25.0	ND	98	75-125			
Dichlorodifluoromethane	25.8	5.0	0.79	ug/l	25.0	ND	103	25-155			
1,1-Dichloroethane	25.0	2.0	0.27	ug/l	25.0	ND	100	65-130			
1,2-Dichloroethane	24.7	2.0	0.28	ug/l	25.0	ND	99	60-140			
1,1-Dichloroethene	19.0	5.0	0.42	ug/l	25.0	ND	76	60-130			
cis-1,2-Dichloroethene	26.2	2.0	0.32	ug/l	25.0	ND	105	65-130			
trans-1,2-Dichloroethene	26.0	2.0	0.27	ug/l	25.0	ND	104	65-130			
1,2-Dichloropropane	25.8	2.0	0.35	ug/l	25.0	ND	103	65-130			
1,3-Dichloropropane	26.5	2.0	0.32	ug/l	25.0	ND	106	65-135			
2,2-Dichloropropane	24.8	2.0	0.34	ug/l	25.0	ND	99	60-145			
1,1-Dichloropropene	24.2	2.0	0.28	ug/l	25.0	ND	97	70-135			
cis-1,3-Dichloropropene	25.1	2.0	0.22	ug/l	25.0	ND	100	70-130			
trans-1,3-Dichloropropene	25.8	2.0	0.32	ug/l	25.0	ND	103	65-135			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
Matrix Spike Analyzed: 02/21/2007 (7B21023-MS1)						**Source: IQB1770-06**					
Ethylbenzene	25.7	2.0	0.25	ug/l	25.0	0.90	99	65-130			
Hexachlorobutadiene	22.4	5.0	0.38	ug/l	25.0	ND	90	60-135			
Isopropylbenzene	28.0	2.0	0.25	ug/l	25.0	ND	112	70-135			
p-Isopropyltoluene	24.9	2.0	0.28	ug/l	25.0	ND	100	65-130			
Methylene chloride	24.6	5.0	0.95	ug/l	25.0	1.4	93	50-135			
Naphthalene	27.9	5.0	0.41	ug/l	25.0	ND	112	50-140			
n-Propylbenzene	25.9	2.0	0.27	ug/l	25.0	ND	104	70-135			
Styrene	17.8	2.0	0.16	ug/l	25.0	ND	71	50-145			
1,1,1,2-Tetrachloroethane	27.8	5.0	0.27	ug/l	25.0	ND	111	65-140			
1,1,2,2-Tetrachloroethane	27.7	2.0	0.24	ug/l	25.0	ND	111	55-135			
Tetrachloroethene	23.1	2.0	0.32	ug/l	25.0	ND	92	65-130			
Toluene	27.3	2.0	0.36	ug/l	25.0	2.8	98	70-125			
1,2,3-Trichlorobenzene	25.8	5.0	0.30	ug/l	25.0	ND	103	60-135			
1,2,4-Trichlorobenzene	25.4	5.0	0.48	ug/l	25.0	ND	102	65-135			
1,1,1-Trichloroethane	25.5	2.0	0.30	ug/l	25.0	ND	102	65-140			
1,1,2-Trichloroethane	27.1	2.0	0.30	ug/l	25.0	ND	108	65-130			
Trichloroethene	23.8	2.0	0.26	ug/l	25.0	ND	95	65-125			
Trichlorofluoromethane	23.5	5.0	0.34	ug/l	25.0	ND	94	60-145			
1,2,3-Trichloropropane	20.9	10	0.40	ug/l	25.0	ND	84	55-135			
1,2,4-Trimethylbenzene	26.9	2.0	0.23	ug/l	25.0	1.4	102	55-135			
1,3,5-Trimethylbenzene	26.0	2.0	0.26	ug/l	25.0	0.36	103	70-130			
Vinyl chloride	25.5	5.0	0.30	ug/l	25.0	ND	102	45-140			
o-Xylene	26.4	2.0	0.30	ug/l	25.0	1.4	100	65-125			
m,p-Xylenes	52.7	2.0	0.60	ug/l	50.0	3.4	99	65-130			
Xylenes, Total	79.0	4.0	0.90	ug/l	75.0	4.8	99	60-130			
Di-isopropyl Ether (DIPE)	28.0	5.0	0.25	ug/l	25.0	ND	112	60-140			
Ethyl tert-Butyl Ether (ETBE)	27.6	5.0	0.28	ug/l	25.0	ND	110	60-135			
tert-Amyl Methyl Ether (TAME)	28.3	5.0	0.33	ug/l	25.0	ND	113	60-140			
Methyl-tert-butyl Ether (MTBE)	28.2	5.0	0.32	ug/l	25.0	ND	113	55-145			
tert-Butanol (TBA)	134	50	3.1	ug/l	125	ND	107	65-140			
Ethanol	229	150	100	ug/l	250	ND	92	40-155			
Surrogate: Dibromofluoromethane	*26.6*			*ug/l*	*25.0*		*106*	*80-120*			
Surrogate: Toluene-d8	*25.4*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*24.9*			*ug/l*	*25.0*		*100*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
Matrix Spike Dup Analyzed: 02/21/2007 (7B21023-MSD1)						**Source: IQB1770-06**					
Benzene	24.9	2.0	0.28	ug/l	25.0	0.40	98	65-125	3	20	
Bromobenzene	26.3	5.0	0.27	ug/l	25.0	ND	105	70-125	4	20	
Bromochloromethane	28.0	5.0	0.32	ug/l	25.0	ND	112	65-135	6	25	
Bromodichloromethane	27.4	2.0	0.30	ug/l	25.0	ND	110	70-135	4	20	
Bromoform	24.9	5.0	0.40	ug/l	25.0	ND	100	55-135	5	25	
Bromomethane	27.1	5.0	0.42	ug/l	25.0	ND	108	55-145	3	25	
n-Butylbenzene	25.7	5.0	0.37	ug/l	25.0	ND	103	65-135	3	20	
sec-Butylbenzene	25.7	5.0	0.25	ug/l	25.0	ND	103	70-125	5	20	
tert-Butylbenzene	26.0	5.0	0.22	ug/l	25.0	ND	104	65-130	5	20	
Carbon tetrachloride	27.0	5.0	0.28	ug/l	25.0	ND	108	65-140	7	25	
Chlorobenzene	24.9	2.0	0.36	ug/l	25.0	ND	100	75-125	4	20	
Chloroethane	26.0	5.0	0.40	ug/l	25.0	ND	104	55-140	0	25	
Chloroform	26.0	2.0	0.33	ug/l	25.0	ND	104	65-135	4	20	
Chloromethane	24.7	5.0	0.40	ug/l	25.0	ND	99	45-145	4	25	
2-Chlorotoluene	25.8	5.0	0.28	ug/l	25.0	ND	103	65-135	4	20	
4-Chlorotoluene	26.2	5.0	0.29	ug/l	25.0	ND	105	70-135	5	20	
Dibromochloromethane	26.3	2.0	0.28	ug/l	25.0	ND	105	65-140	5	25	
1,2-Dibromo-3-chloropropane	28.5	5.0	0.97	ug/l	25.0	ND	114	45-145	10	30	
1,2-Dibromoethane (EDB)	28.4	2.0	0.40	ug/l	25.0	ND	114	70-130	5	25	
Dibromomethane	27.4	2.0	0.36	ug/l	25.0	ND	110	65-135	4	25	
1,2-Dichlorobenzene	26.4	2.0	0.32	ug/l	25.0	ND	106	75-125	3	20	
1,3-Dichlorobenzene	26.0	2.0	0.35	ug/l	25.0	ND	104	75-125	4	20	
1,4-Dichlorobenzene	25.5	2.0	0.37	ug/l	25.0	ND	102	75-125	4	20	
Dichlorodifluoromethane	26.3	5.0	0.79	ug/l	25.0	ND	105	25-155	2	30	
1,1-Dichloroethane	26.2	2.0	0.27	ug/l	25.0	ND	105	65-130	5	20	
1,2-Dichloroethane	25.6	2.0	0.28	ug/l	25.0	ND	102	60-140	4	20	
1,1-Dichloroethene	20.2	5.0	0.42	ug/l	25.0	ND	81	60-130	6	20	
cis-1,2-Dichloroethene	27.6	2.0	0.32	ug/l	25.0	ND	110	65-130	5	20	
trans-1,2-Dichloroethene	27.6	2.0	0.27	ug/l	25.0	ND	110	65-130	6	20	
1,2-Dichloropropane	26.6	2.0	0.35	ug/l	25.0	ND	106	65-130	3	20	
1,3-Dichloropropane	27.4	2.0	0.32	ug/l	25.0	ND	110	65-135	3	25	
2,2-Dichloropropane	26.0	2.0	0.34	ug/l	25.0	ND	104	60-145	5	25	
1,1-Dichloropropene	25.2	2.0	0.28	ug/l	25.0	ND	101	70-135	4	20	
cis-1,3-Dichloropropene	26.2	2.0	0.22	ug/l	25.0	ND	105	70-130	4	20	
trans-1,3-Dichloropropene	27.0	2.0	0.32	ug/l	25.0	ND	108	65-135	5	25	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21023 Extracted: 02/21/07											
Matrix Spike Dup Analyzed: 02/21/2007 (7B21023-MSD1)						**Source: IQB1770-06**					
Ethylbenzene	26.8	2.0	0.25	ug/l	25.0	0.90	104	65-130	4	20	
Hexachlorobutadiene	22.2	5.0	0.38	ug/l	25.0	ND	89	60-135	1	20	
Isopropylbenzene	29.7	2.0	0.25	ug/l	25.0	ND	119	70-135	6	20	
p-Isopropyltoluene	25.8	2.0	0.28	ug/l	25.0	ND	103	65-130	4	20	
Methylene chloride	25.4	5.0	0.95	ug/l	25.0	1.4	96	50-135	3	20	
Naphthalene	29.6	5.0	0.41	ug/l	25.0	ND	118	50-140	6	30	
n-Propylbenzene	27.0	2.0	0.27	ug/l	25.0	ND	108	70-135	4	20	
Styrene	19.7	2.0	0.16	ug/l	25.0	ND	79	50-145	10	30	
1,1,1,2-Tetrachloroethane	28.8	5.0	0.27	ug/l	25.0	ND	115	65-140	4	20	
1,1,2,2-Tetrachloroethane	30.1	2.0	0.24	ug/l	25.0	ND	120	55-135	8	30	
Tetrachloroethene	23.9	2.0	0.32	ug/l	25.0	ND	96	65-130	3	20	
Toluene	28.0	2.0	0.36	ug/l	25.0	2.8	101	70-125	3	20	
1,2,3-Trichlorobenzene	26.1	5.0	0.30	ug/l	25.0	ND	104	60-135	1	20	
1,2,4-Trichlorobenzene	25.3	5.0	0.48	ug/l	25.0	ND	101	65-135	0	20	
1,1,1-Trichloroethane	27.3	2.0	0.30	ug/l	25.0	ND	109	65-140	7	20	
1,1,2-Trichloroethane	27.6	2.0	0.30	ug/l	25.0	ND	110	65-130	2	25	
Trichloroethene	25.0	2.0	0.26	ug/l	25.0	ND	100	65-125	5	20	
Trichlorofluoromethane	24.6	5.0	0.34	ug/l	25.0	ND	98	60-145	5	25	
1,2,3-Trichloropropane	22.5	10	0.40	ug/l	25.0	ND	90	55-135	7	30	
1,2,4-Trimethylbenzene	28.1	2.0	0.23	ug/l	25.0	1.4	107	55-135	4	25	
1,3,5-Trimethylbenzene	27.0	2.0	0.26	ug/l	25.0	0.36	107	70-130	4	20	
Vinyl chloride	26.8	5.0	0.30	ug/l	25.0	ND	107	45-140	5	30	
o-Xylene	27.1	2.0	0.30	ug/l	25.0	1.4	103	65-125	3	20	
m,p-Xylenes	54.1	2.0	0.60	ug/l	50.0	3.4	101	65-130	3	25	
Xylenes, Total	81.2	4.0	0.90	ug/l	75.0	4.8	102	60-130	3	20	
Di-isopropyl Ether (DIPE)	29.1	5.0	0.25	ug/l	25.0	ND	116	60-140	4	25	
Ethyl tert-Butyl Ether (ETBE)	29.2	5.0	0.28	ug/l	25.0	ND	117	60-135	6	25	
tert-Amyl Methyl Ether (TAME)	30.0	5.0	0.33	ug/l	25.0	ND	120	60-140	6	30	
Methyl-tert-butyl Ether (MTBE)	30.1	5.0	0.32	ug/l	25.0	ND	120	55-145	7	25	
tert-Butanol (TBA)	139	50	3.1	ug/l	125	ND	111	65-140	4	25	
Ethanol	228	150	100	ug/l	250	ND	91	40-155	0	30	
Surrogate: Dibromofluoromethane	*27.0*			*ug/l*	*25.0*		*108*	*80-120*			
Surrogate: Toluene-d8	*25.5*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.0*			*ug/l*	*25.0*		*100*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B21024 Extracted: 02/21/07											
Blank Analyzed: 02/21/2007 (7B21024-BLK1)											
Benzene	ND	2.0	0.28	ug/l							
Surrogate: Dibromofluoromethane	*26.6*			*ug/l*	*25.0*		*106*	*80-120*			
Surrogate: Toluene-d8	*25.7*			*ug/l*	*25.0*		*103*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*24.8*			*ug/l*	*25.0*		*99*	*80-120*			
LCS Analyzed: 02/21/2007 (7B21024-BS1)											
Benzene	24.9	2.0	0.28	ug/l	25.0		100	70-120			
Surrogate: Dibromofluoromethane	*24.8*			*ug/l*	*25.0*		*99*	*80-120*			
Surrogate: Toluene-d8	*25.3*			*ug/l*	*25.0*		*101*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*27.2*			*ug/l*	*25.0*		*109*	*80-120*			
Matrix Spike Analyzed: 02/21/2007 (7B21024-MS1)						**Source: IQB1482-01**					
Benzene	25.8	2.0	0.28	ug/l	25.0	ND	103	65-125			
Surrogate: Dibromofluoromethane	*27.5*			*ug/l*	*25.0*		*110*	*80-120*			
Surrogate: Toluene-d8	*25.6*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*27.7*			*ug/l*	*25.0*		*111*	*80-120*			
Matrix Spike Dup Analyzed: 02/21/2007 (7B21024-MSD1)						**Source: IQB1482-01**					
Benzene	25.6	2.0	0.28	ug/l	25.0	ND	102	65-125	1	20	
Surrogate: Dibromofluoromethane	*27.8*			*ug/l*	*25.0*		*111*	*80-120*			
Surrogate: Toluene-d8	*25.6*			*ug/l*	*25.0*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*27.9*			*ug/l*	*25.0*		*112*	*80-120*			
Batch: 7B22013 Extracted: 02/22/07											
Blank Analyzed: 02/22/2007 (7B22013-BLK1)											
Benzene	ND	2.0	0.28	ug/l							
Methyl-tert-butyl Ether (MTBE)	ND	5.0	0.32	ug/l							
Surrogate: Dibromofluoromethane	*26.4*			*ug/l*	*25.0*		*106*	*80-120*			
Surrogate: Toluene-d8	*25.8*			*ug/l*	*25.0*		*103*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*21.5*			*ug/l*	*25.0*		*86*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B22013 Extracted: 02/22/07											
LCS Analyzed: 02/22/2007 (7B22013-BS1)											
Benzene	25.1	2.0	0.28	ug/l	25.0		100	70-120			
Methyl-tert-butyl Ether (MTBE)	28.4	5.0	0.32	ug/l	25.0		114	60-135			
Surrogate: Dibromofluoromethane	*27.4*			*ug/l*	*25.0*		*110*	*80-120*			
Surrogate: Toluene-d8	*27.2*			*ug/l*	*25.0*		*109*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*24.1*			*ug/l*	*25.0*		*96*	*80-120*			
Matrix Spike Analyzed: 02/22/2007 (7B22013-MS1)						**Source: IQB1708-01**					
Benzene	26.2	2.0	0.28	ug/l	25.0	0.68	102	65-125			
Methyl-tert-butyl Ether (MTBE)	31.3	5.0	0.32	ug/l	25.0	0.47	123	55-145			
Surrogate: Dibromofluoromethane	*27.7*			*ug/l*	*25.0*		*111*	*80-120*			
Surrogate: Toluene-d8	*26.2*			*ug/l*	*25.0*		*105*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*24.5*			*ug/l*	*25.0*		*98*	*80-120*			
Matrix Spike Dup Analyzed: 02/22/2007 (7B22013-MSD1)						**Source: IQB1708-01**					
Benzene	25.9	2.0	0.28	ug/l	25.0	0.68	101	65-125	1	20	
Methyl-tert-butyl Ether (MTBE)	29.7	5.0	0.32	ug/l	25.0	0.47	117	55-145	5	25	
Surrogate: Dibromofluoromethane	*26.7*			*ug/l*	*25.0*		*107*	*80-120*			
Surrogate: Toluene-d8	*26.0*			*ug/l*	*25.0*		*104*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.4*			*ug/l*	*25.0*		*102*	*80-120*			
Batch: 7B23011 Extracted: 02/23/07											
Blank Analyzed: 02/23/2007 (7B23011-BLK1)											
Benzene	ND	2.0	0.28	ug/l							
Bromobenzene	ND	5.0	0.27	ug/l							
Bromochloromethane	ND	5.0	0.32	ug/l							
Bromodichloromethane	ND	2.0	0.30	ug/l							
Bromoform	ND	5.0	0.40	ug/l							
Bromomethane	ND	5.0	0.42	ug/l							
n-Butylbenzene	ND	5.0	0.37	ug/l							
sec-Butylbenzene	ND	5.0	0.25	ug/l							
tert-Butylbenzene	ND	5.0	0.22	ug/l							
Carbon tetrachloride	ND	5.0	0.28	ug/l							
Chlorobenzene	ND	2.0	0.36	ug/l							
Chloroethane	ND	5.0	0.40	ug/l							
Chloroform	ND	2.0	0.33	ug/l							

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
Blank Analyzed: 02/23/2007 (7B23011-BLK1)											
Chloromethane	ND	5.0	0.40	ug/l							
2-Chlorotoluene	ND	5.0	0.28	ug/l							
4-Chlorotoluene	ND	5.0	0.29	ug/l							
Dibromochloromethane	ND	2.0	0.28	ug/l							
1,2-Dibromo-3-chloropropane	ND	5.0	0.97	ug/l							
1,2-Dibromoethane (EDB)	ND	2.0	0.40	ug/l							
Dibromomethane	ND	2.0	0.36	ug/l							
1,2-Dichlorobenzene	ND	2.0	0.32	ug/l							
1,3-Dichlorobenzene	ND	2.0	0.35	ug/l							
1,4-Dichlorobenzene	ND	2.0	0.37	ug/l							
Dichlorodifluoromethane	ND	5.0	0.79	ug/l							
1,1-Dichloroethane	ND	2.0	0.27	ug/l							
1,2-Dichloroethane	ND	2.0	0.28	ug/l							
1,1-Dichloroethene	ND	5.0	0.42	ug/l							
cis-1,2-Dichloroethene	ND	2.0	0.32	ug/l							
trans-1,2-Dichloroethene	ND	2.0	0.27	ug/l							
1,2-Dichloropropane	ND	2.0	0.35	ug/l							
1,3-Dichloropropane	ND	2.0	0.32	ug/l							
2,2-Dichloropropane	ND	2.0	0.34	ug/l							
1,1-Dichloropropene	ND	2.0	0.28	ug/l							
cis-1,3-Dichloropropene	ND	2.0	0.22	ug/l							
trans-1,3-Dichloropropene	ND	2.0	0.32	ug/l							
Ethylbenzene	ND	2.0	0.25	ug/l							
Hexachlorobutadiene	ND	5.0	0.38	ug/l							
Isopropylbenzene	ND	2.0	0.25	ug/l							
p-Isopropyltoluene	ND	2.0	0.28	ug/l							
Methylene chloride	ND	5.0	0.95	ug/l							
Naphthalene	ND	5.0	0.41	ug/l							
n-Propylbenzene	ND	2.0	0.27	ug/l							
Styrene	ND	2.0	0.16	ug/l							
1,1,1,2-Tetrachloroethane	ND	5.0	0.27	ug/l							
1,1,2,2-Tetrachloroethane	ND	2.0	0.24	ug/l							
Tetrachloroethene	ND	2.0	0.32	ug/l							
Toluene	ND	2.0	0.36	ug/l							
1,2,3-Trichlorobenzene	ND	5.0	0.30	ug/l							

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
Blank Analyzed: 02/23/2007 (7B23011-BLK1)											
1,2,4-Trichlorobenzene	ND	5.0	0.48	ug/l							
1,1,1-Trichloroethane	ND	2.0	0.30	ug/l							
1,1,2-Trichloroethane	ND	2.0	0.30	ug/l							
Trichloroethene	ND	2.0	0.26	ug/l							
Trichlorofluoromethane	ND	5.0	0.34	ug/l							
1,2,3-Trichloropropane	ND	10	0.40	ug/l							
1,2,4-Trimethylbenzene	ND	2.0	0.23	ug/l							
1,3,5-Trimethylbenzene	ND	2.0	0.26	ug/l							
Vinyl chloride	ND	5.0	0.30	ug/l							
o-Xylene	ND	2.0	0.30	ug/l							
m,p-Xylenes	ND	2.0	0.60	ug/l							
Xylenes, Total	ND	4.0	0.90	ug/l							
Di-isopropyl Ether (DIPE)	ND	5.0	0.25	ug/l							
Ethyl tert-Butyl Ether (ETBE)	ND	5.0	0.28	ug/l							
tert-Amyl Methyl Ether (TAME)	ND	5.0	0.33	ug/l							
Methyl-tert-butyl Ether (MTBE)	ND	5.0	0.32	ug/l							
tert-Butanol (TBA)	ND	50	3.1	ug/l							
Ethanol	ND	150	100	ug/l							
Surrogate: Dibromofluoromethane	*22.8*			*ug/l*	*25.0*		*91*	*80-120*			
Surrogate: Toluene-d8	*24.2*			*ug/l*	*25.0*		*97*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*23.8*			*ug/l*	*25.0*		*95*	*80-120*			
LCS Analyzed: 02/23/2007 (7B23011-BS1)											
Benzene	21.4	2.0	0.28	ug/l	25.0		86	70-120			
Bromobenzene	23.2	5.0	0.27	ug/l	25.0		93	75-120			
Bromochloromethane	22.6	5.0	0.32	ug/l	25.0		90	70-130			
Bromodichloromethane	24.8	2.0	0.30	ug/l	25.0		99	70-135			
Bromoform	25.0	5.0	0.40	ug/l	25.0		100	55-130			
Bromomethane	24.3	5.0	0.42	ug/l	25.0		97	65-140			
n-Butylbenzene	22.1	5.0	0.37	ug/l	25.0		88	70-130			
sec-Butylbenzene	21.6	5.0	0.25	ug/l	25.0		86	70-125			
tert-Butylbenzene	22.0	5.0	0.22	ug/l	25.0		88	70-125			
Carbon tetrachloride	24.9	5.0	0.28	ug/l	25.0		100	65-140			
Chlorobenzene	24.0	2.0	0.36	ug/l	25.0		96	75-120			
Chloroethane	20.0	5.0	0.40	ug/l	25.0		80	60-140			
Chloroform	20.9	2.0	0.33	ug/l	25.0		84	70-130			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
LCS Analyzed: 02/23/2007 (7B23011-BS1)											
Chloromethane	19.2	5.0	0.40	ug/l	25.0		77	50-140			
2-Chlorotoluene	21.4	5.0	0.28	ug/l	25.0		86	70-125			
4-Chlorotoluene	21.8	5.0	0.29	ug/l	25.0		87	75-125			
Dibromochloromethane	24.4	2.0	0.28	ug/l	25.0		98	70-140			
1,2-Dibromo-3-chloropropane	19.9	5.0	0.97	ug/l	25.0		80	50-135			
1,2-Dibromoethane (EDB)	23.0	2.0	0.40	ug/l	25.0		92	75-125			
Dibromomethane	22.3	2.0	0.36	ug/l	25.0		89	70-125			
1,2-Dichlorobenzene	23.8	2.0	0.32	ug/l	25.0		95	75-120			
1,3-Dichlorobenzene	24.1	2.0	0.35	ug/l	25.0		96	75-120			
1,4-Dichlorobenzene	23.6	2.0	0.37	ug/l	25.0		94	75-120			
Dichlorodifluoromethane	23.9	5.0	0.79	ug/l	25.0		96	35-155			
1,1-Dichloroethane	19.7	2.0	0.27	ug/l	25.0		79	70-125			
1,2-Dichloroethane	21.0	2.0	0.28	ug/l	25.0		84	60-140			
1,1-Dichloroethene	19.3	5.0	0.42	ug/l	25.0		77	70-125			
cis-1,2-Dichloroethene	22.3	2.0	0.32	ug/l	25.0		89	70-125			
trans-1,2-Dichloroethene	21.8	2.0	0.27	ug/l	25.0		87	70-125			
1,2-Dichloropropane	22.5	2.0	0.35	ug/l	25.0		90	70-125			
1,3-Dichloropropane	21.4	2.0	0.32	ug/l	25.0		86	70-120			
2,2-Dichloropropane	22.4	2.0	0.34	ug/l	25.0		90	65-140			
1,1-Dichloropropene	21.7	2.0	0.28	ug/l	25.0		87	75-130			
cis-1,3-Dichloropropene	22.4	2.0	0.22	ug/l	25.0		90	75-125			
trans-1,3-Dichloropropene	23.4	2.0	0.32	ug/l	25.0		94	70-125			
Ethylbenzene	23.4	2.0	0.25	ug/l	25.0		94	75-125			
Hexachlorobutadiene	26.2	5.0	0.38	ug/l	25.0		105	65-135			
Isopropylbenzene	24.4	2.0	0.25	ug/l	25.0		98	75-130			
p-Isopropyltoluene	22.7	2.0	0.28	ug/l	25.0		91	75-125			
Methylene chloride	20.1	5.0	0.95	ug/l	25.0		80	55-130			
Naphthalene	24.1	5.0	0.41	ug/l	25.0		96	55-135			
n-Propylbenzene	21.6	2.0	0.27	ug/l	25.0		86	75-130			
Styrene	25.1	2.0	0.16	ug/l	25.0		100	75-130			
1,1,1,2-Tetrachloroethane	25.0	5.0	0.27	ug/l	25.0		100	70-130			
1,1,2,2-Tetrachloroethane	20.4	2.0	0.24	ug/l	25.0		82	55-130			
Tetrachloroethene	24.4	2.0	0.32	ug/l	25.0		98	70-125			
Toluene	22.4	2.0	0.36	ug/l	25.0		90	70-120			
1,2,3-Trichlorobenzene	26.1	5.0	0.30	ug/l	25.0		104	65-125			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
LCS Analyzed: 02/23/2007 (7B23011-BS1)											
1,2,4-Trichlorobenzene	26.8	5.0	0.48	ug/l	25.0		107	70-135			
1,1,1-Trichloroethane	23.3	2.0	0.30	ug/l	25.0		93	65-135			
1,1,2-Trichloroethane	23.2	2.0	0.30	ug/l	25.0		93	70-125			
Trichloroethene	24.4	2.0	0.26	ug/l	25.0		98	70-125			
Trichlorofluoromethane	24.8	5.0	0.34	ug/l	25.0		99	65-145			
1,2,3-Trichloropropane	18.9	10	0.40	ug/l	25.0		76	60-130			
1,2,4-Trimethylbenzene	22.8	2.0	0.23	ug/l	25.0		91	75-125			
1,3,5-Trimethylbenzene	23.0	2.0	0.26	ug/l	25.0		92	75-125			
Vinyl chloride	21.8	5.0	0.30	ug/l	25.0		87	55-135			
o-Xylene	23.5	2.0	0.30	ug/l	25.0		94	75-125			
m,p-Xylenes	47.3	2.0	0.60	ug/l	50.0		95	75-125			
Xylenes, Total	70.8	4.0	0.90	ug/l	75.0		94	70-125			
Di-isopropyl Ether (DIPE)	21.7	5.0	0.25	ug/l	25.0		87	60-135			
Ethyl tert-Butyl Ether (ETBE)	21.1	5.0	0.28	ug/l	25.0		84	65-135			
tert-Amyl Methyl Ether (TAME)	20.7	5.0	0.33	ug/l	25.0		83	60-135			
Methyl-tert-butyl Ether (MTBE)	20.7	5.0	0.32	ug/l	25.0		83	60-135			
tert-Butanol (TBA)	145	50	3.1	ug/l	125		116	70-135			
Ethanol	184	150	100	ug/l	250		74	40-155			
Surrogate: Dibromofluoromethane	*23.4*			*ug/l*	*25.0*		*94*	*80-120*			
Surrogate: Toluene-d8	*24.5*			*ug/l*	*25.0*		*98*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*24.8*			*ug/l*	*25.0*		*99*	*80-120*			
Matrix Spike Analyzed: 02/23/2007 (7B23011-MS1)						**Source: IQB2344-02RE1**					
Benzene	21.2	2.0	0.28	ug/l	25.0	ND	85	65-125			
Bromobenzene	23.1	5.0	0.27	ug/l	25.0	ND	92	70-125			
Bromochloromethane	22.7	5.0	0.32	ug/l	25.0	ND	91	65-135			
Bromodichloromethane	24.6	2.0	0.30	ug/l	25.0	ND	98	70-135			
Bromoform	25.1	5.0	0.40	ug/l	25.0	ND	100	55-135			
Bromomethane	23.7	5.0	0.42	ug/l	25.0	ND	95	55-145			
n-Butylbenzene	21.9	5.0	0.37	ug/l	25.0	ND	88	65-135			
sec-Butylbenzene	21.4	5.0	0.25	ug/l	25.0	ND	86	70-125			
tert-Butylbenzene	21.8	5.0	0.22	ug/l	25.0	ND	87	65-130			
Carbon tetrachloride	24.8	5.0	0.28	ug/l	25.0	ND	99	65-140			
Chlorobenzene	127	2.0	0.36	ug/l	25.0	110	68	75-125			*BB*
Chloroethane	20.6	5.0	0.40	ug/l	25.0	ND	82	55-140			
Chloroform	21.4	2.0	0.33	ug/l	25.0	ND	86	65-135			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
Matrix Spike Analyzed: 02/23/2007 (7B23011-MS1)						**Source: IQB2344-02RE1**					
Chloromethane	19.4	5.0	0.40	ug/l	25.0	ND	78	45-145			
2-Chlorotoluene	21.1	5.0	0.28	ug/l	25.0	ND	84	65-135			
4-Chlorotoluene	21.8	5.0	0.29	ug/l	25.0	ND	87	70-135			
Dibromochloromethane	24.5	2.0	0.28	ug/l	25.0	ND	98	65-140			
1,2-Dibromo-3-chloropropane	20.0	5.0	0.97	ug/l	25.0	ND	80	45-145			
1,2-Dibromoethane (EDB)	23.0	2.0	0.40	ug/l	25.0	ND	92	70-130			
Dibromomethane	22.1	2.0	0.36	ug/l	25.0	ND	88	65-135			
1,2-Dichlorobenzene	23.6	2.0	0.32	ug/l	25.0	ND	94	75-125			
1,3-Dichlorobenzene	23.7	2.0	0.35	ug/l	25.0	ND	95	75-125			
1,4-Dichlorobenzene	24.1	2.0	0.37	ug/l	25.0	ND	96	75-125			
Dichlorodifluoromethane	23.9	5.0	0.79	ug/l	25.0	ND	96	25-155			
1,1-Dichloroethane	19.9	2.0	0.27	ug/l	25.0	ND	80	65-130			
1,2-Dichloroethane	21.0	2.0	0.28	ug/l	25.0	ND	84	60-140			
1,1-Dichloroethene	19.3	5.0	0.42	ug/l	25.0	ND	77	60-130			
cis-1,2-Dichloroethene	22.3	2.0	0.32	ug/l	25.0	ND	89	65-130			
trans-1,2-Dichloroethene	21.7	2.0	0.27	ug/l	25.0	ND	87	65-130			
1,2-Dichloropropane	22.6	2.0	0.35	ug/l	25.0	ND	90	65-130			
1,3-Dichloropropane	21.7	2.0	0.32	ug/l	25.0	ND	87	65-135			
2,2-Dichloropropane	22.7	2.0	0.34	ug/l	25.0	ND	91	60-145			
1,1-Dichloropropene	21.3	2.0	0.28	ug/l	25.0	ND	85	70-135			
cis-1,3-Dichloropropene	21.9	2.0	0.22	ug/l	25.0	ND	88	70-130			
trans-1,3-Dichloropropene	22.8	2.0	0.32	ug/l	25.0	ND	91	65-135			
Ethylbenzene	23.5	2.0	0.25	ug/l	25.0	ND	94	65-130			
Hexachlorobutadiene	26.2	5.0	0.38	ug/l	25.0	ND	105	60-135			
Isopropylbenzene	24.3	2.0	0.25	ug/l	25.0	ND	97	70-135			
p-Isopropyltoluene	22.6	2.0	0.28	ug/l	25.0	ND	90	65-130			
Methylene chloride	19.9	5.0	0.95	ug/l	25.0	ND	80	50-135			
Naphthalene	23.8	5.0	0.41	ug/l	25.0	ND	95	50-140			
n-Propylbenzene	21.5	2.0	0.27	ug/l	25.0	ND	86	70-135			
Styrene	24.9	2.0	0.16	ug/l	25.0	ND	100	50-145			
1,1,1,2-Tetrachloroethane	25.1	5.0	0.27	ug/l	25.0	ND	100	65-140			
1,1,2,2-Tetrachloroethane	20.0	2.0	0.24	ug/l	25.0	ND	80	55-135			
Tetrachloroethene	25.0	2.0	0.32	ug/l	25.0	ND	100	65-130			
Toluene	21.9	2.0	0.36	ug/l	25.0	ND	88	70-125			
1,2,3-Trichlorobenzene	25.8	5.0	0.30	ug/l	25.0	ND	103	60-135			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
Matrix Spike Analyzed: 02/23/2007 (7B23011-MS1)					**Source: IQB2344-02RE1**						
1,2,4-Trichlorobenzene	26.5	5.0	0.48	ug/l	25.0	ND	106	65-135			
1,1,1-Trichloroethane	23.6	2.0	0.30	ug/l	25.0	ND	94	65-140			
1,1,2-Trichloroethane	22.3	2.0	0.30	ug/l	25.0	ND	89	65-130			
Trichloroethene	24.2	2.0	0.26	ug/l	25.0	ND	97	65-125			
Trichlorofluoromethane	25.5	5.0	0.34	ug/l	25.0	ND	102	60-145			
1,2,3-Trichloropropane	18.5	10	0.40	ug/l	25.0	ND	74	55-135			
1,2,4-Trimethylbenzene	22.5	2.0	0.23	ug/l	25.0	ND	90	55-135			
1,3,5-Trimethylbenzene	22.8	2.0	0.26	ug/l	25.0	ND	91	70-130			
Vinyl chloride	22.9	5.0	0.30	ug/l	25.0	ND	92	45-140			
o-Xylene	23.6	2.0	0.30	ug/l	25.0	ND	94	65-125			
m,p-Xylenes	48.0	2.0	0.60	ug/l	50.0	ND	96	65-130			
Xylenes, Total	71.6	4.0	0.90	ug/l	75.0	ND	95	60-130			
Di-isopropyl Ether (DIPE)	21.7	5.0	0.25	ug/l	25.0	ND	87	60-140			
Ethyl tert-Butyl Ether (ETBE)	20.8	5.0	0.28	ug/l	25.0	ND	83	60-135			
tert-Amyl Methyl Ether (TAME)	20.3	5.0	0.33	ug/l	25.0	ND	81	60-140			
Methyl-tert-butyl Ether (MTBE)	20.3	5.0	0.32	ug/l	25.0	ND	81	55-145			
tert-Butanol (TBA)	146	50	3.1	ug/l	125	ND	117	65-140			
Ethanol	209	150	100	ug/l	250	ND	84	40-155			
Surrogate: Dibromofluoromethane	*23.4*			*ug/l*	*25.0*		*94*	*80-120*			
Surrogate: Toluene-d8	*24.1*			*ug/l*	*25.0*		*96*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.1*			*ug/l*	*25.0*		*100*	*80-120*			
Matrix Spike Dup Analyzed: 02/23/2007 (7B23011-MSD1)					**Source: IQB2344-02RE1**						
Benzene	21.4	2.0	0.28	ug/l	25.0	ND	86	65-125	1	20	
Bromobenzene	23.2	5.0	0.27	ug/l	25.0	ND	93	70-125	0	20	
Bromochloromethane	22.9	5.0	0.32	ug/l	25.0	ND	92	65-135	1	25	
Bromodichloromethane	24.7	2.0	0.30	ug/l	25.0	ND	99	70-135	0	20	
Bromoform	26.1	5.0	0.40	ug/l	25.0	ND	104	55-135	4	25	
Bromomethane	24.0	5.0	0.42	ug/l	25.0	ND	96	55-145	1	25	
n-Butylbenzene	21.9	5.0	0.37	ug/l	25.0	ND	88	65-135	0	20	
sec-Butylbenzene	21.3	5.0	0.25	ug/l	25.0	ND	85	70-125	1	20	
tert-Butylbenzene	21.7	5.0	0.22	ug/l	25.0	ND	87	65-130	1	20	
Carbon tetrachloride	24.8	5.0	0.28	ug/l	25.0	ND	99	65-140	0	25	
Chlorobenzene	127	2.0	0.36	ug/l	25.0	110	68	75-125	0	20	*BB*
Chloroethane	20.9	5.0	0.40	ug/l	25.0	ND	84	55-140	1	25	
Chloroform	21.7	2.0	0.33	ug/l	25.0	ND	87	65-135	1	20	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
Matrix Spike Dup Analyzed: 02/23/2007 (7B23011-MSD1)						**Source: IQB2344-02RE1**					
Chloromethane	19.5	5.0	0.40	ug/l	25.0	ND	78	45-145	1	25	
2-Chlorotoluene	21.1	5.0	0.28	ug/l	25.0	ND	84	65-135	0	20	
4-Chlorotoluene	21.8	5.0	0.29	ug/l	25.0	ND	87	70-135	0	20	
Dibromochloromethane	25.0	2.0	0.28	ug/l	25.0	ND	100	65-140	2	25	
1,2-Dibromo-3-chloropropane	21.0	5.0	0.97	ug/l	25.0	ND	84	45-145	5	30	
1,2-Dibromoethane (EDB)	23.5	2.0	0.40	ug/l	25.0	ND	94	70-130	2	25	
Dibromomethane	22.9	2.0	0.36	ug/l	25.0	ND	92	65-135	4	25	
1,2-Dichlorobenzene	24.0	2.0	0.32	ug/l	25.0	ND	96	75-125	2	20	
1,3-Dichlorobenzene	24.0	2.0	0.35	ug/l	25.0	ND	96	75-125	1	20	
1,4-Dichlorobenzene	24.0	2.0	0.37	ug/l	25.0	ND	96	75-125	0	20	
Dichlorodifluoromethane	23.8	5.0	0.79	ug/l	25.0	ND	95	25-155	0	30	
1,1-Dichloroethane	20.1	2.0	0.27	ug/l	25.0	ND	80	65-130	1	20	
1,2-Dichloroethane	21.6	2.0	0.28	ug/l	25.0	ND	86	60-140	3	20	
1,1-Dichloroethene	19.4	5.0	0.42	ug/l	25.0	ND	78	60-130	1	20	
cis-1,2-Dichloroethene	22.6	2.0	0.32	ug/l	25.0	ND	90	65-130	1	20	
trans-1,2-Dichloroethene	22.0	2.0	0.27	ug/l	25.0	ND	88	65-130	1	20	
1,2-Dichloropropane	22.8	2.0	0.35	ug/l	25.0	ND	91	65-130	1	20	
1,3-Dichloropropane	21.5	2.0	0.32	ug/l	25.0	ND	86	65-135	1	25	
2,2-Dichloropropane	22.6	2.0	0.34	ug/l	25.0	ND	90	60-145	0	25	
1,1-Dichloropropene	21.3	2.0	0.28	ug/l	25.0	ND	85	70-135	0	20	
cis-1,3-Dichloropropene	22.1	2.0	0.22	ug/l	25.0	ND	88	70-130	1	20	
trans-1,3-Dichloropropene	23.2	2.0	0.32	ug/l	25.0	ND	93	65-135	2	25	
Ethylbenzene	23.5	2.0	0.25	ug/l	25.0	ND	94	65-130	0	20	
Hexachlorobutadiene	26.0	5.0	0.38	ug/l	25.0	ND	104	60-135	1	20	
Isopropylbenzene	24.3	2.0	0.25	ug/l	25.0	ND	97	70-135	0	20	
p-Isopropyltoluene	22.5	2.0	0.28	ug/l	25.0	ND	90	65-130	0	20	
Methylene chloride	20.4	5.0	0.95	ug/l	25.0	ND	82	50-135	2	20	
Naphthalene	25.2	5.0	0.41	ug/l	25.0	ND	101	50-140	6	30	
n-Propylbenzene	21.6	2.0	0.27	ug/l	25.0	ND	86	70-135	1	20	
Styrene	24.6	2.0	0.16	ug/l	25.0	ND	98	50-145	1	30	
1,1,1,2-Tetrachloroethane	25.4	5.0	0.27	ug/l	25.0	ND	102	65-140	1	20	
1,1,2,2-Tetrachloroethane	20.8	2.0	0.24	ug/l	25.0	ND	83	55-135	4	30	
Tetrachloroethene	24.3	2.0	0.32	ug/l	25.0	ND	97	65-130	3	20	
Toluene	22.1	2.0	0.36	ug/l	25.0	ND	88	70-125	1	20	
1,2,3-Trichlorobenzene	26.7	5.0	0.30	ug/l	25.0	ND	107	60-135	3	20	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B23011 Extracted: 02/23/07											
Matrix Spike Dup Analyzed: 02/23/2007 (7B23011-MSD1)						**Source: IQB2344-02RE1**					
1,2,4-Trichlorobenzene	27.1	5.0	0.48	ug/l	25.0	ND	108	65-135	2	20	
1,1,1-Trichloroethane	23.8	2.0	0.30	ug/l	25.0	ND	95	65-140	1	20	
1,1,2-Trichloroethane	23.1	2.0	0.30	ug/l	25.0	ND	92	65-130	4	25	
Trichloroethene	24.1	2.0	0.26	ug/l	25.0	ND	96	65-125	0	20	
Trichlorofluoromethane	25.6	5.0	0.34	ug/l	25.0	ND	102	60-145	0	25	
1,2,3-Trichloropropane	19.3	10	0.40	ug/l	25.0	ND	77	55-135	4	30	
1,2,4-Trimethylbenzene	22.0	2.0	0.23	ug/l	25.0	ND	88	55-135	2	25	
1,3,5-Trimethylbenzene	22.6	2.0	0.26	ug/l	25.0	ND	90	70-130	1	20	
Vinyl chloride	22.6	5.0	0.30	ug/l	25.0	ND	90	45-140	1	30	
o-Xylene	23.6	2.0	0.30	ug/l	25.0	ND	94	65-125	0	20	
m,p-Xylenes	48.0	2.0	0.60	ug/l	50.0	ND	96	65-130	0	25	
Xylenes, Total	71.5	4.0	0.90	ug/l	75.0	ND	95	60-130	0	20	
Di-isopropyl Ether (DIPE)	21.9	5.0	0.25	ug/l	25.0	ND	88	60-140	1	25	
Ethyl tert-Butyl Ether (ETBE)	21.4	5.0	0.28	ug/l	25.0	ND	86	60-135	3	25	
tert-Amyl Methyl Ether (TAME)	21.2	5.0	0.33	ug/l	25.0	ND	85	60-140	4	30	
Methyl-tert-butyl Ether (MTBE)	21.3	5.0	0.32	ug/l	25.0	ND	85	55-145	5	25	
tert-Butanol (TBA)	143	50	3.1	ug/l	125	ND	114	65-140	2	25	
Ethanol	185	150	100	ug/l	250	ND	74	40-155	12	30	
Surrogate: Dibromofluoromethane	*23.9*			*ug/l*	*25.0*		*96*	*80-120*			
Surrogate: Toluene-d8	*24.3*			*ug/l*	*25.0*		*97*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*25.0*			*ug/l*	*25.0*		*100*	*80-120*			
Batch: 7B24016 Extracted: 02/24/07											
Blank Analyzed: 02/24/2007 (7B24016-BLK1)											
Benzene	ND	2.0	0.28	ug/l							
Bromobenzene	ND	5.0	0.27	ug/l							
Bromochloromethane	ND	5.0	0.32	ug/l							
Bromodichloromethane	ND	2.0	0.30	ug/l							
Bromoform	ND	5.0	0.40	ug/l							
Bromomethane	ND	5.0	0.42	ug/l							
n-Butylbenzene	ND	5.0	0.37	ug/l							
sec-Butylbenzene	ND	5.0	0.25	ug/l							
tert-Butylbenzene	ND	5.0	0.22	ug/l							
Carbon tetrachloride	ND	5.0	0.28	ug/l							
Chlorobenzene	ND	2.0	0.36	ug/l							

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
Blank Analyzed: 02/24/2007 (7B24016-BLK1)											
Chloroethane	ND	5.0	0.40	ug/l							
Chloroform	ND	2.0	0.33	ug/l							
Chloromethane	ND	5.0	0.40	ug/l							
2-Chlorotoluene	ND	5.0	0.28	ug/l							
4-Chlorotoluene	ND	5.0	0.29	ug/l							
Dibromochloromethane	ND	2.0	0.28	ug/l							
1,2-Dibromo-3-chloropropane	ND	5.0	0.97	ug/l							
1,2-Dibromoethane (EDB)	ND	2.0	0.40	ug/l							
Dibromomethane	ND	2.0	0.36	ug/l							
1,2-Dichlorobenzene	ND	2.0	0.32	ug/l							
1,3-Dichlorobenzene	ND	2.0	0.35	ug/l							
1,4-Dichlorobenzene	ND	2.0	0.37	ug/l							
Dichlorodifluoromethane	ND	5.0	0.79	ug/l							
1,1-Dichloroethane	ND	2.0	0.27	ug/l							
1,2-Dichloroethane	ND	2.0	0.28	ug/l							
1,1-Dichloroethene	ND	5.0	0.42	ug/l							
cis-1,2-Dichloroethene	ND	2.0	0.32	ug/l							
trans-1,2-Dichloroethene	ND	2.0	0.27	ug/l							
1,2-Dichloropropane	ND	2.0	0.35	ug/l							
1,3-Dichloropropane	ND	2.0	0.32	ug/l							
2,2-Dichloropropane	ND	2.0	0.34	ug/l							
1,1-Dichloropropene	ND	2.0	0.28	ug/l							
cis-1,3-Dichloropropene	ND	2.0	0.22	ug/l							
trans-1,3-Dichloropropene	ND	2.0	0.32	ug/l							
Ethylbenzene	ND	2.0	0.25	ug/l							
Hexachlorobutadiene	ND	5.0	0.38	ug/l							
Isopropylbenzene	ND	2.0	0.25	ug/l							
p-Isopropyltoluene	ND	2.0	0.28	ug/l							
Methylene chloride	ND	5.0	0.95	ug/l							
Naphthalene	ND	5.0	0.41	ug/l							
n-Propylbenzene	ND	2.0	0.27	ug/l							
Styrene	ND	2.0	0.16	ug/l							
1,1,1,2-Tetrachloroethane	ND	5.0	0.27	ug/l							
1,1,2,2-Tetrachloroethane	ND	2.0	0.24	ug/l							
Tetrachloroethene	ND	2.0	0.32	ug/l							

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
Blank Analyzed: 02/24/2007 (7B24016-BLK1)											
Toluene	ND	2.0	0.36	ug/l							
1,2,3-Trichlorobenzene	ND	5.0	0.30	ug/l							
1,2,4-Trichlorobenzene	ND	5.0	0.48	ug/l							
1,1,1-Trichloroethane	ND	2.0	0.30	ug/l							
1,1,2-Trichloroethane	ND	2.0	0.30	ug/l							
Trichloroethene	ND	2.0	0.26	ug/l							
Trichlorofluoromethane	ND	5.0	0.34	ug/l							
1,2,3-Trichloropropane	ND	10	0.40	ug/l							
1,2,4-Trimethylbenzene	ND	2.0	0.23	ug/l							
1,3,5-Trimethylbenzene	ND	2.0	0.26	ug/l							
Vinyl chloride	ND	5.0	0.30	ug/l							
o-Xylene	ND	2.0	0.30	ug/l							
m,p-Xylenes	ND	2.0	0.60	ug/l							
Xylenes, Total	ND	4.0	0.90	ug/l							
Di-isopropyl Ether (DIPE)	ND	5.0	0.25	ug/l							
Ethyl tert-Butyl Ether (ETBE)	ND	5.0	0.28	ug/l							
tert-Amyl Methyl Ether (TAME)	ND	5.0	0.33	ug/l							
Methyl-tert-butyl Ether (MTBE)	ND	5.0	0.32	ug/l							
tert-Butanol (TBA)	ND	50	3.1	ug/l							
Ethanol	ND	150	100	ug/l							
Surrogate: Dibromofluoromethane	*28.0*			*ug/l*	*25.0*		*112*	*80-120*			
Surrogate: Toluene-d8	*25.9*			*ug/l*	*25.0*		*104*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*24.6*			*ug/l*	*25.0*		*98*	*80-120*			
LCS Analyzed: 02/24/2007 (7B24016-BS1)											
Benzene	27.1	2.0	0.28	ug/l	25.0		108	70-120			
Bromobenzene	25.4	5.0	0.27	ug/l	25.0		102	75-120			
Bromochloromethane	27.4	5.0	0.32	ug/l	25.0		110	70-130			
Bromodichloromethane	26.4	2.0	0.30	ug/l	25.0		106	70-135			
Bromoform	25.8	5.0	0.40	ug/l	25.0		103	55-130			
Bromomethane	30.7	5.0	0.42	ug/l	25.0		123	65-140			
n-Butylbenzene	26.6	5.0	0.37	ug/l	25.0		106	70-130			
sec-Butylbenzene	27.1	5.0	0.25	ug/l	25.0		108	70-125			
tert-Butylbenzene	26.2	5.0	0.22	ug/l	25.0		105	70-125			
Carbon tetrachloride	23.8	5.0	0.28	ug/l	25.0		95	65-140			
Chlorobenzene	27.3	2.0	0.36	ug/l	25.0		109	75-120			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
LCS Analyzed: 02/24/2007 (7B24016-BS1)											
Chloroethane	29.9	5.0	0.40	ug/l	25.0		120	60-140			
Chloroform	27.6	2.0	0.33	ug/l	25.0		110	70-130			
Chloromethane	29.8	5.0	0.40	ug/l	25.0		119	50-140			
2-Chlorotoluene	28.8	5.0	0.28	ug/l	25.0		115	70-125			
4-Chlorotoluene	28.7	5.0	0.29	ug/l	25.0		115	75-125			
Dibromochloromethane	27.1	2.0	0.28	ug/l	25.0		108	70-140			
1,2-Dibromo-3-chloropropane	27.9	5.0	0.97	ug/l	25.0		112	50-135			
1,2-Dibromoethane (EDB)	27.3	2.0	0.40	ug/l	25.0		109	75-125			
Dibromomethane	26.5	2.0	0.36	ug/l	25.0		106	70-125			
1,2-Dichlorobenzene	26.4	2.0	0.32	ug/l	25.0		106	75-120			
1,3-Dichlorobenzene	27.1	2.0	0.35	ug/l	25.0		108	75-120			
1,4-Dichlorobenzene	26.7	2.0	0.37	ug/l	25.0		107	75-120			
Dichlorodifluoromethane	27.9	5.0	0.79	ug/l	25.0		112	35-155			
1,1-Dichloroethane	28.2	2.0	0.27	ug/l	25.0		113	70-125			
1,2-Dichloroethane	25.8	2.0	0.28	ug/l	25.0		103	60-140			
1,1-Dichloroethene	25.6	5.0	0.42	ug/l	25.0		102	70-125			
cis-1,2-Dichloroethene	29.1	2.0	0.32	ug/l	25.0		116	70-125			
trans-1,2-Dichloroethene	28.0	2.0	0.27	ug/l	25.0		112	70-125			
1,2-Dichloropropane	28.6	2.0	0.35	ug/l	25.0		114	70-125			
1,3-Dichloropropane	28.8	2.0	0.32	ug/l	25.0		115	70-120			
2,2-Dichloropropane	27.7	2.0	0.34	ug/l	25.0		111	65-140			
1,1-Dichloropropene	26.0	2.0	0.28	ug/l	25.0		104	75-130			
cis-1,3-Dichloropropene	25.1	2.0	0.22	ug/l	25.0		100	75-125			
trans-1,3-Dichloropropene	24.3	2.0	0.32	ug/l	25.0		97	70-125			
Ethylbenzene	28.1	2.0	0.25	ug/l	25.0		112	75-125			
Hexachlorobutadiene	22.1	5.0	0.38	ug/l	25.0		88	65-135			
Isopropylbenzene	31.1	2.0	0.25	ug/l	25.0		124	75-130			
p-Isopropyltoluene	26.6	2.0	0.28	ug/l	25.0		106	75-125			
Methylene chloride	28.0	5.0	0.95	ug/l	25.0		112	55-130			
Naphthalene	22.5	5.0	0.41	ug/l	25.0		90	55-135			
n-Propylbenzene	28.7	2.0	0.27	ug/l	25.0		115	75-130			
Styrene	27.9	2.0	0.16	ug/l	25.0		112	75-130			
1,1,1,2-Tetrachloroethane	26.2	5.0	0.27	ug/l	25.0		105	70-130			
1,1,2,2-Tetrachloroethane	32.7	2.0	0.24	ug/l	25.0		131	55-130			*LP*
Tetrachloroethene	24.7	2.0	0.32	ug/l	25.0		99	70-125			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
LCS Analyzed: 02/24/2007 (7B24016-BS1)											
Toluene	26.5	2.0	0.36	ug/l	25.0		106	70-120			
1,2,3-Trichlorobenzene	22.5	5.0	0.30	ug/l	25.0		90	65-125			
1,2,4-Trichlorobenzene	22.8	5.0	0.48	ug/l	25.0		91	70-135			
1,1,1-Trichloroethane	26.0	2.0	0.30	ug/l	25.0		104	65-135			
1,1,2-Trichloroethane	28.0	2.0	0.30	ug/l	25.0		112	70-125			
Trichloroethene	24.8	2.0	0.26	ug/l	25.0		99	70-125			
Trichlorofluoromethane	27.5	5.0	0.34	ug/l	25.0		110	65-145			
1,2,3-Trichloropropane	28.8	10	0.40	ug/l	25.0		115	60-130			
1,2,4-Trimethylbenzene	28.5	2.0	0.23	ug/l	25.0		114	75-125			
1,3,5-Trimethylbenzene	29.1	2.0	0.26	ug/l	25.0		116	75-125			
Vinyl chloride	27.6	5.0	0.30	ug/l	25.0		110	55-135			
o-Xylene	29.0	2.0	0.30	ug/l	25.0		116	75-125			
m,p-Xylenes	57.2	2.0	0.60	ug/l	50.0		114	75-125			
Xylenes, Total	86.2	4.0	0.90	ug/l	75.0		115	70-125			
Di-isopropyl Ether (DIPE)	31.1	5.0	0.25	ug/l	25.0		124	60-135			
Ethyl tert-Butyl Ether (ETBE)	27.4	5.0	0.28	ug/l	25.0		110	65-135			
tert-Amyl Methyl Ether (TAME)	28.3	5.0	0.33	ug/l	25.0		113	60-135			
Methyl-tert-butyl Ether (MTBE)	27.1	5.0	0.32	ug/l	25.0		108	60-135			
tert-Butanol (TBA)	154	50	3.1	ug/l	125		123	70-135			
Ethanol	335	150	100	ug/l	250		134	40-155			
Surrogate: Dibromofluoromethane	*28.4*			*ug/l*	*25.0*		*114*	*80-120*			
Surrogate: Toluene-d8	*25.9*			*ug/l*	*25.0*		*104*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*28.0*			*ug/l*	*25.0*		*112*	*80-120*			
Matrix Spike Analyzed: 02/24/2007 (7B24016-MS1)						**Source: IQB2033-07**					
Benzene	141	10	1.4	ug/l	125	ND	113	65-125			
Bromobenzene	132	25	1.4	ug/l	125	ND	106	70-125			
Bromochloromethane	141	25	1.6	ug/l	125	ND	113	65-135			
Bromodichloromethane	137	10	1.5	ug/l	125	ND	110	70-135			
Bromoform	138	25	2.0	ug/l	125	ND	110	55-135			
Bromomethane	162	25	2.1	ug/l	125	ND	130	55-145			
n-Butylbenzene	138	25	1.8	ug/l	125	ND	110	65-135			
sec-Butylbenzene	141	25	1.2	ug/l	125	ND	113	70-125			
tert-Butylbenzene	138	25	1.1	ug/l	125	ND	110	65-130			
Carbon tetrachloride	123	25	1.4	ug/l	125	ND	98	65-140			
Chlorobenzene	143	10	1.8	ug/l	125	ND	114	75-125			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
Matrix Spike Analyzed: 02/24/2007 (7B24016-MS1)					**Source: IQB2033-07**						
Chloroethane	154	25	2.0	ug/l	125	ND	123	55-140			
Chloroform	146	10	1.6	ug/l	125	ND	117	65-135			
Chloromethane	158	25	2.0	ug/l	125	ND	126	45-145			
2-Chlorotoluene	150	25	1.4	ug/l	125	ND	120	65-135			
4-Chlorotoluene	149	25	1.4	ug/l	125	ND	119	70-135			
Dibromochloromethane	145	10	1.4	ug/l	125	ND	116	65-140			
1,2-Dibromo-3-chloropropane	142	25	4.8	ug/l	125	ND	114	45-145			
1,2-Dibromoethane (EDB)	144	10	2.0	ug/l	125	ND	115	70-130			
Dibromomethane	142	10	1.8	ug/l	125	ND	114	65-135			
1,2-Dichlorobenzene	137	10	1.6	ug/l	125	ND	110	75-125			
1,3-Dichlorobenzene	142	10	1.8	ug/l	125	ND	114	75-125			
1,4-Dichlorobenzene	137	10	1.8	ug/l	125	ND	110	75-125			
Dichlorodifluoromethane	149	25	4.0	ug/l	125	ND	119	25-155			
1,1-Dichloroethane	152	10	1.4	ug/l	125	5.7	117	65-130			
1,2-Dichloroethane	136	10	1.4	ug/l	125	ND	109	60-140			
1,1-Dichloroethene	150	25	2.1	ug/l	125	17	106	60-130			
cis-1,2-Dichloroethene	219	10	1.6	ug/l	125	69	120	65-130			
trans-1,2-Dichloroethene	150	10	1.4	ug/l	125	3.3	117	65-130			
1,2-Dichloropropane	151	10	1.8	ug/l	125	ND	121	65-130			
1,3-Dichloropropane	156	10	1.6	ug/l	125	ND	125	65-135			
2,2-Dichloropropane	143	10	1.7	ug/l	125	ND	114	60-145			
1,1-Dichloropropene	136	10	1.4	ug/l	125	ND	109	70-135			
cis-1,3-Dichloropropene	129	10	1.1	ug/l	125	ND	103	70-130			
trans-1,3-Dichloropropene	127	10	1.6	ug/l	125	ND	102	65-135			
Ethylbenzene	147	10	1.2	ug/l	125	ND	118	65-130			
Hexachlorobutadiene	111	25	1.9	ug/l	125	ND	89	60-135			
Isopropylbenzene	162	10	1.2	ug/l	125	ND	130	70-135			
p-Isopropyltoluene	138	10	1.4	ug/l	125	ND	110	65-130			
Methylene chloride	148	25	4.8	ug/l	125	ND	118	50-135			
Naphthalene	114	25	2.0	ug/l	125	ND	91	50-140			
n-Propylbenzene	150	10	1.4	ug/l	125	ND	120	70-135			
Styrene	146	10	0.80	ug/l	125	ND	117	50-145			
1,1,1,2-Tetrachloroethane	137	25	1.4	ug/l	125	ND	110	65-140			
1,1,2,2-Tetrachloroethane	175	10	1.2	ug/l	125	ND	140	55-135			*LM*
Tetrachloroethene	128	10	1.6	ug/l	125	ND	102	65-130			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
Matrix Spike Analyzed: 02/24/2007 (7B24016-MS1)					**Source: IQB2033-07**						
Toluene	138	10	1.8	ug/l	125	ND	110	70-125			
1,2,3-Trichlorobenzene	114	25	1.5	ug/l	125	ND	91	60-135			
1,2,4-Trichlorobenzene	113	25	2.4	ug/l	125	ND	90	65-135			
1,1,1-Trichloroethane	135	10	1.5	ug/l	125	ND	108	65-140			
1,1,2-Trichloroethane	149	10	1.5	ug/l	125	ND	119	65-130			
Trichloroethene	590	10	1.3	ug/l	125	510	64	65-125			*BB*
Trichlorofluoromethane	142	25	1.7	ug/l	125	ND	114	60-145			
1,2,3-Trichloropropane	153	50	2.0	ug/l	125	ND	122	55-135			
1,2,4-Trimethylbenzene	149	10	1.2	ug/l	125	ND	119	55-135			
1,3,5-Trimethylbenzene	149	10	1.3	ug/l	125	ND	119	70-130			
Vinyl chloride	148	25	1.5	ug/l	125	ND	118	45-140			
o-Xylene	154	10	1.5	ug/l	125	ND	123	65-125			
m,p-Xylenes	297	10	3.0	ug/l	250	ND	119	65-130			
Xylenes, Total	451	20	4.5	ug/l	375	ND	120	60-130			
Di-isopropyl Ether (DIPE)	163	25	1.2	ug/l	125	ND	130	60-140			
Ethyl tert-Butyl Ether (ETBE)	143	25	1.4	ug/l	125	ND	114	60-135			
tert-Amyl Methyl Ether (TAME)	151	25	1.6	ug/l	125	ND	121	60-140			
Methyl-tert-butyl Ether (MTBE)	142	25	1.6	ug/l	125	ND	114	55-145			
tert-Butanol (TBA)	818	250	16	ug/l	625	ND	131	65-140			
Ethanol	1740	750	500	ug/l	1250	ND	139	40-155			
Surrogate: Dibromofluoromethane	*142*			*ug/l*	*125*		*114*	*80-120*			
Surrogate: Toluene-d8	*130*			*ug/l*	*125*		*104*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*142*			*ug/l*	*125*		*114*	*80-120*			
Matrix Spike Dup Analyzed: 02/24/2007 (7B24016-MSD1)					**Source: IQB2033-07**						
Benzene	139	10	1.4	ug/l	125	ND	111	65-125	1	20	
Bromobenzene	132	25	1.4	ug/l	125	ND	106	70-125	0	20	
Bromochloromethane	138	25	1.6	ug/l	125	ND	110	65-135	2	25	
Bromodichloromethane	134	10	1.5	ug/l	125	ND	107	70-135	2	20	
Bromoform	132	25	2.0	ug/l	125	ND	106	55-135	4	25	
Bromomethane	163	25	2.1	ug/l	125	ND	130	55-145	1	25	
n-Butylbenzene	138	25	1.8	ug/l	125	ND	110	65-135	0	20	
sec-Butylbenzene	143	25	1.2	ug/l	125	ND	114	70-125	1	20	
tert-Butylbenzene	138	25	1.1	ug/l	125	ND	110	65-130	0	20	
Carbon tetrachloride	122	25	1.4	ug/l	125	ND	98	65-140	1	25	
Chlorobenzene	140	10	1.8	ug/l	125	ND	112	75-125	2	20	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
Matrix Spike Dup Analyzed: 02/24/2007 (7B24016-MSD1)						**Source: IQB2033-07**					
Chloroethane	154	25	2.0	ug/l	125	ND	123	55-140	0	25	
Chloroform	141	10	1.6	ug/l	125	ND	113	65-135	3	20	
Chloromethane	161	25	2.0	ug/l	125	ND	129	45-145	2	25	
2-Chlorotoluene	151	25	1.4	ug/l	125	ND	121	65-135	1	20	
4-Chlorotoluene	149	25	1.4	ug/l	125	ND	119	70-135	0	20	
Dibromochloromethane	140	10	1.4	ug/l	125	ND	112	65-140	4	25	
1,2-Dibromo-3-chloropropane	138	25	4.8	ug/l	125	ND	110	45-145	3	30	
1,2-Dibromoethane (EDB)	140	10	2.0	ug/l	125	ND	112	70-130	3	25	
Dibromomethane	135	10	1.8	ug/l	125	ND	108	65-135	5	25	
1,2-Dichlorobenzene	136	10	1.6	ug/l	125	ND	109	75-125	1	20	
1,3-Dichlorobenzene	141	10	1.8	ug/l	125	ND	113	75-125	1	20	
1,4-Dichlorobenzene	136	10	1.8	ug/l	125	ND	109	75-125	1	20	
Dichlorodifluoromethane	148	25	4.0	ug/l	125	ND	118	25-155	1	30	
1,1-Dichloroethane	150	10	1.4	ug/l	125	5.7	115	65-130	1	20	
1,2-Dichloroethane	129	10	1.4	ug/l	125	ND	103	60-140	5	20	
1,1-Dichloroethene	148	25	2.1	ug/l	125	17	105	60-130	1	20	
cis-1,2-Dichloroethene	216	10	1.6	ug/l	125	69	118	65-130	1	20	
trans-1,2-Dichloroethene	148	10	1.4	ug/l	125	3.3	116	65-130	1	20	
1,2-Dichloropropane	146	10	1.8	ug/l	125	ND	117	65-130	3	20	
1,3-Dichloropropane	148	10	1.6	ug/l	125	ND	118	65-135	5	25	
2,2-Dichloropropane	138	10	1.7	ug/l	125	ND	110	60-145	4	25	
1,1-Dichloropropene	135	10	1.4	ug/l	125	ND	108	70-135	1	20	
cis-1,3-Dichloropropene	125	10	1.1	ug/l	125	ND	100	70-130	3	20	
trans-1,3-Dichloropropene	122	10	1.6	ug/l	125	ND	98	65-135	4	25	
Ethylbenzene	145	10	1.2	ug/l	125	ND	116	65-130	1	20	
Hexachlorobutadiene	109	25	1.9	ug/l	125	ND	87	60-135	2	20	
Isopropylbenzene	165	10	1.2	ug/l	125	ND	132	70-135	2	20	
p-Isopropyltoluene	138	10	1.4	ug/l	125	ND	110	65-130	0	20	
Methylene chloride	143	25	4.8	ug/l	125	ND	114	50-135	3	20	
Naphthalene	111	25	2.0	ug/l	125	ND	89	50-140	3	30	
n-Propylbenzene	151	10	1.4	ug/l	125	ND	121	70-135	1	20	
Styrene	143	10	0.80	ug/l	125	ND	114	50-145	2	30	
1,1,1,2-Tetrachloroethane	134	25	1.4	ug/l	125	ND	107	65-140	2	20	
1,1,2,2-Tetrachloroethane	170	10	1.2	ug/l	125	ND	136	55-135	3	30	*LM*
Tetrachloroethene	127	10	1.6	ug/l	125	ND	102	65-130	1	20	

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

METHOD BLANK/QC DATA

VOLATILE ORGANICS with OXYGENATES by GC/MS (EPA 8260B)

Analyte	Result	Reporting Limit	MDL	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Data Qualifiers
Batch: 7B24016 Extracted: 02/24/07											
Matrix Spike Dup Analyzed: 02/24/2007 (7B24016-MSD1)						**Source: IQB2033-07**					
Toluene	136	10	1.8	ug/l	125	ND	109	70-125	1	20	
1,2,3-Trichlorobenzene	112	25	1.5	ug/l	125	ND	90	60-135	2	20	
1,2,4-Trichlorobenzene	109	25	2.4	ug/l	125	ND	87	65-135	4	20	
1,1,1-Trichloroethane	133	10	1.5	ug/l	125	ND	106	65-140	1	20	
1,1,2-Trichloroethane	142	10	1.5	ug/l	125	ND	114	65-130	5	25	
Trichloroethene	575	10	1.3	ug/l	125	510	52	65-125	3	20	*BB*
Trichlorofluoromethane	141	25	1.7	ug/l	125	ND	113	60-145	1	25	
1,2,3-Trichloropropane	146	50	2.0	ug/l	125	ND	117	55-135	5	30	
1,2,4-Trimethylbenzene	150	10	1.2	ug/l	125	ND	120	55-135	1	25	
1,3,5-Trimethylbenzene	153	10	1.3	ug/l	125	ND	122	70-130	3	20	
Vinyl chloride	153	25	1.5	ug/l	125	ND	122	45-140	3	30	
o-Xylene	151	10	1.5	ug/l	125	ND	121	65-125	2	20	
m,p-Xylenes	292	10	3.0	ug/l	250	ND	117	65-130	2	25	
Xylenes, Total	443	20	4.5	ug/l	375	ND	118	60-130	2	20	
Di-isopropyl Ether (DIPE)	160	25	1.2	ug/l	125	ND	128	60-140	2	25	
Ethyl tert-Butyl Ether (ETBE)	140	25	1.4	ug/l	125	ND	112	60-135	2	25	
tert-Amyl Methyl Ether (TAME)	146	25	1.6	ug/l	125	ND	117	60-140	3	30	
Methyl-tert-butyl Ether (MTBE)	139	25	1.6	ug/l	125	ND	111	55-145	2	25	
tert-Butanol (TBA)	820	250	16	ug/l	625	ND	131	65-140	0	25	
Ethanol	1820	750	500	ug/l	1250	ND	146	40-155	4	30	
Surrogate: Dibromofluoromethane	*139*			*ug/l*	*125*		*111*	*80-120*			
Surrogate: Toluene-d8	*128*			*ug/l*	*125*		*102*	*80-120*			
Surrogate: 4-Bromofluorobenzene	*138*			*ug/l*	*125*		*110*	*80-120*			

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate

Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

DATA QUALIFIERS AND DEFINITIONS

BB	Sample > 4x spike concentration
IB,IA	CCV recovery above limit; analyte not detected,Results are valid even though CCV recovery outside of limits
IO	Contract limits originate from BP-GCLN Technical Requirements
J,DX	EPA Flag - Estimated value,Value < lowest standard (MQL), but > than MDL
LM	MS and/or MSD above acceptance limits. See Blank Spike(LCS).
LP	LCS rec.above meth. control limits. Analyte ND. Data not impacted
PC	Sample taken from VOA vial with air bubble > 6mm diameter
PV	Hydrocarbon result partly due to individ. peak(s) in quant. range
ND	Analyte NOT DETECTED at or above the reporting limit or MDL, if MDL is specified.
RPD	Relative Percent Difference

ADDITIONAL COMMENTS

For 8260 analyses:

Due to the high water solubility of alcohols and ketones, the calibration criteria for these compounds is <30% RSD.
The average % RSD of all compounds in the calibration is 15%, in accordance with EPA methods.

For GRO (C4-C12):

GRO (C4-C12) is quantitated against a gasoline standard. Quantitation begins immediately following the methanol peak.

8015 Analysis EDF Parlabel Cross Reference

Analyte	EDF Parlabel
GRO (C4 - C12)	GROC4C12

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

TestAmerica
ANALYTICAL TESTING CORPORATION
17461 Derian Avenue. Suite 100, Irvine, CA 92614 (949) 261-1022 Fax:(949) 260-3297

SECOR International - Thousand Oaks
290 Conejo Ridge Avenue, Suite 200
Thousand Oaks, CA 91361
Attention: SECOR - Vinvale

Project ID: ARCO 0031, South Gate
Report Number: IQB1508

Sampled: 02/13/07
Received: 02/14/07

Certification Summary

TestAmerica - Irvine, CA

Method	Matrix	Nelac	California
EPA 8015B	Water	X	X
EPA 8260B	Water	X	X

Nevada and NELAP provide analyte specific accreditations. Analyte specific information for TestAmerica may be obtained by contacting the laboratory or visiting our website at www.testamericainc.com

TestAmerica - Irvine, CA
Kathleen A. Robb
Project Manager

The results pertain only to the samples tested in the laboratory. This report shall not be reproduced, except in full, without written permission from TestAmerica.

Page ___ of ___

Project Name: Groundwater 2007-Q1
BP BU/AR Region/Enfos Segment: Retail
State or Lead Regulatory Agency: LARWQCB
Requested Due Date (~~05/16/06~~): Standard TAT

On-site Time:	Temp:
Off-site Time:	Temp:
Sky Conditions:	
Meteorological Events:	
Wind Speed:	Direction:

Lab Name:		BP/AR Facility No.:	ARCO 5110	Consultant/Contractor:	
Address:		BP/AR Facility Address:	5731 Firestone Blvd, South Gate	Address:	
		Site Lat/Long:	33.949/-118.165		Thousand Oaks, CA 91361
Lab PM:	Kathleen Robz	California Global ID No.:	T0603373915	Consultant/Contractor Project No:	
Tele/Fax:	949-261-1022 / 949-261-1228	Enfos Project No.:	40BOC-0009	Consultant/Contractor PM:	Tony Wong
BP/AR PM Contact:	Daniel Lah	Provision:		Tele/Fax:	~~(805) 230-1366 / (805) 230-1~~ 805-546-0455
Address:	6 Centerpointe Dr. Ste 161	Phase/WBS:	3 O&M WATER	Report Type & QC Level:	
	La Palma, CA 90623	Sub Phase/Task:	ANALYTICAL	E-mail EDD To:	~~bpwwtdel@secor.com~~ bpdata.com
Tele/Fax:	714-670-5228	Cost Element:	SUBCONTRACTORS COST (05)	Invoice to: Consultant:	Atlantic Richfield

Lab Bottle Order No: IQB1508

Item No.	Sample Description	Time	Date	Matrix: Soil/Solid	Matrix: Water/Liquid	Matrix: Air	Laboratory No.	No. of Containers	Preservative: Unpreserved	Preservative: H_2SO_4	Preservative: HNO_3	Preservative: HCl	Preservative: Methanol	Requested Analysis: GRO (8015) C4-C12	Requested Analysis: BTEX/OXY/ET (8260)	Sample Point Lat/Long and Comments
1	MW-A1	2240	02/13/07		X			4				X		X	X	
2	MW-A2	2120	02/13/07		X			4				X		X	X	
3	MW-A3	1855	02/13/07		X			4				X		X	X	
4	MW-A4	1615	02/13/07		X			4				X		X	X	
5	MW-A5	2215	02/13/07		X			4				X		X	X	
6	MW-A6	2720	02/13/07		X			4				X		X	X	
7	MW-A7	1945	02/13/07		X			4				X		X	X	EDR
8	MW-A8S	2310	02/13/07		X			4				X		X	X	1500
9	MW-A8D	2345	02/13/07		X			4				X		X	X	

Sampler's Name: Ryan Dickinson	Relinquished By / Affiliation	Date	Time	Accepted By / Affiliation	Date	Time
Sampler's Company: SECOR International, Inc.	Ryan Dickinson / SECOR	2/14/07	1535	[illegible] TMI	2/14/07	1535
Shipment Date:	[illegible] TMI	2/14/07	1752			
Shipment Method:						
Shipment Tracking No:					2/14	1755

Special Instructions:

Custody Seals In Place Yes X No ___ Temp Blank Yes ___ No X Cooler Temperature on Receipt 4 °F/C Trip Blank Yes X No

Distribution: White Copy - Laboratory / Yellow Copy - BP/Atlantic Richfield Co. / Pink Copy - Consultant/Contractor

BP COC Rev. 4 10/1/04

4241

Project Name: Groundwater 2007-01
BP BU/AR Region/Enfos Segment: ~~[illegible]~~ Retail
State or Lead Regulatory Agency: ~~Atlantic Richfield~~ LARWQCB
Requested Due Date ~~(05/18/06)~~ Standard TAT

On-site Time	Temp
Off-site Time:	Temp.
Sky Conditions:	
Meteorological Events:	
Wind Speed:	Direction:

Lab Name:	Test America ~~Bel Mar Analytical~~	BP/AR Facility No.:	~~[illegible]~~ 5110	Consultant/Contractor:	SECOR International Inc.
Address:	17461 Derian Ave ~~2052 Alton Ave~~ Ste 100	BP/AR Facility Address:	~~[illegible]~~ 5731 Firestone Blvd	Address	290 Conejo Ridge Ave #200
	Irvine CA ~~92606~~ 92614	Site Lat/Long:	~~33.949/-118.165~~ 33.949/-118.165		Thousand Oaks, CA 91361
Lab PM:	Kathleen Robb	California Global ID No.:	T0603703915	Consultant/Contractor Project No.:	~~37BP.06051.12~~ 37BP.05110.40
Tele/Fax:	949-261-1022 / 949-261-1228	Enfos Project No.:	~~G0C G0B0G-0001~~ G0B0C-0009	Consultant/Contractor PM: Tony Wong	805-546-0455
BP/AR PM Contact:	~~Darrell Fah~~ Darrell Fah	Provision		Tele/Fax:	~~(805) 230-1265 / (805) 230-1277~~
Address:	6 Centerpointe Dr. 6-162	Phase/WBS:	8 O&M WATER	Report Type & QC Level:	
	La Palma, CA 90623	Sub Phase/Task:	ANALYTICAL	E-mail EDD To:	~~bevivale@secor.com~~ bpdata.com
Tele/Fax:	714-670-5228	Cost Element:	SUBCONTRACTORS COST	Invoice to:	~~Consultant~~ Atlantic Richfield

Lab Bottle Order No:

Item No.	Sample Description	Time	Date	Matrix: Soil/Solid	Matrix: Water/Liquid	Matrix: Air	Laboratory No.	No. of Containers	Preservative: Unpreserved	Preservative: H_2SO_4	Preservative: HNO_3	Preservative: HCl	Preservative: Methanol		Requested Analysis: GRO (8015) C4-C12	Requested Analysis: BTEX/OXY/ET (8260)									Sample Point Lat/Long and Comments
1	DUP-5110-20070213	—	02/13/07		X			4				X			X	X									DUP
2	TB-5110-20070213B	—	02/13/07		X			4				X			X	X									
3																									
4																									
5																									
6																									
7																									
8																									
9																									

	Relinquished By / Affiliation	Date	Time	Accepted By / Affiliation	Date	Time
Sampler's Name: Ryan Dickinson						
Sampler's Company: SECOR International, Inc.	Ryan Dickinson / SECOR TAT	2/14/07	1555	TAT	2/14	1555
Shipment Date:		2/14/07	1755			
Shipment Method:						
Shipment Tracking No:					2/14	1755

Special Instructions:

Custody Seals In Place Yes ✓ No Temp Blank Yes No ✓ Cooler Temperature on Receipt 4 °F/C Trip Blank Yes ✓ No

Distribution: White Copy - Laboratory / Yellow Copy - BP/Atlantic Richfield Co. / Pink Copy - Consultant/Contractor

BP COC Rev. 4 10/1/04

1124

SEVERN TRENT STL

STL Los Angeles
1721 South Grand Avenue
Santa Ana, CA 92705

Tel: 714 258 8610 Fax: 714 258 0921
www.stl-inc.com

March 9, 2007

STL LOT NUMBER: **E7B140294A**
PO/CONTRACT: GEM-6-21909

Bruce Cameron
SECOR International Inc
290 Conejo Ridge Ave
Suite 200
Thousand Oaks, CA 91361

Dear Bruce Cameron,

This report contains the **AMENDED** analytical results for the four samples received under chain of custody by STL Los Angeles on February 14, 2007. These samples are associated with your ARCO #0031/5110 project.

This report was amended to include 3 additional oxygenates that were not included in the original report.

STL Los Angeles certifies that the test results provided in this report meet all NELAP requirements for parameters for which accreditation is required or available. Any exceptions to NELAP requirements are noted in the case narrative. The case narrative is an integral part of the report. NELAP Certification Number for STL Los Angeles is 01118CA / E87652.

Any matrix related anomaly is footnoted within the report. A cooler receipt temperature between 2-6 degrees Celsius is within EPA acceptance criteria. The temperature(s) of the cooler received for this project can be found on the Project Receipt Checklist. Historical control limits for the LCS are used to define the estimate of uncertainty for a method. All applicable quality control procedures met method-specified acceptance criteria.

This report shall not be reproduced except in full, without the written approval of the laboratory.

000024

This report contains _____ pages.

If you have any questions, please feel free to call me at (714) 258-8610.

Sincerely,

Beth Riley
Project Manager

cc: Project File

CASE NARRATIVE

LOT NUMBER: **E7B140294A**

The relative response factor (RRF) for Ethanol does not meet the GCLN criteria for either the initial calibration (ICAL) or the continuing calibration verification (CCV). Even though this criteria was not met, the RRF's for Ethanol were greater than 0.05; which, is consistent with the USEPA Contract Laboratory Program National Functional Guidelines for Organic Data Review and the data is suitable for use.

E7B140294

Chain of Custody Record

Project Name: 2007-Q1 Groundwater
BP BU/AR Region/Enfos Segment: Terminal
State or Lead Regulatory Agency: Atlantic Richfield
Requested Due Date (mm/dd/yy): Standard TAT

On-site Time:	Temp:
Off-site Time:	Temp:
Sky Conditions:	
Meteorological Events:	
Wind Speed:	Direction:

Lab Name:	STL Los Angeles	BP/AR Facility No.:	0031	Consultant/Contractor:	SECOR International, Inc.
Address:	1721 South Grand Avenue	BP/AR Facility Address:	8601 Garfield Blvd., South Gate, CA	Address:	290 Conejo Ridge Ave. #200
	Santa Ana, CA 92705	Site Lat/Long:	33.95 / -118.17		Thousand Oaks, CA. 91361
Lab PM:	Beth Riley	California Global ID No.:	SL373452448	Consultant/Contractor Project No.:	37BP.00031.18
Tele/Fax:	714-258-8610	Enfos Project No.:	G0CKK-0014	Consultant/Contractor PM:	Paul LaBonte
BP/AR PM Contact:	Darrel Fah	Provision		Tele/Fax:	(805) 230-1266 / (805) 230-1277
Address:	6 Centerpointe Dr. 6-162	Phase/WBS:	5 INTERIM RESPONSE	Report Type & QC Level:	
	La Palma, CA 90623	Sub Phase/Task:	ANALYTICAL	E-mail EDD To:	bpvinvale@secor.com
Tele/Fax:	714-670-5228	Cost Element:	SUBCONTRACT COST	Invoice to:	Consultant

Lab Bottle Order No:

Item No.	Sample Description	Time	Date	Matrix: Soil/Solid	Matrix: Water/Liquid	Matrix: Air	Laboratory No.	No. of Containers	Preservative: Unpreserved	Preservative: H_2SO_4	Preservative: HNO_3	Preservative: HCl	Preservative: Methanol	Requested Analysis: GRO (8015) C4-C12	Requested Analysis: BTEX/OXY/ET (8260)*	Requested Analysis: VOCs (8260)	Sample Point Lat/Long and Comments
1	MW-19	2025	02/13/07		X			6				X		X	X	X	
2	MW-20	1800	02/13/07		X			6				X		X	X	X	
3	FB-5110-20070213	2000	02/13/07		X			6				X		X	X	X	QCFB
4	TB-5110-20070213A	-----	02/13/07		X			6				X		X	X	X	QCTB
5																	
6																	
7																	
8																	

	Relinquished By / Affiliation	Date	Time	Accepted By / Affiliation	Date	Time
Sampler's Name: Ryan Dickinson						
Sampler's Company: SECOR International, Inc.	Ryan Dickinson / SECOR	2-14-07	16:34		2-14-07	16:34
Shipment Date:						
Shipment Method:						
Shipment Tracking No:		2-14-07	17:50		2-14-07	17:50

Special Instructions:

Custody Seals In Place Yes____ No____ Temp Blank Yes____ No____ Cooler Temperature on Receipt ____°F/C Trip Blank Yes____ No____

Distribution: White Copy - Laboratory / Yellow Copy - BP/Atlantic Richfield Co. / Pink Copy - Consultant/Contractor

BP COC Rev. 4 10/1/04

ARCO #0031 / 5110
3
E7B140294A

STL LOS ANGELES - PROJECT RECEIPT CHECKLIST Date: 2/14/07

Single Cooler Only

LIMS Lot #: E7B140294 Quote #: 62668

Client Name: SeCorp International Project: 2007-Q1 Groundwater

Received by: GR Date/Time Received: 2/14/07 1750

Delivery by : ☐ Client ☒ STL ☐ DHL ☐ Fed Ex ☐ UPS ☐ Other

****

	Initial / Date
Custody Seal Status Cooler: ☒ Intact ☐ Broken ☐ None	GR 2/14/07
Custody Seal Status Samples: ☐ Intact ☐ Broken ☒ None	
Custody Seal #(s): NA ☒ No Seal #	
Sampler Signature on COC ☐ Yes ☐ No ☒ N/A	
IR Gun # B Correction Factor -.2 °C IR passed daily verification ☒ Yes ☐ No	
Temperature - BLANK 5.2 °C - .2 CF = 5.0 °C ...Cooler #1 ID NA	
Temperature – COOLER (°C °C °C °C) = avg °C - .2 CF = °C	
Samples outside temperature criteria but received within 6 hours of final sampling ☐ Yes ☒ N/A	
Sample Container(s): ☒ STL-LA ☐ Client	
pH measured: ☐ Yes ☐ Anomaly (if checked, notify lab and file NCM) ☒ N/A	
Anomalies: ☒ No ☐ Yes – complete CUR and Create NCM	

Complete shipment received in good condition with correct temperatures, containers, labels, volumes preservatives and within method specified holding times. ☒ Yes ☐ No

Labeled by: GR

****

Turn Around Time: ☐ RUSH–24HR ☐ RUSH–48HR ☐ RUSH–72HR ☒ NORMAL

********** LEAVE NO BLANK SPACES ; USE N/A **********

Headspace Anomaly ☐ YES ☒ N/A GR 2/14/07

Lab ID	Container(s) #	Headspace	Lab ID	Container(s) #	Headspace
		☐ > 6mm			☐ > 6mm
		☐ > 6mm			☐ > 6mm
		☐ > 6mm			☐ > 6mm
		☐ > 6mm			☐ > 6mm
		☐ > 6mm			☐ > 6mm
		☐ > 6mm			☐ > 6mm
		☐ > 6mm			☐ > 6mm

LIMS Lot # L121024

PROJECT RECEIPT CHECKLIST Cont'd

Fraction	F-4													
VOAH	6													
		CR	2/14/07											

H: HCL, S: H2SO4, N: HNO3, V: VOA, SL, Sleeve, E: Encore, PB: Poly Bottle, CGB: Clear Glass Bottle, AGJ: Amber Glass Jar, T: Terracore
AGB: Amber Glass Bottle, n/f/l:HNO3-Lab filtered, n/f:HNO3-Field filtered, znna: Zinc Acetate/Sodium Hydroxide, Na2s2o3: sodium thiosulfate

Condition Upon Receipt Anomaly Form

Anomalies ☐YES ☒N/A CR 2/14/07

- **COOLERS**
  - ☐ Not Received (received COC only)
  - ☐ Leaking
  - ☐ Other:
- **CUSTODY SEALS (COOLER(S)** **CONTAINER(S)**
  - ☐ None ☐ None
  - ☐ Not Intact ☐ Not Intact
  - ☐ Other ☐ Other
- **TEMPERATURE (SPECS 4 ± 2°C)**
  - ☐ Cooler Temp(s)
  - ☐ Temperature Blank(s)
- **CHAIN OF CUSTODY (COC)**
  - ☐ Not relinquished by Client; No date/time relinquished
  - ☐ Incomplete information provided
  - ☐ Other ☐ COC not received – notify PM
- **CONTAINERS**
  - ☐ Leaking ☐ Voa Vials with Bubbles > 6mm
  - ☐ Broken
  - ☐ Extra
  - ☐ Without Labels
  - ☐ Other:
- **LABELS**
  - ☐ Not the same ID/info as in COC
  - ☐ Incomplete Information
  - ☐ Markings/Info illegible
  - ☐ Torn
- **SAMPLES**
  - ☐ Samples NOT RECEIVED but listed on COC
  - ☐ Samples received but NOT LISTED on COC
  - ☐ Logged based on Label Information
  - ☐ Logged based on info from other samples on COC
  - ☐ Logged according to Work Plan
  - ☐ Logged on HOLD UNTIL FURTHER NOTICE
  - ☐ Will be noted on COC--Client to send samples with new COC
  - ☐ Mislabeled as to tests, preservatives, etc.
  - ☐ Holding time expired -- list sample ID and test
  - ☐ Improper container used
  - ☐ Not preserved/Improper preservative used
  - ☐ Improper pH _____ Lab to preserve sample and document
  - ☐ Insufficient quantities for analysis ☐ Other

Comments:

☐ Corrective Action Implemented:

☐ Client Informed: verbally on _____ By: _____ ☐ In writing on _____ By: _____

☐ Sample(s) on hold until: _____ ☐ Sample(s) processed "as is."

Logged by/Date: Logged in by other STL ☐ ____ **PM Review/Date:**

2/14/07 CR 2/25/07

SECOR International Inc

Client Sample ID: MW-19

GC/MS Volatiles

Lot-Sample #...: E7B140294-001 **Work Order #...:** JPFVR1AA **Matrix.....:** W
Date Sampled...: 02/13/07 20:25 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7051268
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 12:35
Dilution Factor: 1
Analyst ID.....: 999998 **Instrument ID..:** MSN
Method.....: SW846 8260B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
Benzene	**21**	**1.0**	**ug/L**	**0.30**
tert-Butyl alcohol	ND	25	ug/L	7.0
1,2-Dichloroethane	**0.44 JDX**	**1.0**	**ug/L**	**0.40**
Ethanol	ND	500	ug/L	74
Ethylbenzene	**0.86 JDX**	**1.0**	**ug/L**	**0.30**
Methyl tert-butyl ether (MTBE)	**1.2**	**1.0**	**ug/L**	**0.50**
Toluene	ND	1.0	ug/L	0.30
m-Xylene & p-Xylene	**0.63 JDX**	**1.0**	**ug/L**	**0.50**
o-Xylene	ND	1.0	ug/L	0.20
Xylenes (total)	ND	1.0	ug/L	0.20
Diisopropyl Ether (DIPE)	ND	2.0	ug/L	0.50
Ethyl-t-Butyl Ether (ETBE)	ND	2.0	ug/L	0.50
Tert-amyl methyl ether (TAME)	ND	2.0	ug/L	0.50

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	91	(75 - 120)
1,2-Dichloroethane-d4	83	(65 - 130)
Toluene-d8	95	(80 - 130)

NOTE(S):

JDX J= EPA Flag - Esitmated value; DX = Value< lowest standard (MQL). but > MDL.

SECOR International Inc

Client Sample ID: MW-19

GC Volatiles

Lot-Sample #...: E7B140294-001 **Work Order #...:** JPFVR1AC **Matrix.....:** W
Date Sampled...: 02/13/07 20:25 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7050247
Prep Date.....: 02/15/07 **Analysis Date..:** 02/15/07
Prep Batch #...: 7050403 **Analysis Time..:** 16:28
Dilution Factor: 1
Analyst ID.....: 001464 **Instrument ID..:** G15
Method.....: SW846 8015B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
GRO (C4 - C12)	**170**	**100**	**ug/L**	**40**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	83	(70 - 130)

SECOR International Inc

Client Sample ID: MW-20

GC/MS Volatiles

Lot-Sample #...: E7B140294-002 **Work Order #...:** JPFVT1AA **Matrix.....:** W
Date Sampled...: 02/13/07 18:00 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7051268
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 13:46
Dilution Factor: 5
Analyst ID.....: 999998 **Instrument ID..:** MSN
Method.....: SW846 8260B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
Benzene	**68**	**5.0**	**ug/L**	**1.5**
tert-Butyl alcohol	**4000**	**120**	**ug/L**	**35**
1,2-Dichloroethane	ND	5.0	ug/L	2.0
Ethanol	ND	2500	ug/L	370
Ethylbenzene	**7.7**	**5.0**	**ug/L**	**1.5**
Methyl tert-butyl ether (MTBE)	**380**	**5.0**	**ug/L**	**2.5**
Toluene	**6.4**	**5.0**	**ug/L**	**1.5**
m-Xylene & p-Xylene	**9.6**	**5.0**	**ug/L**	**2.5**
o-Xylene	**3.1 JDX**	**5.0**	**ug/L**	**1.0**
Xylenes (total)	**13**	**5.0**	**ug/L**	**1.0**
Diisopropyl Ether (DIPE)	**4.2 JDX**	**10**	**ug/L**	**2.5**
Ethyl-t-Butyl Ether (ETBE)	ND	10	ug/L	2.5
Tert-amyl methyl ether (TAME)	**3.0 JDX**	**10**	**ug/L**	**2.5**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	91	(75 - 120)
1,2-Dichloroethane-d4	99	(65 - 130)
Toluene-d8	95	(80 - 130)

NOTE(S):

JDX J= EPA Flag - Esitmated value; DX = Value< lowest standard (MQL). but > MDL.

SECOR International Inc

Client Sample ID: MW-20

GC Volatiles

Lot-Sample #...: E7B140294-002 **Work Order #...:** JPFVT1AC **Matrix.....:** W
Date Sampled...: 02/13/07 18:00 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7050247
Prep Date.....: 02/15/07 **Analysis Date..:** 02/15/07
Prep Batch #...: 7050403 **Analysis Time..:** 16:58
Dilution Factor: 1
Analyst ID.....: 001464 **Instrument ID..:** G15
Method.....: SW846 8015B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
GRO (C4 - C12)	**810**	**100**	**ug/L**	**40**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	119	(70 - 130)

SECOR International Inc

Client Sample ID: FB-5110-20070213

GC/MS Volatiles

Lot-Sample #...: E7B140294-003 **Work Order #...:** JPFVV1AA **Matrix.....:** W
Date Sampled...: 02/13/07 20:00 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7051268
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 12:58
Dilution Factor: 1
Analyst ID.....: 999998 **Instrument ID..:** MSN
Method.....: SW846 8260B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
Benzene	ND	1.0	ug/L	0.30
tert-Butyl alcohol	ND	25	ug/L	7.0
1,2-Dichloroethane	ND	1.0	ug/L	0.40
Ethanol	ND	500	ug/L	74
Ethylbenzene	ND	1.0	ug/L	0.30
Methyl tert-butyl ether (MTBE)	ND	1.0	ug/L	0.50
Toluene	ND	1.0	ug/L	0.30
m-Xylene & p-Xylene	ND	1.0	ug/L	0.50
o-Xylene	ND	1.0	ug/L	0.20
Xylenes (total)	ND	1.0	ug/L	0.20
Diisopropyl Ether (DIPE)	ND	2.0	ug/L	0.50
Ethyl-t-Butyl Ether (ETBE)	ND	2.0	ug/L	0.50
Tert-amyl methyl ether (TAME)	ND	2.0	ug/L	0.50

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	90	(75 - 120)
1,2-Dichloroethane-d4	97	(65 - 130)
Toluene-d8	95	(80 - 130)

SECOR International Inc

Client Sample ID: FB-5110-20070213

GC Volatiles

Lot-Sample #...: E7B140294-003 **Work Order #...:** JPFVV1AC **Matrix.....:** W
Date Sampled...: 02/13/07 20:00 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7050247
Prep Date.....: 02/15/07 **Analysis Date..:** 02/15/07
Prep Batch #...: 7050403 **Analysis Time..:** 17:28
Dilution Factor: 1
Analyst ID.....: 001464 **Instrument ID..:** G15
Method.....: SW846 8015B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
GRO (C4 - C12)	ND	100	ug/L	40

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	78	(70 - 130)

SECOR International Inc

Client Sample ID: TB-5110-20070213A

GC/MS Volatiles

Lot-Sample #...: E7B140294-004 **Work Order #...:** JPFVW1AA **Matrix.....:** W
Date Sampled...: 02/13/07 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7051268
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 13:22
Dilution Factor: 1
Analyst ID.....: 999998 **Instrument ID..:** MSN
Method.....: SW846 8260B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
Benzene	ND	1.0	ug/L	0.30
tert-Butyl alcohol	ND	25	ug/L	7.0
1,2-Dichloroethane	ND	1.0	ug/L	0.40
Ethanol	ND	500	ug/L	74
Ethylbenzene	ND	1.0	ug/L	0.30
Methyl tert-butyl ether (MTBE)	ND	1.0	ug/L	0.50
Toluene	ND	1.0	ug/L	0.30
m-Xylene & p-Xylene	ND	1.0	ug/L	0.50
o-Xylene	ND	1.0	ug/L	0.20
Xylenes (total)	ND	1.0	ug/L	0.20
Diisopropyl Ether (DIPE)	ND	2.0	ug/L	0.50
Ethyl-t-Butyl Ether (ETBE)	ND	2.0	ug/L	0.50
Tert-amyl methyl ether (TAME)	ND	2.0	ug/L	0.50

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	86	(75 - 120)
1,2-Dichloroethane-d4	100	(65 - 130)
Toluene-d8	95	(80 - 130)

SECOR International Inc

Client Sample ID: TB-5110-20070213A

GC Volatiles

Lot-Sample #...: E7B140294-004 **Work Order #...:** JPFVW1AC **Matrix.....:** W
Date Sampled...: 02/13/07 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7050247
Prep Date.....: 02/15/07 **Analysis Date..:** 02/15/07
Prep Batch #...: 7050403 **Analysis Time..:** 17:57
Dilution Factor: 1
Analyst ID.....: 001464 **Instrument ID..:** G15
Method.....: SW846 8015B

PARAMETER	RESULT	REPORTING LIMIT	UNITS	MDL
GRO (C4 - C12)	ND	100	ug/L	40

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	82	(70 - 130)

METHOD BLANK REPORT

GC/MS Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPQJV1AA **Matrix.....:** WATER
MB Lot-Sample #: E7B200000-479

Prep Date.....: 02/19/07 **Analysis Time..:** 10:13
Analysis Date..: 02/19/07 **Prep Batch #...:** 7051479 **Instrument ID..:** MSN
Dilution Factor: 1

Analyst ID.....: 999998

PARAMETER	RESULT	REPORTING LIMIT	UNITS	METHOD
Benzene	ND	1.0	ug/L	SW846 8260B
tert-Butyl alcohol	ND	25	ug/L	SW846 8260B
1,2-Dichloroethane	ND	1.0	ug/L	SW846 8260B
Ethanol	ND	500	ug/L	SW846 8260B
Ethylbenzene	ND	1.0	ug/L	SW846 8260B
Methyl tert-butyl ether (MTBE)	ND	1.0	ug/L	SW846 8260B
Toluene	ND	1.0	ug/L	SW846 8260B
m-Xylene & p-Xylene	ND	1.0	ug/L	SW846 8260B
o-Xylene	ND	1.0	ug/L	SW846 8260B
Xylenes (total)	ND	1.0	ug/L	SW846 8260B
Diisopropyl Ether (DIPE)	ND	2.0	ug/L	SW846 8260B
Ethyl-t-Butyl Ether (ETBE	ND	2.0	ug/L	SW846 8260B
Tert-amyl methyl ether (T	ND	2.0	ug/L	SW846 8260B

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	88	(75 - 120)
1,2-Dichloroethane-d4	104	(65 - 130)
Toluene-d8	95	(80 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

METHOD BLANK REPORT

GC Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPNJ31AA **Matrix.....:** WATER
MB Lot-Sample #: E7B190000-403

Prep Date.....: 02/15/07 **Analysis Time..:** 13:32
Analysis Date..: 02/15/07 **Prep Batch #...:** 7050403 **Instrument ID..:** G15
Dilution Factor: 1

Analyst ID.....: 001464

PARAMETER	RESULT	REPORTING LIMIT	UNITS	METHOD
GRO (C4 - C12)	ND	100	ug/L	SW846 8015B

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	78	(70 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

LABORATORY CONTROL SAMPLE EVALUATION REPORT

GC/MS Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPQJV1AC **Matrix.....:** WATER
LCS Lot-Sample#: E7B200000-479
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 09:26
Dilution Factor: 1 **Instrument ID..:** MSN
Analyst ID.....: 999998

PARAMETER	PERCENT RECOVERY	RECOVERY LIMITS	METHOD
Benzene	**100**	**(75 - 120)**	**SW846 8260B**
tert-Butyl alcohol	**98**	**(50 - 150)**	**SW846 8260B**
1,2-Dichloroethane	**96**	**(70 - 130)**	**SW846 8260B**
Ethanol	**51**	**(20 - 150)**	**SW846 8260B**
Ethylbenzene	**103**	**(70 - 130)**	**SW846 8260B**
Methyl tert-butyl ether (MTBE)	**99**	**(70 - 130)**	**SW846 8260B**
Toluene	**98**	**(80 - 120)**	**SW846 8260B**
m-Xylene & p-Xylene	**104**	**(70 - 130)**	**SW846 8260B**
o-Xylene	**104**	**(70 - 130)**	**SW846 8260B**
Tert-amyl methyl ether (T	**102**	**(70 - 130)**	**SW846 8260B**
Ethyl-t-Butyl Ether (ETBE	**101**	**(70 - 130)**	**SW846 8260B**
Diisopropyl Ether (DIPE)	**105**	**(70 - 130)**	**SW846 8260B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	91	(75 - 120)
1,2-Dichloroethane-d4	95	(65 - 130)
Toluene-d8	96	(80 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

LABORATORY CONTROL SAMPLE DATA REPORT

GC/MS Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPQJV1AC **Matrix.....:** WATER
LCS Lot-Sample#: E7B200000-479
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 09:26
Dilution Factor: 1 **Instrument ID..:** MSN
Analyst ID.....: 999998

PARAMETER	SPIKE AMOUNT	MEASURED AMOUNT	UNITS	PERCENT RECOVERY	METHOD
Benzene	**10.0**	**10.0**	**ug/L**	**100**	**SW846 8260B**
tert-Butyl alcohol	**50.0**	**48.9**	**ug/L**	**98**	**SW846 8260B**
1,2-Dichloroethane	**10.0**	**9.62**	**ug/L**	**96**	**SW846 8260B**
Ethanol	**2000**	**1020**	**ug/L**	**51**	**SW846 8260B**
Ethylbenzene	**10.0**	**10.3**	**ug/L**	**103**	**SW846 8260B**
Methyl tert-butyl ether (MTBE)	**10.0**	**9.90**	**ug/L**	**99**	**SW846 8260B**
Toluene	**10.0**	**9.82**	**ug/L**	**98**	**SW846 8260B**
m-Xylene & p-Xylene	**20.0**	**20.8**	**ug/L**	**104**	**SW846 8260B**
o-Xylene	**10.0**	**10.4**	**ug/L**	**104**	**SW846 8260B**
Tert-amyl methyl ether (T	**10.0**	**10.2**	**ug/L**	**102**	**SW846 8260B**
Ethyl-t-Butyl Ether (ETBE	**10.0**	**10.1**	**ug/L**	**101**	**SW846 8260B**
Diisopropyl Ether (DIPE)	**10.0**	**10.5**	**ug/L**	**105**	**SW846 8260B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	91	(75 - 120)
1,2-Dichloroethane-d4	95	(65 - 130)
Toluene-d8	96	(80 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

LABORATORY CONTROL SAMPLE EVALUATION REPORT

GC Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPNJ31AC **Matrix.....:** WATER
LCS Lot-Sample#: E7B190000-403
Prep Date.....: 02/15/07 **Analysis Date..:** 02/15/07
Prep Batch #...: 7050403 **Analysis Time..:** 14:01
Dilution Factor: 1 **Instrument ID..:** G15
Analyst ID.....: 001464

PARAMETER	PERCENT RECOVERY	RECOVERY LIMITS	METHOD
GRO (C4 - C12)	**96 LW**	**(70 - 140)**	**SW846 8015B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	114	(70 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

LW Quantitated against gasoline.

LABORATORY CONTROL SAMPLE DATA REPORT

GC Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPNJ31AC **Matrix.....:** WATER
LCS Lot-Sample#: E7B190000-403
Prep Date.....: 02/15/07 **Analysis Date..:** 02/15/07
Prep Batch #...: 7050403 **Analysis Time..:** 14:01
Dilution Factor: 1 **Instrument ID..:** G15
Analyst ID.....: 001464

PARAMETER	SPIKE AMOUNT	MEASURED AMOUNT	UNITS	PERCENT RECOVERY	METHOD
GRO (C4 - C12)	**1000**	**956 LW**	**ug/L**	**96**	**SW846 8015B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	114	(70 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

LW Quantitated against gasoline.

MATRIX SPIKE SAMPLE EVALUATION REPORT

GC/MS Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPFT81AD-MS **Matrix.....:** WATER
MS Lot-Sample #: E7B140291-002 JPFT81AE-MSD
Date Sampled...: 02/14/07 13:55 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7051268
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 14:35
Dilution Factor: 1 **Analyst ID.....:** 999998 **Instrument ID..:** MSN

PARAMETER	PERCENT RECOVERY	RECOVERY LIMITS	RPD	RPD LIMITS	METHOD
Benzene	**105**	**(75 - 120)**			**SW846 8260B**
	108	**(75 - 120)**	**2.7**	**(0-25)**	**SW846 8260B**
tert-Butyl alcohol	**144**	**(50 - 150)**			**SW846 8260B**
	301 BA,LM	**(50 - 150)**	**65**	**(0-35)**	**SW846 8260B**
1,2-Dichloroethane	**98**	**(70 - 130)**			**SW846 8260B**
	98	**(70 - 130)**	**0.30**	**(0-30)**	**SW846 8260B**
Ethanol	**53**	**(20 - 150)**			**SW846 8260B**
	48	**(20 - 150)**	**10**	**(0-50)**	**SW846 8260B**
Ethylbenzene	**105**	**(70 - 130)**			**SW846 8260B**
	102	**(70 - 130)**	**2.7**	**(0-30)**	**SW846 8260B**
Methyl tert-butyl ether (MTBE)	**100**	**(70 - 130)**			**SW846 8260B**
	104	**(70 - 130)**	**3.2**	**(0-30)**	**SW846 8260B**
Toluene	**98**	**(80 - 120)**			**SW846 8260B**
	101	**(80 - 120)**	**3.1**	**(0-25)**	**SW846 8260B**
m-Xylene & p-Xylene	**107**	**(70 - 130)**			**SW846 8260B**
	102	**(70 - 130)**	**4.0**	**(0-30)**	**SW846 8260B**
o-Xylene	**107**	**(70 - 130)**			**SW846 8260B**
	105	**(70 - 130)**	**1.8**	**(0-30)**	**SW846 8260B**
Tert-amyl methyl ether (T	**105**	**(70 - 130)**			**SW846 8260B**
	105	**(70 - 130)**	**0.0**	**(0-30)**	**SW846 8260B**
Ethyl-t-Butyl Ether (ETBE	**101**	**(70 - 130)**			**SW846 8260B**
	102	**(70 - 130)**	**0.78**	**(0-30)**	**SW846 8260B**
Diisopropyl Ether (DIPE)	**105**	**(70 - 130)**			**SW846 8260B**
	107	**(70 - 130)**	**1.6**	**(0-30)**	**SW846 8260B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	94	(75 - 120)
	96	(75 - 120)
1,2-Dichloroethane-d4	93	(65 - 130)
	86	(65 - 130)
Toluene-d8	96	(80 - 130)
	98	(80 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

Spiked analyte recovery is outside stated control limits.

BA Relative percent difference out of control

LM MS and/or MSD above acceptance limits. See Blank Spike (LCS).

MATRIX SPIKE SAMPLE DATA REPORT

GC/MS Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPFT81AD-MS **Matrix.....:** WATER
MS Lot-Sample #: E7B140291-002 JPFT81AE-MSD
Date Sampled...: 02/14/07 13:55 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7051268
Prep Date.....: 02/19/07 **Analysis Date..:** 02/19/07
Prep Batch #...: 7051479 **Analysis Time..:** 14:35
Dilution Factor: 1 **Analyst ID.....:** 999998 **Instrument ID..:** MSN

PARAMETER	SAMPLE AMOUNT	SPIKE AMT	MEASRD AMOUNT	UNITS	PERCNT RECVRY	RPD	METHOD
Benzene	**2.1**	**10.0**	**12.6**	**ug/L**	**105**		**SW846 8260B**
	2.1	**10.0**	**12.9**	**ug/L**	**108**	**2.7**	**SW846 8260B**
tert-Butyl alcohol	**11**	**50.0**	**82.6**	**ug/L**	**144**		**SW846 8260B**
	11	**50.0**	**161**	**ug/L**	**301**	**65**	**SW846 8260B**
	Qualifiers:		BA,LM				
1,2-Dichloroethane	**ND**	**10.0**	**9.80**	**ug/L**	**98**		**SW846 8260B**
	ND	**10.0**	**9.77**	**ug/L**	**98**	**0.30**	**SW846 8260B**
Ethanol	**ND**	**2000**	**1060**	**ug/L**	**53**		**SW846 8260B**
	ND	**2000**	**953**	**ug/L**	**48**	**10**	**SW846 8260B**
Ethylbenzene	**1.4**	**10.0**	**11.9**	**ug/L**	**105**		**SW846 8260B**
	1.4	**10.0**	**11.6**	**ug/L**	**102**	**2.7**	**SW846 8260B**
Methyl tert-butyl ether (MTBE)	**ND**	**10.0**	**10.0**	**ug/L**	**100**		**SW846 8260B**
	ND	**10.0**	**10.4**	**ug/L**	**104**	**3.2**	**SW846 8260B**
Toluene	**0.99**	**10.0**	**10.8**	**ug/L**	**98**		**SW846 8260B**
	0.99	**10.0**	**11.1**	**ug/L**	**101**	**3.1**	**SW846 8260B**
m-Xylene & p-Xylene	**5.6**	**20.0**	**27.0**	**ug/L**	**107**		**SW846 8260B**
	5.6	**20.0**	**26.0**	**ug/L**	**102**	**4.0**	**SW846 8260B**
o-Xylene	**1.7**	**10.0**	**12.4**	**ug/L**	**107**		**SW846 8260B**
	1.7	**10.0**	**12.2**	**ug/L**	**105**	**1.8**	**SW846 8260B**
Tert-amyl methyl ether (T	**ND**	**10.0**	**10.5**	**ug/L**	**105**		**SW846 8260B**
	ND	**10.0**	**10.5**	**ug/L**	**105**	**0.0**	**SW846 8260B**
Ethyl-t-Butyl Ether (ETBE	**ND**	**10.0**	**10.1**	**ug/L**	**101**		**SW846 8260B**
	ND	**10.0**	**10.2**	**ug/L**	**102**	**0.78**	**SW846 8260B**
Diisopropyl Ether (DIPE)	**ND**	**10.0**	**10.5**	**ug/L**	**105**		**SW846 8260B**
	ND	**10.0**	**10.7**	**ug/L**	**107**	**1.6**	**SW846 8260B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
Bromofluorobenzene	94	(75 - 120)
	96	(75 - 120)
1,2-Dichloroethane-d4	93	(65 - 130)
	86	(65 - 130)
Toluene-d8	96	(80 - 130)
	98	(80 - 130)

(Continued on next page)

MATRIX SPIKE SAMPLE DATA REPORT

GC/MS Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPFT81AD-MS **Matrix.....:** WATER
MS Lot-Sample #: E7B140291-002 JPFT81AE-MSD

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

Spiked analyte recovery is outside stated control limits.

BA Relative percent difference out of control

LM MS and/or MSD above acceptance limits. See Blank Spike (LCS).

MATRIX SPIKE SAMPLE EVALUATION REPORT

GC Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPFVM1AF-MS **Matrix.....:** WATER
MS Lot-Sample #: E7B140293-003 JPFVM1AG-MSD
Date Sampled...: 02/14/07 11:45 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7050247
Prep Date.....: 02/15/07 **Analysis Date..:** 02/16/07
Prep Batch #...: 7050403 **Analysis Time..:** 02:19
Dilution Factor: 1 **Analyst ID.....:** 001464 **Instrument ID..:** G15

PARAMETER	PERCENT RECOVERY	RECOVERY LIMITS	RPD	RPD LIMITS	METHOD
GRO (C4 - C12)	**95 LW**	**(70 - 140)**			**SW846 8015B**
	93 LW	**(70 - 140)**	**2.3**	**(0-25)**	**SW846 8015B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	118	(70 - 130)
	118	(70 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

LW Quantitated against gasoline.

MATRIX SPIKE SAMPLE DATA REPORT

GC Volatiles

Client Lot #...: E7B140294 **Work Order #...:** JPFVM1AF-MS **Matrix.....:** WATER
MS Lot-Sample #: E7B140293-003 JPFVM1AG-MSD
Date Sampled...: 02/14/07 11:45 **Date Received..:** 02/14/07 17:50 **MS Run #.....:** 7050247
Prep Date.....: 02/15/07 **Analysis Date..:** 02/16/07
Prep Batch #...: 7050403 **Analysis Time..:** 02:19
Dilution Factor: 1 **Analyst ID.....:** 001464 **Instrument ID..:** G15

PARAMETER	SAMPLE AMOUNT	SPIKE AMT	MEASRD AMOUNT	UNITS	PERCNT RECVRY	RPD	METHOD
GRO (C4 - C12)	**ND**	**1000**	**947**	**ug/L**	**95 LW**		**SW846 8015B**
	ND	**1000**	**926**	**ug/L**	**93 LW**	**2.3**	**SW846 8015B**

SURROGATE	PERCENT RECOVERY	RECOVERY LIMITS
a,a,a-Trifluorotoluene (TFT)	118	(70 - 130)
	118	(70 - 130)

NOTE(S):

Calculations are performed before rounding to avoid round-off errors in calculated results.

Bold print denotes control parameters

LW Quantitated against gasoline.

APPENDIX O

GROUNDWATER SAMPLING FIELD DATA SHEETS

Subjective and Well -Head Evaluation Form

Project No.: Q1-2007 GROUNDWATER Location: South Gate Date: 2-13-07

Station No.: 5110 Field Technician: Jose Aguirre Day of Week: TUESDAY

DTW ORDER	WELL ID	SURFICIAL SEAL	CONCRETE SEAL	LID SECURE	GASKET	LOCK	EXPANDING CAP	TOTAL DEPTH (feet)	DEPTH TO WATER (feet)	FLOATING PRODUCT THICKNESS (feet)	DISSOLVED OXYGEN READING (mg/L)	COMMENTS
	S MW-A1	P	G	P	P	P	G	61.40	50.24	NA	0.76	
	S MW-A2	P	G	P	P	P	G	56.63	49.40	NA	0.64	
	MW-A3	G	G	G	G	G	G	66.52	50.68	NA	0.51	4" DUP
	MW-A4	G	G	G	G	P	G	64.81	51.90	NA	0.68	4"
	S MW-A5	P	P	P	P	P	G	64.81	50.07	NA	0.59	well sunken should be replaced.
	MW-A6	G	G	G	G	P	G	63.20	49.75	NA	0.72	4"
	MW-A7	G	G	G	G	P	G	63.61	49.8	NA	0.60	
	MW-A8S	G	G	G	G	P	G	63.60	50.13	NA	0.61	2"
	MW-A8D	G	G	G	G	P	G	74.80	50.63	NA	0.47	2" TD=94.35
	MW-19	G	G	G	G	P	G	69.91	50.31	NA	~~NA~~ 0.67	
	MW-20	G	G	G	G	G	G	71.84	50.13	NA	~~NA~~ 0.56	

Note: Use G=Good and P=poor for well condition

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY

PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-A1
SAMPLER: RD	FACILITY NO: 5110
DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) (2) 3 4 6 8 12 OTHER:

DEPTH OF WELL (feet): 61.40	CALCULATED PURGE (gal): 5.58
DEPTH TO WATER (feet): 50.24	ACTUAL PURGE VOL (gal): 6.0
Standing Water in Casing (feet) 11.16 x 0.20= 2.23 + DTW 52.47 =80% Recharge Water Level	

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 2227 End (2400 Hr.): 2232

Date Sampled: 02-13-07 Time (2400 Hr.): 2240 DTW @ Samp. Time: 50.33

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
2229	2	22.61	1.59	6.78	Clear	Light.	
2231	4	22.62	1.60	6.79	Clear	Light	
2232	6	22.64	1.60	6.79	Cloudy	Light	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	Bailer (Teflon)
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	Dedicated

OTHER: VAC TRUCK	OTHER:

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY, NO SAMPLE COLLECTED: REVIEWED BY: Bruce Cameron DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY	PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-A2
	SAMPLER: RK	FACILITY NO: 5110
	DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) (2) 3 4 6 8 12 OTHER:

DEPTH OF WELL (feet): 56.03	CALCULATED PURGE (gal): 3.61
DEPTH TO WATER (feet): 49.40	ACTUAL PURGE VOL (gal): 4.0
Standing Water in Casing (feet) 7.23 x 0.20= 1.44	+ DTW 50.84 =80% Recharge Water Level

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): ~~0909~~ 2108 End (2400 Hr.): 0913

Date Sampled: 02-13-07 Time (2400 Hr.): ~~0920~~ 2120 RK DTW @ Samp. Time: 49.51

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
2109 ~~0909~~ RK	1	22.79	1.24	6.90	Cloudy	Light	
2111 ~~0911~~ RK	2	22.84	1.24	6.90	"	"	
2112 ~~0912~~ RK	3	22.86	1.24	6.91	"	"	
2113 ~~0913~~ RK	4	22.89	1.23	6.91	Cloudy	Light	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	Bailer (Teflon)
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	Dedicated
OTHER: VAC TRUCK		OTHER:	

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY. NO SAMPLE COLLECTED: REVIEWED BY: Bruce Cameron DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY	PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-A3
	SAMPLER: PD	FACILITY NO: 5110
	DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 (4) 6 8 12 OTHER:

DEPTH OF WELL (feet): 66.52	CALCULATED PURGE (gal): 31.68
DEPTH TO WATER (feet): 50.68	ACTUAL PURGE VOL (gal): 32.00
Standing Water in Casing (feet) 15.84 x 0.20= 3.16	+ DTW 53.84 =80% Recharge Water Level

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 1755 End (2400 Hr.): 1830

Date Sampled: 02-13-07 Time (2400 Hr.): ~~1845~~ 1855 DTW @ Samp. Time: 52.28

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1): DUP-5110-2007 0213 @

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
1801	8	~~26.52~~ 23.23	1.72	6.65	Clear	Light	
1813	16	23.24	1.72	6.67	Cloudy	Light	
1822	24	23.29	1.72	6.68	Cloudy	Light	
1830	32	23.42	1.73	6.69	Clear	Light	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	Bailer (Teflon)
Submersible Pump	Bailer (Stainless Steel)	Dipper	~~Bailer~~ (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	~~Dedicated~~

OTHER: VAC TRUCK	OTHER:

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS: Duplicate

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY. NO SAMPLE COLLECTED: REVIEWED BY: Bruce Carson DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY	PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-A4
	SAMPLER: RD	FACILITY NO: 5110
	DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 (4) 6 8 12 OTHER:

DEPTH OF WELL (feet): 64.81	CALCULATED PURGE (gal): 25.8
DEPTH TO WATER (feet): 51.90	ACTUAL PURGE VOL (gal): 26.0
Standing Water in Casing (feet) 12.91 x 0.20= 2.58	+ DTW 54.48 =80% Recharge Water Level

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 1532 End (2400 Hr.): 1600

Date Sampled: 02-13-07 Time (2400 Hr.): ~~1610~~ 1615 DTW @ Samp. Time: 54.89

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
1537	5	22.91	2.00	6.78	Clear	Light	
1543	10	22.93	2.00	6.78	Clear	Light	
1548	15	22.94	2.01	6.79	Cloudy	Light	
1555	20	22.96	2.00	6.79	Cloudy	Light	
1600	26	22.91	2.00	6.79	"	Light	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	Bailer (Teflon)
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	Dedicated

OTHER: VAC TRUCK	OTHER:

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS: Stop Arco GAS truck to deliver GAS @ 1600 Stop all work till he leaves 1650

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY, NO SAMPLE COLLECTED: REVIEWED BY: [signature] DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY	PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-A5
	SAMPLER: RG	FACILITY NO: 5110
	DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 (4) 6 8 12 OTHER:

DEPTH OF WELL (feet): 64.81	CALCULATED PURGE (gal): 29.48
DEPTH TO WATER (feet): 50.07	ACTUAL PURGE VOL (gal): 30.0
Standing Water in Casing (feet) 14.74 x 0.20= 2.94 + DTW ~~24.03~~ 53.01 =80% Recharge Water Level	

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 2137 End (2400 Hr.): 2207

Date Sampled: 02-13-07 Time (2400 Hr.): 2215 DTW @ Samp. Time: 51.66

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
2145	8	23.61	1.78	6.87	Clear	Light	
2150 ~~2150~~	16	23.60	1.79	6.87	"	"	
2156	24	23.61	1.80	6.87	Clear	Light	
2207	30	23.53	1.79	6.88	Clear	" "	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	Bailer (Teflon)
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	Dedicated
OTHER: VAC TRUCK		OTHER:	

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY. NO SAMPLE COLLECTED: REVIEWED BY: Rebecca Cannon DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY

PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-A6
SAMPLER: RLS	FACILITY NO: 5110
DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 (4) 6 8 12 OTHER:

DEPTH OF WELL (feet): 63.20	CALCULATED PURGE (gal): 26.9
DEPTH TO WATER (feet): 49.75	ACTUAL PURGE VOL (gal): 25.0
Standing Water in Casing (feet) 13.45 x 0.20= 2.69	+ DTW 52.44 =80% Recharge Water Level

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 2357 End (2400 Hr.): 2412

Date Sampled: 02-13-07 Time (2400 Hr.): 2420 DTW @ Samp. Time: 51.33

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
2401	9	21.77	1.67	6.78	Clear	Light	
2406	18	21.72	1.69	6.80	Clear	Light	
2412	27	21.72	1.69	6.80	"	"	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	~~Bailer (Teflon)~~
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	Dedicated
OTHER: VAC TRUCK		OTHER:	

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY. NO SAMPLE COLLECTED: REVIEWED BY: Bruce Cameron DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY

PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-A7
SAMPLER: RW	FACILITY NO: 5110
DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 (4) 6 8 12 OTHER:

DEPTH OF WELL (feet): 63.61	CALCULATED PURGE (gal): 27.62
DEPTH TO WATER (feet): 49.8	ACTUAL PURGE VOL (gal): 28.0
Standing Water in Casing (feet) 13.81 x 0.20= 27.62 + DTW 52.56 =80% Recharge Water Level	

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 1857 End (2400 Hr.): 1916

Date Sampled: 02-13-07 Time (2400 Hr.): 1945 DTW @ Samp. Time: 51.76

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
1903	7	23.55	1.99	6.74	Cloudy	Light	
1908	14	23.56	1.99	6.74	Cloudy	Light	
1911	21	23.56	1.99	6.75	" "	" "	
~~1914~~ 1916	28	23.55	1.99	6.75	Cloudy	Light	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	Bailer (Teflon)
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	Dedicated

OTHER: VAC TRUCK	OTHER:

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY. NO SAMPLE COLLECTED: REVIEWED BY: Bruce Conway DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET VAC TRUCK

Q1-2007-GW.

PROJECT NO: ~~37BP.00031.18/0327~~ RD	WELL ID: MW-A8D
SAMPLER: RD	~~SAMPLE ID:~~ BP5110
DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 4 6 8 12 OTHER:

DEPTH OF WELL (feet): 94.35	CALCULATED PURGE (gal): 21.85
DEPTH TO WATER (feet): 50.63	ACTUAL PURGE VOL (gal): 22.0
Standing Water in Casing (feet) 43.71 x 0.20= 8.72 + DTW 59.37 =80% Recharge Water Level	

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 2319 End (2400 Hr.): 2341

Date Sampled: 02-13-07 Sample Time (2400 Hr.): 2345 DTW @ Samp. Time: 52.87

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees C°)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	Turbidity ~~ORP/Eh (mv)~~	DISSOLVED OXYGEN (mg/L)	WATER LEVEL
2324	5	22.24	1.81	6.95	Cloudy	Light		
2329	10	22.23	1.82	6.95	"	"		
2335	15	22.21	1.82	6.94	"	"		
2341	22	22.28	1.83	6.95	"	"		

* (Color) Clear, Cloudy, Yellow, Brown

PURGING EQUIPMENT	SAMPLING EQUIPMENT
Vac Truck	Disposable Teflon Bailer
OTHER:	OTHER:

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY. NO SAMPLE COLLECTED: REVIEWED BY: [signature] DATE: 2/26

Atlantic Richfield Company No. # 31

GROUNDWATER SAMPLE FIELD DATA SHEET VAC TRUCK

Q1-2007 Groundwater

PROJECT NO: ~~37BP.00031.1870327~~ PO	WELL ID: MW-A85
SAMPLER: RD	~~SAMPLE ID:~~ BPS110
DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) (2) 3 4 6 8 12 OTHER:

DEPTH OF WELL (feet): 63.60	CALCULATED PURGE (gal): 6.73
DEPTH TO WATER (feet): 50.13	ACTUAL PURGE VOL (gal): 7.00
Standing Water in Casing (feet) 13.47 x 0.20= 2.69 + DTW 52.82 =80% Recharge Water Level	

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 2258 End (2400 Hr.): 2303

Date Sampled: 02-13-07 Sample Time (2400 Hr.): 2310 DTW @ Samp. Time: 52.37

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees C°)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	~~ORP/Eh~~ turbidity	~~DISSOLVED~~ OXYGEN (mg/L)	~~WATER~~ LEVEL
2259	2	22.65	1.62	6.90	Cloudy	Light.		
2301	4	22.67	1.61	6.91	Cloudy	Light		
2303	7	22.68	1.61	6.91	Cloudy	Light		

* (Color) Clear, Cloudy, Yellow, Brown

PURGING EQUIPMENT	SAMPLING EQUIPMENT
Vac Truck	Disposable Teflon Bailer
OTHER:	OTHER:

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY. NO SAMPLE COLLECTED: REVIEWED BY: Bruce Cameron DATE: 2/26

Atlantic Richfield Company No. # 31

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY

PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-19
SAMPLER: RD	FACILITY NO: 5110
DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 (4) 6 8 12 OTHER:

DEPTH OF WELL (feet): 69.91	CALCULATED PURGE (gal): 39.2
DEPTH TO WATER (feet): 50.31	ACTUAL PURGE VOL (gal): 40

Standing Water in Casing (feet) 19.6 x 0.20= 3.92 + DTW 54.23 =80% Recharge Water Level

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 1927 End (2400 Hr.): 2010

Date Sampled: 02-13-07 Time (2400 Hr.): 2025 DTW @ Samp. Time: 51.20

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1): FB-5110-20070213@2000

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
1937	10	22.22	0.693	6.53	Clear	Light	
1950	20	22.26	0.858	6.61	Clear	Light	
2000	30	22.19	0.957	6.63	Clear	Light	
2010	40	22.16	0.877	6.64	Clear	Light	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	~~Bailer (Teflon)~~
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	~~Dedicated~~
OTHER: VAC TRUCK		OTHER:	

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS:

Field blank taken pouring D.I into voa @ sample point.

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY, NO SAMPLE COLLECTED: REVIEWED BY: Bruce Cameron DATE: 2/26

GROUNDWATER SAMPLE FIELD DATA SHEET

ATLANTIC RICHFIELD COMPANY

PROJECT NO: Q1-2007 Groundwater	SAMPLE ID: MW-20
SAMPLER: RW	FACILITY NO: 5110
DATE: 02-13-07	LOCATION: South Gate

CASING DIAMETER (inches) 2 3 (4) 6 8 12 OTHER:

DEPTH OF WELL (feet): 71.84	CALCULATED PURGE (gal): ~~4.37~~ 43.42
DEPTH TO WATER (feet): 50.13	ACTUAL PURGE VOL (gal): 44.00
Standing Water in Casing (feet) 21.71 x 0.20= 4.34 + DTW 54.47 =80% Recharge Water Level	

2 (inches)	Standing Water in Casing (feet)	x 0.5=	3 Casing Volumes (gal.)
4 (inches)	Standing Water in Casing (feet)	x 2.0=	3 Casing Volumes (gal.)
6 (inches)	Standing Water in Casing (feet)	x 4.4=	3 Casing Volumes (gal.)
8 (inches)	Standing Water in Casing (feet)	x 7.8=	3 Casing Volumes (gal.)

Date Purged: 02-13-07 Start (2400 Hr.): 1656 End (2400 Hr.): 1734

Date Sampled: 02-13-07 Time (2400 Hr.): 1800 DTW @ Samp. Time: 50.61

FIELD QC SAMPLES COLLECTED AT THIS WELL (IE: FB-1, X-DUP-1):

TIME (2400 Hr.)	VOLUME (gallons)	TEMP (degrees F)	E.C. (uS/cm) X1000	pH (units)	COLOR (visual)*	TURBIDITY (visual)**	TOTALIZE (gallons)
1706	11	22.62	1.70	6.84	Cloudy	Light	
1715	22	22.63	1.70	6.85	Cloudy	Light	
1724	33	22.63	1.70	6.87	" "	" "	
1734	44	22.64	1.70	6.86	Cloudy	Light	

* (Color) Clear, Cloudy, Yellow, Brown ** (Turbidity) Heavy, Moderate, Light, Trace

PURGING EQUIPMENT		SAMPLING EQUIPMENT	
2" Bladder Pump	Bailer (Teflon)	2" Bladder Pump	Bailer (Stainless Steel)
Contrifugal Pump	Bailer (PVC)	Submersible Pump	Bailer (Teflon)
Submersible Pump	Bailer (Stainless Steel)	Dipper	Bailer (Disposable Teflon)
Redi-Flo2	Dedicated	Well Wizard	Dedicated

OTHER: VAC TRUCK	OTHER:

Well Condition (cap, cement, padlock, screws, lid, etc.):

Floating Product Thickness (feet): Color: Padlock Number:

COMMENTS: 10 VOAS

40 ml VOA, HCL: 1 liter amber, none: 16 ox poly, HNO3:

WATER LEVEL ONLY, NO SAMPLE COLLECTED: REVIEWED BY: Bruce Cameron DATE: 2/26

APPENDIX P

WASTE DISPOSAL DOCUMENTS

PA276110-3

NO. 019662

7.0 105

NON-HAZARDOUS WASTE DATA FORM

TO BE COMPLETED BY GENERATOR

		GENERATING SITE
NAME	BP West Coast Products LLC	ARCO STATION # 5110
ADDRESS	P.O. Box 80249	5731 FIRESTONE BLVD.
CITY, STATE, ZIP	Rancho Santa Margarita, CA 92688	SOUTH GATE

PHONE NO. (949) 753-5820 SITE CONTACT _____ PROFILE NO. _____

CONTAINERS: No. 1 GALLONS X 266 Gallons WEIGHT _____

TYPE: [X] TANK TRUCK [ ] DUMP TRUCK [ ] DRUMS [ ] CARTONS [ ] OTHER _____

WASTE DESCRIPTION NON-HAZARDOUS WATER GENERATING PROCESS GROUNDWATER SAMPLING

COMPONENTS OF WASTE	PPM	%	COMPONENTS OF WASTE	PPM	%
1. WATER		99-100%	4.		
2. TPH		<1%	5.		
3.			6. BESI # 135696		

PROPERTIES pH 7 [ ] SOLID [X] LIQUID [ ] SLUDGE [ ] SLURRY [ ] OTHER _____

HANDLING INSTRUCTIONS: WEAR APPROPRIATE PROTECTIVE CLOTHING

THE GENERATOR CERTIFIES THAT THE WASTE AS DESCRIBED IS 100% NON-HAZARDOUS.

Larry Moothart as Agent of BP West Coast Products LLC — TYPED OR PRINTED FULL NAME & SIGNATURE — DATE 02 / 13 / 07

TRANSPORTER

NAME NIETO AND SONS TRUCKING, INC. EPA I.D. NO. _____

ADDRESS 1281 BREA CANYON ROAD SERVICE ORDER NO. _____

CITY, STATE, ZIP BREA, CALIFORNIA 92821 PICK UP DATE 02 / 13 / 07

PHONE NO. (714) 990-6855

TRUCK, UNIT, I.D. NO. X 26 — X BRENNAN RAMIREZ — TYPED OR PRINTED FULL NAME & SIGNATURE — DATE 02 / 13 / 07

TSD FACILITY

NAME DeMenno Kerdoon EPA I.D. NO. _____

ADDRESS 2000 N. Alameda Street DISPOSAL METHOD: [ ] LANDFILL [X] RECYCLER

CITY, STATE, ZIP Compton, CA 90222 Recycler

PHONE NO. 310-537-7100

TYPED OR PRINTED FULL NAME & SIGNATURE — DATE 2/16/07

GEN	OLD/NEW	L	A	TONS
TRANS		S	B	
C/Q		RT/CD	HWDF NONE	DISCREPANCY