

ExxonMobil
Environmental Services Company
4096 Piedmont Avenue #194
Oakland, CA 94611
510.547.8196
510.547.8706 FAX
jennifer.c.sedlachek@exxonmobil.com

RECEIVED

10:04 am, May 18, 2009

Alameda County
Environmental Health

Jennifer C. Sedlachek
Project Manager

ExxonMobil

May 14, 2009

Mr. Jerry T. Wickham
Alameda County Health Care Services Agency
1131 Harbor Bay Parkway
Alameda, California 94502-6577

Subject: Fuel Leak Investigation Site No. RO0002635
Former Exxon RAS #74121, 10605 Foothill Boulevard, Oakland, California


Dear Mr. Wickham:

Attached for your review and comment is a copy of the *Soil Vapor Sampling Report* for the above-referenced site. The report, prepared by ETIC Engineering, Inc. of Pleasant Hill, California, details the installation of additional vapor wells at the site.

Upon information and belief, I declare, under penalty of perjury, that the information contained in the attached report is true and correct.

If you have any questions or comments, please contact me at 510.547.8196.

Sincerely,



Jennifer C. Sedlachek
Project Manager

Attachment: ETIC Soil Vapor Sampling Report

- c: w/ attachment:
Mr. Ken Phares - MacArthur Boulevard Associates, Oakland, California
Mr. Peter McIntyre - AEI Consultants

- c: w/o attachment:
Mr. Bryan Campbell - ETIC Engineering, Inc.



Soil Vapor Sampling Report

**Former Exxon Retail Site 74121
10605 Foothill Boulevard
Oakland, California**

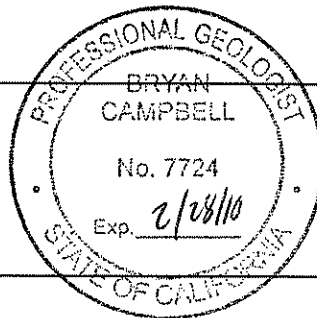
Prepared for

ExxonMobil Oil Corporation

Prepared by

ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, California 94523
(925) 602-4710

K. Erik Appel
Project Manager



5/14/09

Date

Bryan Campbell, P.G. #7724
Senior Geologist

5/14/09

Date

May 2009

CONTENTS

	<u>Page</u>
LIST OF FIGURES AND TABLES	
SITE CONTACTS	
1. INTRODUCTION	1
2. SITE BACKGROUND.....	2
2.1 SITE LOCATION AND LAND USE	2
2.2 REGIONAL GEOLOGY AND HYDROGEOLOGY	2
2.3 SITE GEOLOGY AND HYDROGEOLOGY	2
2.4 SUMMARY OF PREVIOUS INVESTIGATIONS	3
3. SUBSURFACE INVESTIGATION	4
3.1 ADVANCEMENT OF SOIL BORINGS AND SOIL SAMPLING	4
3.2 SOIL VAPOR MONITORING WELL INSTALLATION.....	4
3.3 SOIL VAPOR SAMPLE COLLECTION	5
3.4 SURVEY OF THE WELLS	5
3.5 WASTE CONTAINMENT AND DISPOSAL.....	5
4. RESULTS.....	6
4.1 LOCAL GEOLOGY AND HYDROGEOLOGY.....	6
4.2 SOIL SAMPLE ANALYTICAL METHODS AND RESULTS	6
4.3 SOIL VAPOR SAMPLE ANALYTICAL METHODS AND RESULTS	6
5. VAPOR INTRUSION EVALUATION.....	7
6. CONCLUSIONS AND RECOMMENDATIONS	8
REFERENCES	9
FIGURES	
TABLES	
APPENDIX A: Regulatory Correspondence	
APPENDIX B: Permits	
APPENDIX C: Soil Boring Logs	
APPENDIX D: Field Protocols	
APPENDIX E: Field Documents	
APPENDIX F: Survey Data	
APPENDIX G: Laboratory Analytical Reports and Chain-of-Custody Documentation	

LIST OF FIGURES AND TABLES

Former Exxon RS 74121

<u>Number</u>	<u>Description</u>
Figures	
1	Site location and topographic map.
2	Site map.
3	Site map showing groundwater elevations and analytical results.
4	Site map showing soil vapor sample analytical results.
Tables	
1	Well construction details.
2	Soil sample analytical results by EPA Method 8015B and 8021B.
3	Soil sample analytical results by EPA Method 8260B.
4	Groundwater monitoring data.
5	Physical properties analytical results for soil samples.
6	Soil vapor sample analytical results.

SITE CONTACTS

Site Name: Former Exxon Retail Site 74121

Site Address: 10605 Foothill Boulevard
Oakland, California

ExxonMobil Project Manager: Jennifer C. Sedlachek
ExxonMobil Environmental Services Company
4096 Piedmont Avenue #194
Oakland, California 94611
(510) 547-8196

Consultant to ExxonMobil: ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, California 94523
(925) 602-4710

ETIC Project Manager: K. Erik Appel

Regulatory Oversight: Jerry T. Wickham
Alameda County Health Care Services Agency
Environmental Health Services
1131 Harbor Bay Parkway
Alameda, California 94502-6577
(510) 567-6765

1. INTRODUCTION

At the request of ExxonMobil Environmental Services Company on behalf of ExxonMobil Oil Corporation (ExxonMobil), ETIC Engineering, Inc. (ETIC) has prepared this Soil Vapor Sampling Report for former Exxon Retail Site (RS) 74121, located at 10605 Foothill Boulevard, Oakland, California (Figure 1).

The investigation was conducted in accordance with the Revised Soil Vapor Sampling and Risk Assessment Work Plan dated December 2008, which was approved by the Alameda County Health Care Services Agency (ACHCSA) in a letter dated 23 December 2008. The work plan outlined the proposed scope of work for the collection of soil and soil gas samples to evaluate the potential risks of vapor intrusion for future site occupants particularly in the location of the former underground storage tanks (USTs) outside of the proposed excavation (ETIC 2007). The ACHCSA stated that this information would be used to assess whether the proposed excavation will be effective in mitigating potential vapor intrusion concerns. The work plan also included vapor sampling where concentrations of benzene in soil vapor approached or exceeded the residential Environmental Screening Levels (ESLs) per a request by the ACHCSA. Finally, vapor sampling was attempted for the five existing onsite soil vapor wells. The regulatory correspondence is attached as Appendix A.

This report documents the installation of seven soil vapor monitoring wells and presents the results of the soil vapor sampling and the risk assessment.

Scope of Work

The work consisted of the following activities:

- On 23 March 2009, a total of seven borings were advanced to a total depth of 6 feet below ground surface (bgs) using a hand auger.
- Soil samples were collected from each location. Soil samples collected from 5 to 5.5 feet bgs and from 5.5 to 6 feet bgs were submitted for laboratory analysis.
- The borings were completed as soil vapor wells VW6 through VW12 for the collection of shallow soil vapor samples.
- On 27 March 2009, soil vapor samples were collected from new vapor wells VW7 through VW12 in 1-liter Summa canisters and submitted for laboratory analysis.
- On 23 April 2009, soil vapor samples were collected from previously installed vapor wells VW2 and VW5 in 1-liter Summa canisters and submitted for laboratory analysis.

2. SITE BACKGROUND

2.1 SITE LOCATION AND LAND USE

Former Exxon RS 74121 is currently a small landscaped area located at 10605 Foothill Boulevard, Oakland, California, on the south corner of the intersection of Foothill Boulevard and 106th Avenue (Figure 2). The property is currently owned by MacArthur Boulevard Associates and has a shopping center and a residential area nearby. According to internal Exxon Company, U.S.A. correspondence, the USTs were removed from the site between 20 October 1981 and 15 June 1982. Site physical features are presented on Figure 2.

According to the property owner, a commercial retail structure is currently proposed for the north corner of the site. The remainder of the site will consist of paved areas.

2.2 REGIONAL GEOLOGY AND HYDROGEOLOGY

The site is located within the Coast Range Geomorphic Province on the eastern side of San Francisco Bay near the base of the western flank of the Diablo Range. The site is located approximately 1,000 feet west of the Hayward Fault Zone through which traces of the Hayward Fault have been mapped. The site is underlain by Jurassic-age volcanic and highly altered volcanic rock. Bedrock mapped near the site includes the Coast Range ophiolite which consists of basalts, diabase, and gabbro (Braymer 2000). Immediately west of the site are Holocene age alluvial fan and fluvial deposits which are mostly confined to narrow drainage valleys in the immediate area and spread out toward the west on the San Francisco Bay plain. The site is at an elevation of approximately 85 feet above mean sea level and the local topography slopes to the west toward San Francisco Bay (Figure 1).

The nearest surface water body to the site is San Leandro Creek, located approximately 4,700 feet south of the site.

2.3 SITE GEOLOGY AND HYDROGEOLOGY

The geology and hydrogeology of the site have been evaluated using the boring logs from previous site investigations. The typical soils at the site consist of mostly clay and silt from ground surface to approximately 17 feet bgs and this is underlain by a layer of silty sand which is approximately 4 feet thick. The silty sand is underlain by sand and gravelly sand to a depth of at least 26.5 feet bgs, the maximum depth explored at the site. Although the layers of clay and silt may be water-bearing at lower depths, the layers of silty sand and sand and gravel found below approximately 17 feet bgs are not only water-bearing but are also more permeable.

Groundwater monitoring wells MW1 through MW3 and MW5 are screened from 10 to 25 feet bgs. The depth to groundwater in the wells has historically ranged from approximately 15 to 20 feet bgs. Groundwater flow directions are generally to the northwest although the topography of the surrounding area slopes to the southwest.

2.4 SUMMARY OF PREVIOUS INVESTIGATIONS

In December 1998, AEI performed a geophysical survey (magnetometry and ground-penetrating radar) to ascertain the presence of USTs at the site (AEI 2004). No underground anomalies indicative of remaining USTs were identified (AEI 2004). Also, an ACHCSA letter dated 22 March 2005 indicated that the UST system was removed from the site prior to December 1998.

In March 2004, AEI conducted a subsurface investigation at the site in order to collect soil and grab groundwater samples (AEI 2004). Four soil borings (SB1 through SB4) were advanced to depths of 8 feet bgs (SB3 and SB4), 16 feet bgs (SB1), and 22 feet bgs (SB2) (AEI 2004).

In May 2005, ETIC conducted a subsurface investigation at the site to collect soil and groundwater samples (ETIC 2005). Nine soil borings (SB5-SB13) were advanced to approximately 25 feet bgs.

In April and May 2006, ETIC conducted a subsurface investigation at the site, and 17 soil borings (SB14-SB20 and V1-V10) were advanced to collect soil, groundwater, and soil vapor samples (ETIC 2006).

In January 2007, ETIC observed the installation of five soil vapor monitoring wells (VW1 through VW5) and four groundwater monitoring wells (MW1, MW2, MW3, and MW5) (ETIC 2007). Corrective action alternatives were evaluated as part of the report and excavation was the recommended corrective action for this site (ETIC 2007).

Groundwater monitoring and sampling activities have been conducted quarterly since March 2007. Well construction details are presented in Table 1. Soil sample analytical results are provided in Tables 2 and 3. Groundwater monitoring data are provided in Table 4. Physical properties analytical results for soil samples are provided in Table 5. Soil vapor analytical data are summarized in Table 6. Figure 2 shows the locations of wells and borings. Figure 3 shows the groundwater elevations, groundwater flow direction, and groundwater sample analytical results from the March 2009 monitoring event (ETIC 2009). Figure 4 shows the outline of the area of the proposed excavation.

3. SUBSURFACE INVESTIGATION

On 23 March 2009, ETIC observed the installation of seven soil vapor monitoring wells (VW6 through VW12). A permit was obtained from the Alameda County Public Works Agency (ACPWA). A copy of the permit is attached as Appendix B. A site-specific health and safety plan was used for this work. The work was conducted under the oversight of a registered professional. The locations of the vapor wells are shown on Figure 2.

The locations of the vapor wells were selected based on the historical hydrocarbon concentrations beneath the site, groundwater flow direction, and locations of onsite structures.

An advisory published by the Department of Toxic Substances Control (DTSC) and the Los Angeles Regional Water Quality Control Board (DTSC/LARWQCB 2003) and vapor intrusion evaluation guidelines published by the DTSC (DTSC 2004) were used as guidelines for the work detailed below.

3.1 ADVANCEMENT OF SOIL BORINGS AND SOIL SAMPLING

On 23 March 2009, soil borings VW6 through VW12 were advanced by Vironex Environmental Field Services, Inc. (Vironex) of Pacheco, California (C57 license #705927) with a hand auger to a depth of 6 feet bgs.

Soil samples were collected by using a slide hammer hand sampler at depths of 5 to 5.5 feet and 5.5 to 6 feet bgs. Soils were examined and characteristics recorded on the soil boring logs presented in Appendix C. The soil samples were sealed with Teflon tape, capped, labeled, placed in a cooler with ice, and submitted for analysis to a state-certified laboratory. Field methods and procedures are described in the protocols, presented in Appendix D.

3.2 SOIL VAPOR MONITORING WELL INSTALLATION

Borings VW6 through VW12 were completed as soil vapor monitoring wells. The wells were completed in accordance with the protocols provided in Appendix D and the well installation requirements issued by the ACPWA.

The vapor monitoring wells were constructed with 0.25-inch-diameter stainless steel tubing connected to a 0.4-inch-diameter, 6-inch-long, stainless steel 0.0057-inch pore screen. All connections were sealed with Swagelok® type fittings. The screen was capped at the bottom and connected to the tubing with a Swagelok® type fitting. A filter pack of #2/12 sand was placed between 5 and 6 feet bgs. The above-ground stainless steel tubing was sealed with a Swagelok® valve. The wells were then sealed with a 1-foot layer (4 to 5 feet bgs) of hydrated bentonite chips, followed by neat cement grout to just below ground surface. The well details are provided in Table 1 and on the boring logs in Appendix C.

3.3 SOIL VAPOR SAMPLE COLLECTION

On 27 March 2009, a purge test was conducted for well VW9 which involved purging the well of 1, 3, and 7 purge volumes and screening the samples with a photoionization detector to determine the relative hydrocarbon content. Based on the results of this purge test, a purge volume of 3 casing volumes was determined to be the preferred purge volume for the remaining samples to be collected at the site.

On 27 March 2009, following the purge test, soil vapor sampling was conducted from wells VW7 through VW12. On 23 April 2009, soil vapor sampling was conducted from previously installed wells VW2 and VW5. Vapor samples could not be collected from vapor wells VW1, VW3, VW4, and VW6 due to the presence of water in the wells.

The soil vapor samples were collected after purging 3 casing volumes from each well using Summa vacuum canisters. The initial pressure and the final pressure readings taken from the gauges on the Summa canisters were recorded. During sampling, a tracer (1,1-difluoroethane) was used to check for leaks. The samples were submitted to a state-certified laboratory for analysis. The field documents are included in Appendix E.

3.4 SURVEY OF THE WELLS

On 4 May 2009, the location of each groundwater monitoring well and ground surface elevation of each soil vapor monitoring well were surveyed by Morrow Surveying, a licensed land surveyor. The surveyor's report is provided in Appendix F.

3.5 WASTE CONTAINMENT AND DISPOSAL

The soil generated during drilling activities was collected in a 55-gallon drum and stored onsite. A soil sample was collected from the drum and submitted to Calscience Environmental Laboratories, Inc. (Calscience), a state-certified laboratory in Garden Grove, California. The sample was analyzed for Total Petroleum Hydrocarbons as gasoline (TPH-g), benzene, toluene, ethylbenzene, and total xylenes (BTEX), and total lead in order to characterize the soil for proper disposal. The laboratory analytical report and chain-of-custody documentation are included in Appendix G. The drum was removed from the site on 30 April 2009 and transported to an ExxonMobil-approved disposal facility.

4. RESULTS

4.1 LOCAL GEOLOGY AND HYDROGEOLOGY

The soils encountered during drilling were generally consistent with those observed in the previous borings at the site. The soils encountered during this investigation generally consisted of clayey silt and clay to 6 feet bgs, the total depth explored during this investigation. Detailed soil descriptions are presented in the boring logs in Appendix C.

4.2 SOIL SAMPLE ANALYTICAL METHODS AND RESULTS

Soil samples collected at depths from 5.5 to 6 feet bgs from borings VW6 through VW12 were submitted to Calscience and analyzed for Total Petroleum Hydrocarbons as diesel (TPH-d) and TPH-g by EPA Method 8015M and for BTEX, methyl tertiary butyl ether (MTBE), tertiary butyl alcohol (TBA), diisopropyl ether (DIPE), ethyl tertiary butyl ether (ETBE), tertiary amyl methyl ether (TAME), 1,2-dibromoethane (EDB), and 1,2-dichloroethane (1,2-DCA) by EPA Method 8260B. The analytical results are summarized in Tables 2 and 3. The laboratory analytical reports and chain-of-custody documentation are included in Appendix G.

TPH-g, TPH-d, benzene, MTBE, TBA, DIPE, ETBE, TAME, EDB, and 1,2-DCA were not detected in the soil samples.

Soil samples collected at depths from 5 to 5.5 feet bgs from borings VW6 through VW12 were also submitted to Calscience and analyzed for moisture content by ASTM D2216 and porosity and bulk density by API RP40. The analytical results are summarized in Table 5. The laboratory analytical reports and chain-of-custody documentation are included in Appendix G.

4.3 SOIL VAPOR SAMPLE ANALYTICAL METHODS AND RESULTS

Soil vapor samples collected from wells VW2, VW5, and VW7 through VW12 were submitted to Calscience for analysis. The samples were analyzed for TPH-g by EPA Method TO-3(M) and for BTEX, MTBE, TBA, DIPE, ETBE, TAME, EDB, 1,2-DCA, and 1,1-difluoroethane, by EPA Method TO-15. The samples were also analyzed for oxygen/argon, methane, and carbon dioxide by ASTM D-1946. The analytical results for the soil vapor samples are presented in Table 6 and on Figure 4. The maximum concentrations of TPH-g and benzene are listed below:

- 4,400,000 micrograms per cubic meter ($\mu\text{g}/\text{m}^3$) TPH-g (VW8).
- 150 $\mu\text{g}/\text{m}^3$ benzene (VW9 duplicate).

No MTBE, TBA, DIPE, ETBE, TAME, EDB, and 1,2-DCA were detected at or above laboratory reporting limits.

5. VAPOR INTRUSION EVALUATION

As requested by the ACHCSA, the potential health risks associated with hydrocarbon vapor intrusion to indoor air were evaluated. The objective of this evaluation was to assess the potential for risk to human health from exposure to chemicals of potential concern (COPCs) in indoor air via subsurface vapor intrusion. The COPCs are identified as fuel hydrocarbons, oxygenates, and additives.

This analysis consisted of comparison of the site maximum shallow soil gas concentrations to relevant ESLs developed by the Regional Water Quality Control Board San Francisco Bay Region (RWQCB 2008). The ESLs adopted by the RWQCB correspond to a target carcinogenic risk level of 1×10^{-6} and a target non-carcinogenic hazard quotient of 0.2.

Table 6 lists the lowest relevant ESLs for potential vapor intrusion concerns corresponding to residential and commercial/industrial land use (Table E-2, RWQCB 2008). Of the samples collected in March and April 2009:

- Residential ESLs were exceeded for TPH-g at sample locations VW2 and VW7 through VW12.
- Residential ESLs were exceeded for benzene at sample locations VW11 and VW12.
- Commercial/industrial ESLs were exceeded for TPH-g at sample locations VW2 and VW8 through VW11.
- Commercial/industrial ESLs were not exceeded for benzene.
- ESLs were not exceeded for the other compounds analyzed.

Vapor wells VW2, VW9, and VW12 are located near the southwestern property boundary. Residential ESLs are only slightly exceeded for benzene in well VW12. Based on residential ESLs for TPH-g, hazard quotients at these wells range from 0.34 (VW12) to 4.2 (VW2).

Based on commercial/industrial ESLs for TPH-g, hazard quotients for wells sampled in March and April 2009 ranged from 0.07 (VW5) to 30 (VW8). Well VW8 is located near the former USTs and an area of known impacted soil for which remediation (excavation) has been proposed.

It is expected that once source removal through excavation is conducted, hydrocarbon concentrations in vapor wells will decrease.

6. CONCLUSIONS AND RECOMMENDATIONS

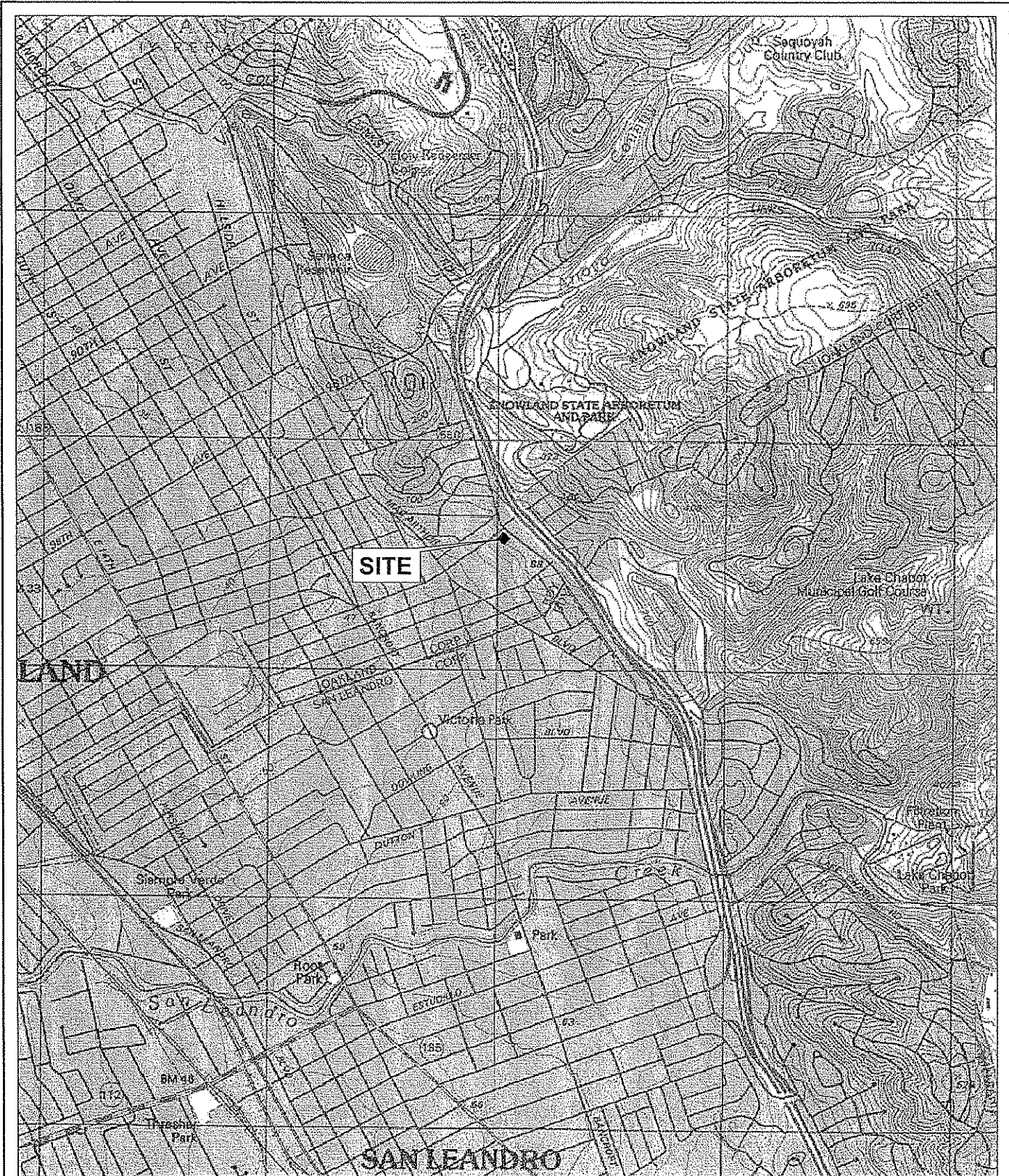
On 23 March 2009, ETIC observed the installation of seven soil vapor monitoring wells (VW6 through VW12) at former Exxon RS 74121, located at 10605 Foothill Boulevard, Oakland, California.

Based on the results of this investigation, excavation is again the recommended corrective action for this site. ETIC recommended excavation in its Well Installation and Additional Risk Assessment Report in May 2007. Upon approval from the ACHCSA, the excavation activities outlined in that report will be planned and implemented. For the extent of the proposed excavation see Figure 4. The ACHCSA will be kept informed of the status of the remedial action. A report detailing the results of the remedial action will be submitted within 90 days of remedial action completion. Additionally, in the event that the workscope must be altered significantly, the ACHCSA will be notified prior to implementing those changes to the workscope.

REFERENCES

- AEI (AEI Consultants). 2004. Phase II Subsurface Investigation Report, Project No. 8311, 10605 Foothill Boulevard, Oakland, California. AEI, Walnut Creek, California. 7 April.
- Braymer, R.W. 2000. Geologic map and map database of the Oakland metropolitan area, Alameda, Contra Costa, and San Francisco Counties, California: United States Geological Survey, Miscellaneous Field Studies MF-2342, Version 1.0.
- DTSC/LARWQCB (Department of Toxic Substances Control and California Regional Water Quality Control Board – Los Angeles Region). 2003. Advisory – Active Soil Gas Investigations. DTSC and LARWQCB, Glendale and Los Angeles, California. 28 January.
- DTSC (Department of Toxic Substances Control). 2004. Guidance for the Evaluation and Mitigation of Subsurface Vapor Intrusion to Indoor Air – Interim Final. DTSC, California Environmental Protection Agency. 15 December 2004 (Revised 7 February 2005).
- ETIC (ETIC Engineering, Inc.). 2005. Subsurface Investigation Report, Former Exxon Retail Site 7-4121, 10605 Foothill Boulevard, Oakland, California. ETIC, Pleasant Hill, California. July.
- ETIC (ETIC Engineering, Inc.). 2006. Subsurface Investigation and Risk Assessment Report, Former Exxon Retail Site 7-4121, 10605 Foothill Boulevard, Oakland, California. ETIC, Pleasant Hill, California. July.
- ETIC (ETIC Engineering, Inc.). 2007. Well Installation and Additional Risk Assessment Report, Former Exxon Retail Site 7-4121, 10605 Foothill Boulevard, Oakland, California. ETIC, Pleasant Hill, California. May.
- ETIC (ETIC Engineering, Inc.). 2009. Report of Groundwater Monitoring, First Quarter 2009, Former Exxon Retail Site 74121, 10605 Foothill Boulevard, Oakland, California. ETIC, Pleasant Hill, California. May.
- RWQCB (California Regional Water Quality Control Board, San Francisco Bay Region). 2008. Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater. RWQCB, Oakland, California. November 2007 with May 2008 updates.

Figures



SOURCE: USGS Topographic Map

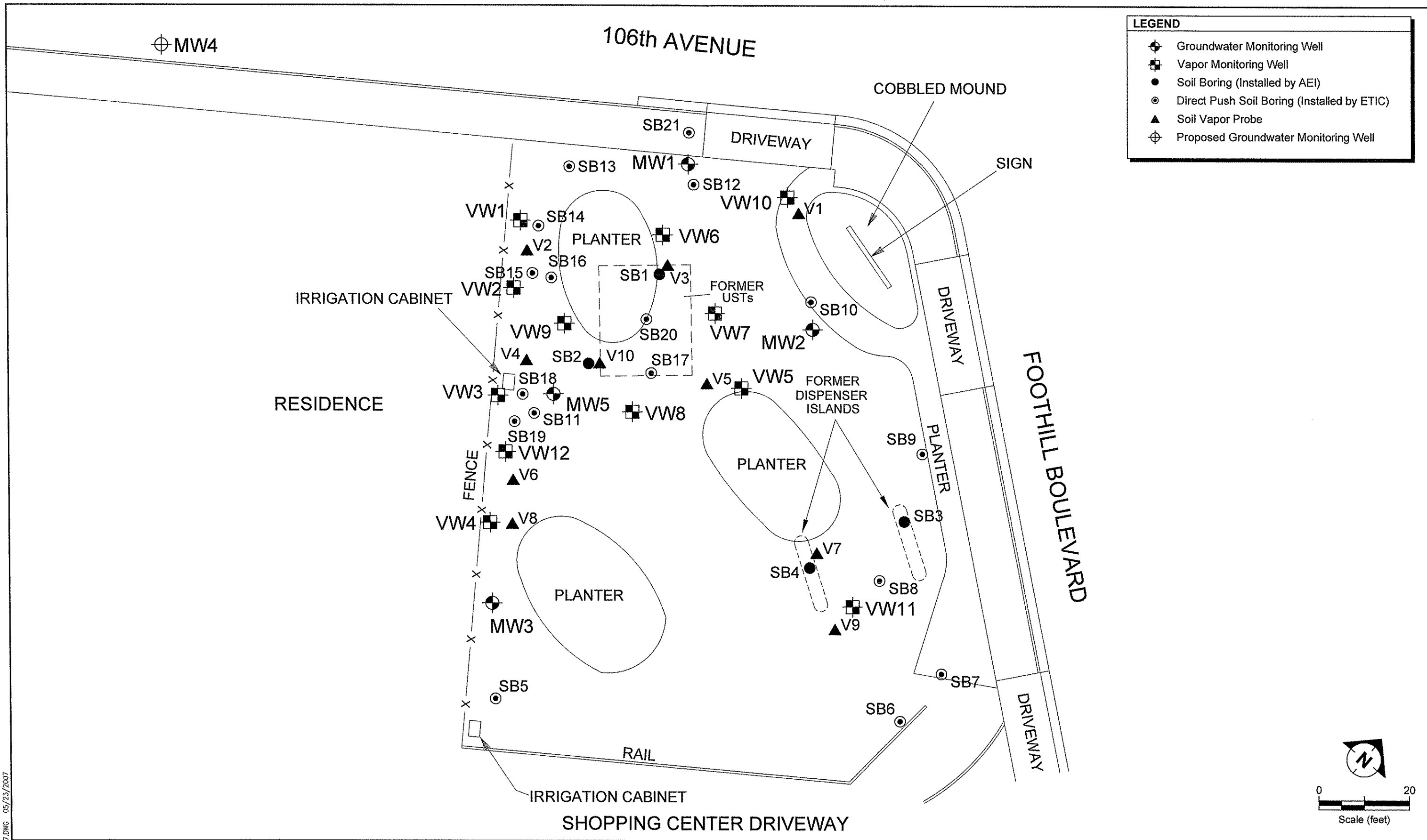
FILENAME: TOP00405.DWG 04/15/05



SITE LOCATION AND TOPOGRAPHIC MAP
 FORMER EXXON RS 74121
 10605 FOOTHILL BOULEVARD
 OAKLAND, CALIFORNIA

FIGURE:

1



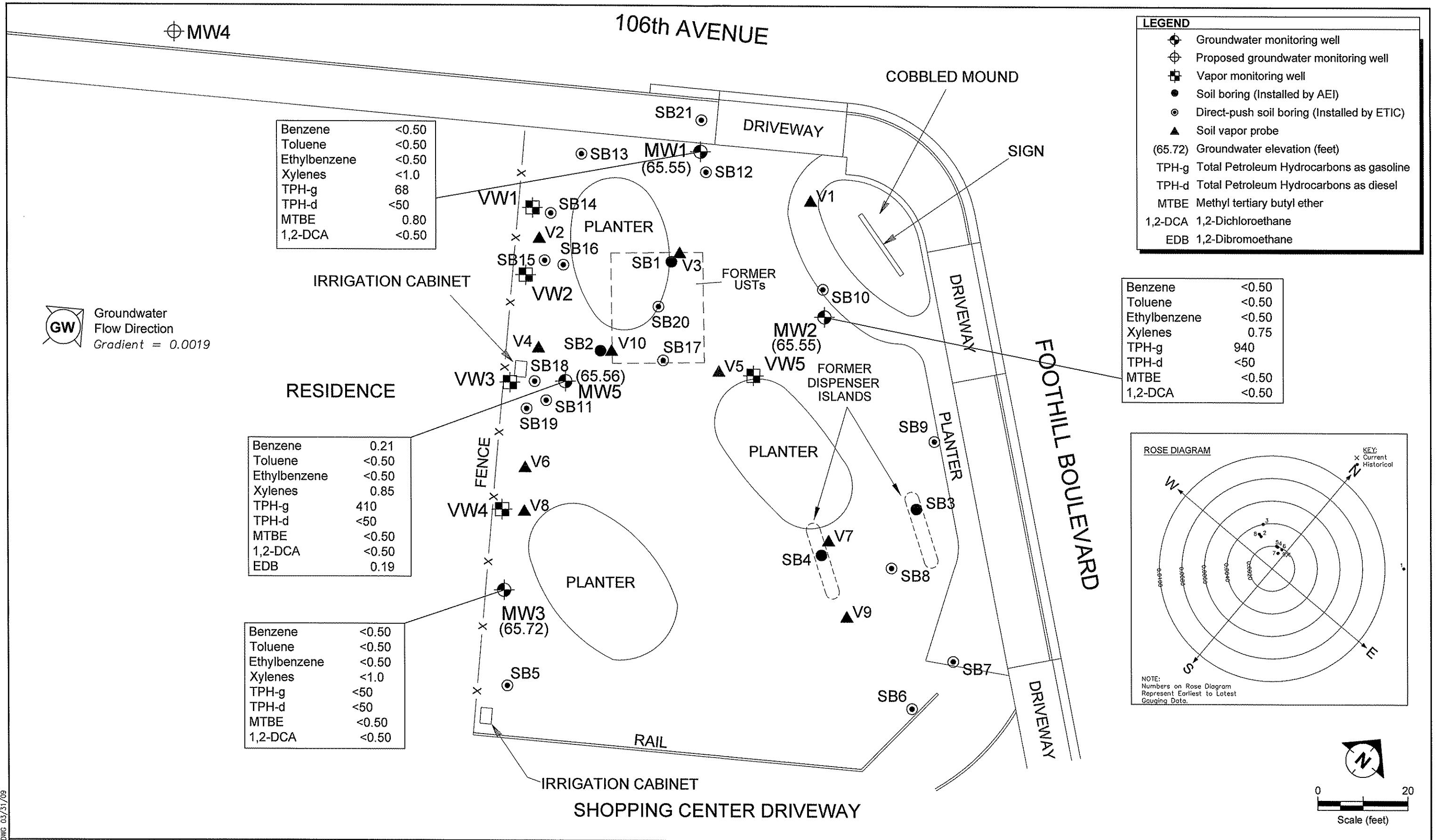
FILENAME: BASE0507.DWG 05/23/2007



SITE MAP
 FORMER EXXON RS 74121
 10605 FOOHILL BOULEVARD
 OAKLAND, CALIFORNIA

FIGURE:

2



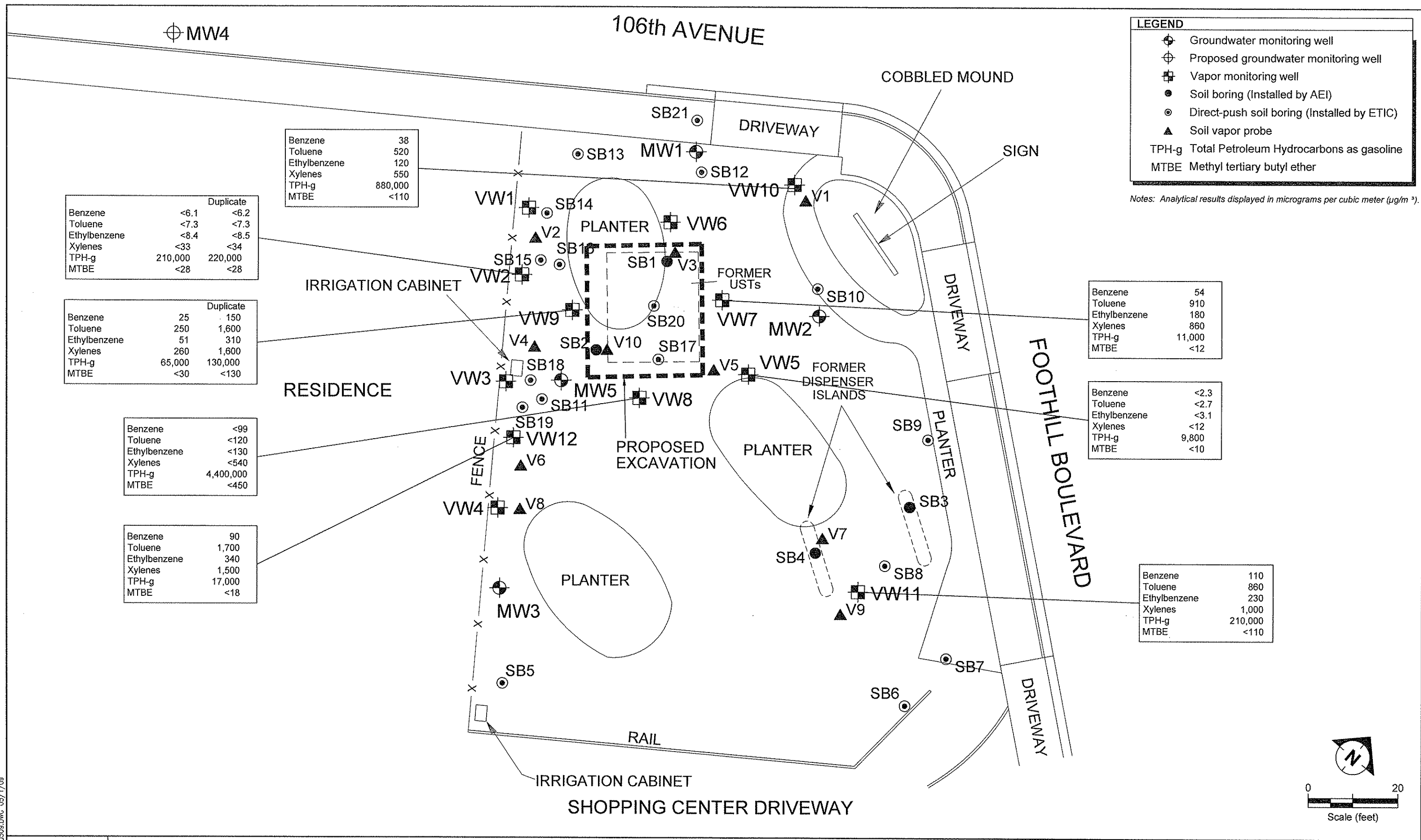
FILENAME: 102009.DWG 03/31/09



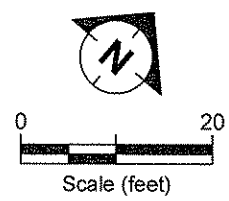
SITE MAP SHOWING GROUNDWATER ELEVATIONS AND ANALYTICAL RESULTS
 FORMER EXXON RS 74121
 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA
 12 MARCH 2009

FIGURE:

3



SITE MAP SHOWING SOIL VAPOR ANALYTICAL RESULTS
 FORMER EXXON RS 74121
 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA
 27 MARCH AND 23 APRIL 2009



FILENAME: Sample0509.DWG 05/1/09



Tables

TABLE 1 WELL CONSTRUCTION DETAILS, FORMER EXXON RS 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Well Number	Well Installation Date	Elevation TOC (feet)	Casing Material	Total Depth (feet)	Well Depth (feet)	Borehole Diameter (inches)	Casing Diameter (inches)	Screened Interval (feet)	Slot Size (inches)	Filter Pack Interval (feet)	Filter Pack Material
MW1	a 01/23/07	82.47	PVC	26.5	25	8	2	10 - 25	0.010	8 - 25	#2/12 Sand
MW2	a 01/23/07	84.40	PVC	26.5	25	8	2	10 - 25	0.010	8 - 25	#2/12 Sand
MW3	a 01/24/07	83.25	PVC	26.5	25	8	2	10 - 25	0.010	8 - 25	#2/12 Sand
MW5	a 01/23/07	82.65	PVC	26.5	25	8	2	10 - 25	0.010	8 - 25	#2/12 Sand
VW1	a 01/22/07	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW2	a 01/22/07	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW3	a 01/22/07	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW4	a 01/22/07	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW5	a 01/22/07	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW6	b 03/23/09	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW7	b 03/23/09	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW8	b 03/23/09	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW9	b 03/23/09	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW10	b 03/23/09	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW11	b 03/23/09	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand
VW12	b 03/23/09	--	SS	6	6	6	0.25	5.25 - 5.75	0.0057	5 - 6	#2/12 Sand

TABLE 1 WELL CONSTRUCTION DETAILS, FORMER EXXON RS 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Well Number	Well Installation Date	Elevation TOC (feet)	Casing Material	Total Depth (feet)	Well Depth (feet)	Borehole Diameter (inches)	Casing Diameter (inches)	Screened Interval (feet)	Slot Size (inches)	Filter Pack Interval (feet)	Filter Pack Material
-------------	------------------------	----------------------	-----------------	--------------------	-------------------	----------------------------	--------------------------	--------------------------	--------------------	-----------------------------	----------------------

Notes:

a Well surveyed on 12 March 2007 by Morrow Surveying.

b Well surveyed on 4 May 2009 by Morrow Surveying.

PVC Polyvinyl chloride.

SS Stainless steel.

TOC Top of casing.

TABLE 2 SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8015B AND 8021B,
FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)					TPH-g	TPH-d	MTBE
			Benzene	Toluene	Ethyl-benzene	Total Xylenes				
SB1	03/19/04	11	0.55	11	0.92	2.6	1,000	590	<2.5	
SB2	03/19/04	18	<0.05	0.39	0.40	0.13	65	37	<0.5	
SB3	03/19/04	5	<0.005	<0.005	<0.005	<0.005	<1.0	<1.0	<0.05	
SB4	03/19/04	5	<0.005	<0.005	<0.005	<0.005	<1.0	2.1	<0.05	
SB5	05/26/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<4.98	<10.1	<0.002 ^a	
SB5	05/26/05	17.5-18	<0.001	<0.005	<0.005	<0.005	<4.97	<9.92	<0.002 ^a	
SB5	05/26/05	24.5-25	<0.001	<0.005	<0.005	<0.005	<4.99	10.6	<0.002 ^a	
SB6	05/26/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<5.03	10.2	<0.002 ^a	
SB6	05/26/05	19.5-20	<0.001	<0.005	<0.005	<0.005	<5.03	<10.1	<0.002 ^a	
SB6	05/26/05	21.5-22	<0.001	<0.005	<0.005	<0.005	<4.96	<10	<0.002 ^a	
SB6	05/26/05	24.5-25	<0.001	<0.005	<0.005	<0.005	<4.98	<10	<0.002 ^a	
SB7	05/26/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<5.02	<10.2	<0.002 ^a	
SB7	05/26/05	18-18.5	<0.001	<0.005	<0.005	<0.005	<5	<10	<0.002 ^a	
SB7	05/26/05	22.5-23	<0.001	<0.005	<0.005	<0.005	<4.96	<10	<0.002 ^a	
SB7	05/26/05	24.5-25	<0.001	<0.005	<0.005	<0.005	<5.02	<10.2	<0.002 ^a	
SB8	05/26/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<4.97	<9.92	<0.002 ^a	
SB8	05/26/05	17.5-18	0.0010 ^b	<0.005	<0.005	<0.005	<4.96	<9.92	<0.002 ^a	
SB8	05/26/05	21.5-22	0.0307	<0.005	0.0120	0.0205	11.2	<10	<0.002 ^a	
SB8	05/26/05	24.5-25	0.0414	0.0153	0.0184	0.0197	10.2	<10	<0.002 ^a	
SB9	05/27/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<5.02	<9.80	<0.002 ^a	
SB9	05/27/05	18-18.5	<0.001	<0.005	<0.005	<0.005	<5	<10	<0.002 ^a	
SB9	05/27/05	19.5-20	<0.001	<0.005	<0.005	<0.005	<4.96	<10	<0.002 ^a	
SB9	05/27/05	24.5-25	1.58	1.10	0.400	1.72	279	<9.88	<0.002 ^a	
SB10	05/27/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<5.01	<9.92	<0.002 ^a	

TABLE 2

SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8015B AND 8021B,
FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)						
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-g	TPH-d	MTBE
SB10	05/27/05	17.5-18	<0.001	<0.005	<0.005	<0.005	<5.03	<10	<0.002 ^a
SB10	05/27/05	24.5-25	<0.001	<0.005	<0.005	<0.005	<5.01	<10	<0.002 ^a
SB11	05/27/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<4.99	<10.2	<0.002 ^a
SB11	05/27/05	18.5-19	<0.001	<0.005	<0.005	<0.005	<4.95	<10	<0.002 ^a
SB11	05/27/05	24.5-25	0.0082	<0.005	<0.005	0.0053	<4.98	<10	<0.002 ^a
SB12	05/27/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<4.97	<10	<0.002 ^a
SB12	05/27/05	16.5-17	<0.001	<0.0051	<0.0051	<0.0051	<5.05	<9.88	<0.002 ^a
SB12	05/27/05	25.5-26	<0.001	<0.005	<0.005	<0.005	<4.98	<9.96	<0.002 ^a
SB13	05/27/05	5-5.5	<0.001	<0.005	<0.005	<0.005	<5.02	<9.92	<0.002 ^a
SB13	05/27/05	18.5-19	<0.001	<0.0051	<0.0051	<0.0051	<5.05	<9.92	<0.002 ^a
SB13	05/27/05	24.5-25	0.0011	<0.005	<0.005	<0.005	<4.95	<9.92	<0.002 ^a
SB14	05/02/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	3.2	<0.005 ^a
SB14	05/02/06	10-10.5	<0.001	<0.001	<0.001	<0.001	<0.1	6.5	<0.005 ^a
SB14	05/02/06	15-15.5	<0.001	<0.001	<0.001	<0.001	<0.1	2.1	<0.005 ^a
SB14	05/02/06	20-20.5	<0.001	<0.001	<0.001	0.0088	1.300	2.8	<0.005 ^a
SB14	05/02/06	24.5-25	<0.001	<0.001	<0.001	<0.001	<0.1	2.2	<0.005 ^a
SB15	05/02/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	3.1	<0.005 ^a
SB15	05/02/06	15-15.5	<0.001	<0.001	<0.001	<0.001	<0.1	8.7	<0.005 ^a
SB15	05/02/06	20-20.5	<0.001	<0.001	0.0016	<0.001	0.160	2.5	<0.005 ^a
SB15	05/02/06	24.5-25	<0.001	<0.001	0.0069	<0.001	0.270	1.3	<0.005 ^a
SB16	05/02/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	14	<0.005 ^a
SB16	05/02/06	10-10.5	<0.001	<0.001	<0.001	<0.001	<0.1	5.2	<0.005 ^a
SB16	05/02/06	15-15.5	<0.001	<0.001	<0.001	<0.001	<0.1	4.2	<0.005 ^a
SB16	05/02/06	20-20.5	0.120	0.052	0.043	0.060	14	9.3	<0.005 ^a
SB16	05/02/06	24.5-25	<0.001	<0.001	0.0018	<0.001	<0.1	<1.0	<0.005 ^a
SB17	05/02/06	5.5-6	<0.001	<0.001	<0.001	<0.001	<0.1	18	<0.005 ^a

TABLE 2

SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8015B AND 8021B,
FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)						
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-g	TPH-d	MTBE
SB17	05/02/06	10-10.5	<0.01	0.030	0.310	<0.01	38	260	<0.12 ^a
SB17	05/02/06	15-15.5	0.018	0.0028	0.017	0.0040	0.700	3.5	<0.005 ^a
SB17	05/02/06	19.5-20	3.2	2.0	8.8	31	320	18	<1.2 ^a
SB17	05/02/06	24.5-25	<0.001	<0.001	<0.001	0.0011	<0.1	1.1	<0.005 ^a
SB18	05/03/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
SB18	05/03/06	10-10.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
SB18	05/03/06	15-15.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
SB18	05/03/06	19.5-20	<0.10	<0.10	<0.10	<0.10	29	14	<0.005 ^a
SB18	05/03/06	24.5-25	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
SB19	05/02/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	1.4	<0.005 ^a
SB19	05/02/06	10-10.5	<0.001	<0.001	<0.001	0.0015	0.230	4.8	<0.005 ^a
SB19	05/02/06	15-15.5	<0.001	<0.001	<0.001	<0.001	<0.1	1.2	<0.005 ^a
SB19	05/02/06	20-20.5	<0.10	<0.10	<0.10	0.15	19	5.8	<0.005 ^a
SB19	05/02/06	24.5-25	<0.001	<0.001	<0.001	<0.001	<0.1	1.7	<0.005 ^a
SB20	05/02/06	5.5-6	<0.001	<0.001	<0.001	<0.001	<0.1	14	<0.005 ^a
SB20	05/02/06	10-10.5	0.58	0.60	0.80	0.72	76	98	<0.051 ^a
SB20	05/02/06	15-15.5	26	39	24	12	1,300	270	<0.12 ^a
SB20	05/02/06	19.5-20	20	18	66	280	2,700	250	<2.5 ^a
SB20	05/02/06	23.5-24	0.013	0.0047	0.023	0.0082	0.610	7.0	<0.005 ^a
SB21	05/02/06	8-8.5	<0.001	<0.001	<0.001	<0.001	<0.1	1.4	<0.005 ^a
SB21	05/02/06	13-13.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
SB21	05/02/06	18-18.5	<0.001	<0.001	<0.001	<0.001	<0.1	1.7	0.0088 ^a
SB21	05/02/06	19.5-20	<0.001	<0.001	<0.001	0.014	<1	2.4	0.012 ^a
SB21	05/02/06	23-23.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
SB21	05/02/06	24.5-25	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
V3	05/03/06	9.5-10	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
V4	05/03/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a

TABLE 2

SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8015B AND 8021B,
FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)						
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-g	TPH-d	MTBE
V4	05/03/06	7.5-8	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
V5	05/03/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
V5	05/03/06	7.5-8	<0.001	<0.001	<0.001	<0.001	0.240	<1.0	<0.005 ^a
V8	05/03/06	5-5.5	<0.001	<0.001	<0.001	<0.001	<0.1	<1.0	<0.005 ^a
V8	05/03/06	7.5-8	<0.001	<0.001	<0.001	<0.001	<0.1	1.0	<0.005 ^a
VW1	01/22/07	5.5-6	<0.00101	<0.00101	<0.00101	<0.00303	<0.101	<3.96	<0.00200 ^a
VW2	01/22/07	5.5-6	<0.000990	<0.000990	<0.000990	<0.00297	<0.0990	<3.91	<0.00200 ^a
VW3	01/22/07	5.5-6	<0.00101	<0.00101	<0.00101	<0.00302	<0.101	<3.87	<0.00200 ^a
VW4	01/22/07	5.5-6	<0.00101	<0.00101	<0.00101	<0.00303	<0.101	8.73	<0.00200 ^a
VW5	01/22/07	5.5-6	<0.000990	<0.000990	<0.000990	<0.00297	<0.0990	<3.86	<0.00200 ^a
VW6	03/23/09	5.5-6	--	--	--	--	<0.50	<5.0	<0.0050 ^a
VW7	03/23/09	5.5-6	--	--	--	--	<0.50	<5.0	<0.0050 ^a
VW8	03/23/09	5.5-6	--	--	--	--	<0.50	<5.0	<0.0050 ^a
VW9	03/23/09	5.5-6	--	--	--	--	<0.50	<5.0	<0.0050 ^a
VW10	03/23/09	5.5-6	--	--	--	--	<0.50	<5.0	<0.0050 ^a
VW11	03/23/09	5.5-6	--	--	--	--	<0.50	<5.0	<0.0050 ^a
VW12	03/23/09	5.5-6	--	--	--	--	<0.50	<5.0	<0.0050 ^a
MW1	01/23/07	6-6.5	<0.000992	<0.000992	<0.000992	<0.00298	<0.0992	<3.95	<0.00200 ^a

TABLE 2

SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8015B AND 8021B,
FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)						
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-g	TPH-d	MTBE
MW1	01/23/07	8-8.5	<0.000994	<0.000994	<0.000994	<0.00298	<0.0994	<3.91	<0.00200 ^a
MW1	01/23/07	10-10.5	<0.00100	<0.00100	<0.00100	<0.00300	<0.100	<3.88	<0.00200 ^a
MW1	01/23/07	11.5-12	<0.000994	<0.000994	<0.000994	<0.00298	<0.0994	<3.91	<0.00200 ^a
MW1	01/23/07	12-12.5	<0.000996	<0.000996	<0.000996	<0.00299	<0.0996	<3.93	<0.00200 ^a
MW1	01/23/07	14-14.5	<0.00101	<0.00101	<0.00101	<0.00302	<0.101	<3.89	<0.00200 ^a
MW1	01/23/07	15.5-16	<0.00100	<0.00100	<0.00100	<0.00300	<0.100	<3.96	<0.00200 ^a
MW1	01/23/07	16-16.5	<0.000990	0.00121	<0.000990	<0.00297	<0.0990	<3.92	<0.00200 ^a
MW1	01/23/07	17.5-18	0.00857	0.00493	0.00126	0.00459	0.720	<3.97	<0.00200 ^{a,c}
MW1	01/23/07	18-18.5	<0.00100	0.00128	<0.00100	<0.00301	<0.100	<3.88	<0.00200 ^a
MW1	01/23/07	19.5-20	<0.00101	<0.00101	<0.00101	0.00413	0.454	<3.92	<0.00200 ^a
MW1	01/23/07	20-20.5	0.00128	0.00387	0.00220	0.0120	1.38	<3.85	<0.00200 ^a
MW1	01/23/07	22-22.5	0.00539	0.00651	0.00471	0.0336	3.92	<3.91	<0.00200 ^a
MW2	01/23/07	6-6.5	<0.00100	<0.00100	<0.00100	<0.00301	<0.100	<4.00	<0.00200 ^a
MW2	01/23/07	8-8.5	0.00104	0.00112	<0.00101	<0.00302	<0.101	<3.87	<0.00200 ^a
MW2	01/23/07	10-10.5	<0.00101	0.00110	<0.00101	<0.00302	<0.101	<3.93	<0.00200 ^a
MW2	01/23/07	12-12.5	<0.00101	<0.00101	<0.00101	<0.00303	<0.101	<3.84	<0.00200 ^a
MW2	01/23/07	14-14.5	<0.000990	<0.000990	<0.000990	<0.00297	<0.0990	<3.94	<0.00200 ^a
MW2	01/23/07	15.5-16	<0.000994	<0.000994	<0.000994	<0.00298	<0.0994	<3.86	<0.00200 ^a
MW2	01/23/07	16-16.5	0.00133	<0.00101	<0.00101	<0.00303	<0.101	<3.97	<0.00200 ^a
MW2	01/23/07	18-18.5	0.00492	<0.000992	<0.000992	<0.00298	0.508	<3.91	<0.00200 ^a
MW2	01/23/07	19.5-20	<0.000992	<0.000992	<0.000992	<0.00298	<0.0992	<3.74	<0.00200 ^a
MW2	01/23/07	20-20.5	0.00633	<0.00101	0.00128	<0.00303	0.672	<3.83	<0.00200 ^a
MW2	01/23/07	21.5-22	0.00369	<0.00100	0.00235	0.0105	2.85	<3.86	<0.00200 ^a
MW2	01/23/07	22-22.5	0.00643	<0.000996	0.00299	0.0138	3.32	<3.81	<0.00200 ^a
MW2	01/23/07	23.5-24	0.00185	<0.00101	<0.00101	<0.00302	0.591	<3.76	<0.00200 ^a
MW2	01/23/07	24-24.5	0.00136	0.00678	0.0141	0.0891	18.7	<3.73	<0.00200 ^a
MW2	01/23/07	26-26.5	4.40	2.12	2.29	3.79	964	10.6	<0.00200 ^a
MW3	01/24/07	6-6.5	<0.00101	<0.00101	<0.00101	<0.00302	<0.101	<3.82	<0.00200 ^a
MW3	01/24/07	8-8.5	<0.000992	<0.000992	<0.000992	<0.00298	<0.0992	<3.79	<0.00200 ^a
MW3	01/24/07	10-10.5	0.00231	0.00114	<0.00101	<0.00302	0.141	<3.70	<0.00200 ^a
MW3	01/24/07	12-12.5	0.00102	<0.00101	<0.00101	<0.00302	<0.101	<3.99	<0.00200 ^a

TABLE 2 SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8015B AND 8021B,
FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)						
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-g	TPH-d	MTBE
MW3	01/24/07	14-14.5	0.00484	0.00206	<0.00101	<0.00301	0.363	<3.80	<0.00200 ^a
MW3	01/24/07	16-16.5	<0.00101	<0.00101	<0.00101	<0.00303	<0.101	<3.95	<0.00200 ^a
MW3	01/24/07	18-18.5	0.00917	0.00404	0.00151	<0.00301	0.794	<3.71	<0.00200 ^a
MW3	01/24/07	20-20.5	<0.00101	<0.00101	<0.00101	<0.00303	<0.101	<3.96	<0.00200 ^a
MW3	01/24/07	22-22.5	0.00174	<0.000990	<0.000990	<0.00297	<0.0990	<3.71	<0.00200 ^a
MW3	01/24/07	24-24.5	<0.000996	<0.000996	<0.000996	<0.00299	<0.0996	<3.76	<0.00200 ^a
MW3	01/24/07	26-26.5	<0.000992	<0.000992	<0.000992	<0.00298	<0.0992	<3.89	<0.00200 ^a
MW5	01/23/07	6-6.5	<0.00100	<0.00100	<0.00100	<0.00301	<0.100	<3.79	<0.00200 ^a
MW5	01/23/07	8-8.5	<0.00100	<0.00100	<0.00100	<0.00301	<0.100	<3.76	<0.00200 ^a
MW5	01/23/07	10-10.5	0.00265	<0.000996	<0.000996	<0.00299	0.274	<3.94	<0.00200 ^a
MW5	01/23/07	12-12.5	<0.000998	<0.000998	<0.000998	<0.00299	<0.0998	<3.82	<0.00200 ^a
MW5	01/23/07	14-14.5	<0.00100	<0.00100	<0.00100	<0.00301	<0.100	<3.92	<0.00200 ^a
MW5	01/23/07	16-16.5	<0.00100	<0.00100	<0.00100	<0.00301	<0.100	<3.98	<0.00200 ^a
MW5	01/23/07	18-18.5	0.00189	<0.000994	<0.000994	<0.00298	0.385	<3.90	<0.00200 ^a
MW5	01/23/07	19.5-20	0.0102	0.00149	0.00211	0.0125	2.01	<3.83	<0.00200 ^a
MW5	01/23/07	20-20.5	0.0138	<0.000994	0.00279	0.0104	2.66	<3.98	<0.00200 ^a
MW5	01/23/07	22-22.5	0.00111	<0.00100	<0.00100	<0.00301	0.603	<3.80	<0.00200 ^a
MW5	01/23/07	24-24.5	0.00666	<0.000996	<0.000996	<0.00299	0.138	<3.81	<0.00200 ^a
MW5	01/23/07	26-26.5	0.00288	<0.000992	<0.000992	<0.00298	<0.0992	<3.74	<0.00200 ^a

- a Methyl tertiary butyl ether by 8260B.
- b Estimated value below reporting limit.
- c Secondary ion abundances were outside method requirements. Identification based on analytical judgement.

MTBE Methyl tertiary butyl ether by EPA Method 8021B unless otherwise indicated.
 TPH-g Total Petroleum Hydrocarbons as gasoline by EPA Method 8015B.
 TPH-d Total Petroleum Hydrocarbons as diesel by EPA Method 8015B.

mg/kg Milligrams per kilogram.

TABLE 3 SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8260B, FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)											
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE	TBA	DIPE	ETBE	1,2-DCA	TAME	1,2-EDB	
SB1	03/19/04	11	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SB2	03/19/04	18	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SB3	03/19/04	5	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SB4	03/19/04	5	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SB5	05/26/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB5	05/26/05	17.5-18	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB5	05/26/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB6	05/26/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB6	05/26/05	19.5-20	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB6	05/26/05	21.5-22	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB6	05/26/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB7	05/26/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB7	05/26/05	18-18.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB7	05/26/05	22.5-23	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB7	05/26/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB8	05/26/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB8	05/26/05	17.5-18	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB8	05/26/05	21.5-22	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB8	05/26/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB9	05/27/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB9	05/27/05	18-18.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB9	05/27/05	19.5-20	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB9	05/27/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB10	05/27/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB10	05/27/05	17.5-18	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB10	05/27/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB11	05/27/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB11	05/27/05	18.5-19	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB11	05/27/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB12	05/27/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB12	05/27/05	16.5-17	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB12	05/27/05	25.5-26	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB13	05/27/05	5-5.5	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB13	05/27/05	18.5-19	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB13	05/27/05	24.5-25	NA	NA	NA	NA	<0.002	NA	NA	NA	NA	NA	NA	NA
SB14	05/02/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB14	05/02/06	10-10.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050

TABLE 3 SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8260B, FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)										
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE	TBA	DIPE	ETBE	1,2-DCA	TAME	1,2-EDB
SB14	05/02/06	15-15.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB14	05/02/06	20-20.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB14	05/02/06	24.5-25	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB15	05/02/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB15	05/02/06	15-15.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB15	05/02/06	20-20.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB15	05/02/06	24.5-25	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB16	05/02/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB16	05/02/06	10-10.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB16	05/02/06	15-15.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB16	05/02/06	20-20.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB16	05/02/06	24.5-25	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB17	05/02/06	5.5-6	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB17	05/02/06	10-10.5	NA	NA	NA	NA	<0.12	<25	<0.12	<0.12	<0.12	<0.12	<0.12
SB17	05/02/06	15-15.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB17	05/02/06	19.5-20	NA	NA	NA	NA	<1.2	<250	<1.2	<1.2	<1.2	<1.2	<1.2
SB17	05/02/06	24.5-25	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB18	05/03/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB18	05/03/06	10-10.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB18	05/03/06	15-15.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB18	05/03/06	19.5-20	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB18	05/03/06	24.5-25	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB19	05/02/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB19	05/02/06	10-10.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB19	05/02/06	15-15.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB19	05/02/06	20-20.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB19	05/02/06	24.5-25	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB20	05/02/06	5.5-6	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB20	05/02/06	10-10.5	NA	NA	NA	NA	<0.051	<0.200	<0.051	<0.051	<0.051	<0.051	<0.051
SB20	05/02/06	15-15.5	NA	NA	NA	NA	<0.12	<25	<0.12	<0.12	<0.12	<0.12	<0.12
SB20	05/02/06	19.5-20	NA	NA	NA	NA	<2.5	<500	<2.5	<2.5	<2.5	<2.5	<2.5
SB20	05/02/06	23.5-24	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB21	05/02/06	8-8.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB21	05/02/06	13-13.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB21	05/02/06	18-18.5	NA	NA	NA	NA	0.0088	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB21	05/02/06	19.5-20	NA	NA	NA	NA	0.012	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB21	05/02/06	23-23.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
SB21	05/02/06	24.5-25	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
V3	05/03/06	9.5-10	NA	NA	NA	<0.001	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
V4	05/03/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
V4	05/03/06	7.5-8	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050

TABLE 3 SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8260B, FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)										
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE	TBA	DIPE	ETBE	1,2-DCA	TAME	1,2-EDB
V5	05/03/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
V5	05/03/06	7.5-8	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
V8	05/03/06	5-5.5	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
V8	05/03/06	7.5-8	NA	NA	NA	NA	<0.0050	<0.020	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050
VW1	01/22/07	5.5-6	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
VW2	01/22/07	5.5-6	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
VW3	01/22/07	5.5-6	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
VW4	01/22/07	5.5-6	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
VW5	01/22/07	5.5-6	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
VW6	03/23/09	5.5-6	<0.0050	<0.0050	0.00032b	0.0015b	<0.0050	<0.050	<0.010	<0.010	<0.0050	<0.010	<0.0050
VW7	03/23/09	5.5-6	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.0050	<0.010	<0.0050
VW8	03/23/09	5.5-6	<0.0050	<0.0050	0.00018b	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.0050	<0.010	<0.0050
VW9	03/23/09	5.5-6	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.0050	<0.010	<0.0050
VW10	03/23/09	5.5-6	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.0050	<0.010	<0.0050
VW11	03/23/09	5.5-6	<0.0050	0.00051b	0.00071b	0.0032b	<0.0050	<0.050	<0.010	<0.010	<0.0050	<0.010	<0.0050
VW12	03/23/09	5.5-6	<0.0050	<0.0050	<0.0050	0.00033b	<0.0050	<0.050	<0.010	<0.010	<0.0050	<0.010	<0.0050
MW1	01/23/07	6-6.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	8-8.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	10-10.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	11.5-12	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	12-12.5	<0.00200	0.00211	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	14-14.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	15.5-16	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	16-16.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	17.5-18	<0.00200	0.00221	<0.00200	<0.00500	<0.00200a	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	18-18.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	19.5-20	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	20-20.5	<0.00200	0.00403	0.00202	0.00546	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW1	01/23/07	22-22.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	6-6.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	8-8.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	10-10.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	12-12.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	14-14.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200

TABLE 3 SOIL SAMPLE ANALYTICAL RESULTS BY EPA METHOD 8260B, FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Sample ID	Date	Depth (feet)	Concentration (mg/kg)										
			Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE	TBA	DIPE	ETBE	1,2-DCA	TAME	1,2-EDB
MW2	01/23/07	15.5-16	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	16-16.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	18-18.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	19.5-20	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	20-20.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	21.5-22	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	22-22.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	23.5-24	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	24-24.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW2	01/23/07	26-26.5	<0.00200	0.00944	<0.00200	0.0268	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	6-6.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	8-8.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	10-10.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	12-12.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	14-14.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	16-16.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	18-18.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	20-20.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	22-22.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	24-24.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW3	01/24/07	26-26.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	6-6.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	8-8.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	10-10.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	12-12.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	14-14.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	16-16.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	18-18.5	<0.00200	0.00229	0.00217	0.00878	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	19.5-20	<0.00200	<0.00200	<0.00200	0.00562	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	20-20.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	22-22.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	24-24.5	0.00517	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200
MW5	01/23/07	26-26.5	<0.00200	<0.00200	<0.00200	<0.00500	<0.00200	<0.0500	<0.00200	<0.00500	<0.00200	<0.00200	<0.00200

a Secondary ion abundances were outside method requirements. Identification based on analytical judgement.
 b Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.

MTBE Methyl tertiary butyl ether.
 TBA Tertiary butyl alcohol.
 DIPE Diisopropyl ether.
 ETBE Ethyl tertiary butyl ether.
 1,2-DCA 1,2-Dichloroethane.
 TAME Tertiary amyl methyl ether.
 1,2-EDB 1,2-Dibromoethane.
 NA Not analyzed.

mg/kg Milligrams per kilogram.

TABLE 4 GROUNDWATER MONITORING DATA, FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Well ID	Date	Top of Casing Elevation (feet)	Depth to Water (feet)	Groundwater Elevation (feet)	LPH Thickness (feet)	Concentration (µg/L)												
						Benzene	Toluene	Ethylbenzene	Xylenes	TPH-g	TPH-d	MTBE	TBA	DIPE	ETBE	1,2-DCA	TAME	EDB
MW1	03/08/07	82.47	15.10	67.37	0.00	<1.00	1.21	<1.00	<3.00	440	119	1.91	<10.0	<0.500	<0.500	<0.500	0.560	<0.500
MW1	06/08/07	82.47	16.47	66.00	0.00	<0.50	<0.50	<0.50	<0.50	127	<47.6	0.880	<10.0 ^{a,b}	<0.500	<0.500	<0.500	<0.500	<0.500
MW1	09/06/07	82.47	17.47	65.00	0.00	<0.50	<0.50	<0.50	<0.50	78.0	<47.2	0.590	<10.0 ^{a,b}	<0.500	<0.500	<0.500	<0.500	<0.500
MW1	12/03/07	82.47	18.10	64.37	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW1	03/19/08	82.47	16.20	66.27	0.00	<0.50	<0.50	<0.50	<0.50	51.3	61 ^c	3.08	<10.0	<0.500	<0.500	<0.500	0.930	<0.500
MW1	06/11/08	82.47	17.24	65.23	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	0.99	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW1	09/16/08	82.47	18.37	64.10	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW1	12/01/08	82.47	18.85	63.62	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW1	03/12/09	82.47	16.92	65.55	0.00	<0.50	<0.50	<0.50	<1.0	68	<50	0.80	<10	<0.50	<0.50	<0.50	<0.50	<0.50
MW2	03/08/07	84.40	16.97	67.43	0.00	1.33	3.52	2.41	<3.00	1,620	550	<0.500	<10.0	<0.500	<0.500	<0.500	<0.500	<0.500
MW2	06/08/07	84.40	18.34	66.06	0.00	21.8	2.45	0.66	<0.50	2,120	395	<0.500	10.0 ^c	<0.500	<0.500	<0.500	<0.500	<0.500
MW2	09/06/07	84.40	19.33	65.07	0.00	4.66	0.70	<0.50	1.25	470	208	<0.500	<10.0 ^{a,c}	<0.500	<0.500	<0.500	<0.500	<0.500
MW2	12/03/07	84.40	19.97	64.43	0.00	22 ^d	<0.50	<0.50	<0.50	560	120 ^e	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW2	03/19/08	84.40	18.07	66.33	0.00	5.33	<0.50	<0.50	0.82	630	200 ^e	<0.500	<10.0	<0.500	<0.500	<0.500	<0.500	<0.500
MW2	06/11/08	84.40	19.13	65.27	0.00	<0.50	<0.50	<0.50	<0.50	430	110 ^e	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW2	09/16/08	84.40	20.25	64.15	0.00	8.1 ^d	<0.50	<0.50	<0.50	230	63 ^c	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW2	12/01/08	84.40	20.75	63.65	0.00	<0.50	<0.50	<0.50	<0.50	250	58 ^c	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW2	03/12/09	84.40	18.85	65.55	0.00	<0.50	<0.50	<0.50	0.75 ^f	940	<50	<0.50	<10	<0.50	<0.50	<0.50	<0.50	<0.50
MW3	03/08/07	83.25	15.49	67.76	0.00	<1.00	<1.00	<1.00	<3.00	<100	52.9	<0.500	<10.0	<0.500	<0.500	<0.500	<0.500	<0.500
MW3	06/08/07	83.25	17.02	66.23	0.00	<0.50	<0.50	<0.50	<0.50	<50.0	<47.6	<0.500	<10.0 ^{a,b}	<0.500	<0.500	<0.500	<0.500	<0.500
MW3	09/06/07	83.25	18.07	65.18	0.00	<0.50	<0.50	<0.50	<0.50	<50.0	<47.2	<0.500	<10.0 ^{a,b}	<0.500	<0.500	<0.500	<0.500	<0.500
MW3	12/03/07	83.25	18.69	64.56	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW3	03/19/08	83.25	16.79	66.46	0.00	<0.50	<0.50	<0.50	<0.50	<50.0	<47	<0.500	<10.0	<0.500	<0.500	<0.500	<0.500	<0.500
MW3	06/11/08	83.25	17.82	65.43	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW3	09/16/08	83.25	18.99	64.26	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW3	12/01/08	83.25	19.46	63.79	0.00	<0.50	<0.50	<0.50	<0.50	<50	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW3	03/12/09	83.25	17.53	65.72	0.00	<0.50	<0.50	<0.50	<1.0	<50	<50	<0.50	<10	<0.50	<0.50	<0.50	<0.50	<0.50
MW5	03/08/07	82.65	14.31	68.34	0.00	<1.00	<1.00	<1.00	<3.00	187	59.2	<0.500	<10.0	<0.500	<0.500	<0.500	<0.500	<0.500
MW5	06/08/07	82.65	16.64	66.01	0.00	4.38	0.72	<0.50	<0.50	780	90.3	<0.500	<10.0 ^{a,b}	<0.500	<0.500	<0.500	<0.500	<0.500
MW5	09/06/07	82.65	17.62	65.03	0.00	<0.50	<0.50	<0.50	<0.50	<50.0	121	<0.500	<10.0 ^{a,b}	<0.500	<0.500	<0.500	<0.500	<0.500
MW5	12/03/07	82.65	18.27	64.38	0.00	<0.50	<0.50	<0.50	<0.50	100	65 ^c	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW5	03/19/08	82.65	16.37	66.28	0.00	0.69	<0.50	<0.50	0.87	237	110 ^e	<0.500	<10.0	<0.500	<0.500	<0.500	<0.500	<0.500
MW5	06/11/08	82.65	17.40	65.25	0.00	<0.50	<0.50	<0.50	0.65	83	77 ^c	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW5	09/16/08	82.65	18.54	64.11	0.00	<0.50	<0.50	<0.50	<0.50	120	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW5	12/01/08	82.65	19.00	63.65	0.00	<0.50	<0.50	<0.50	<0.50	140	<47	<0.50	<20	<0.50	<0.50	<0.50	<0.50	<0.50
MW5	03/12/09	82.65	17.09	65.56	0.00	0.21 ^f	<0.50	<0.50	0.85 ^f	410	<50	<0.50	<10	<0.50	<0.50	<0.50	<0.50	0.19 ^f

Notes: MTBE analyzed by EPA Method 8260B unless otherwise indicated.

a Calibration verification recovery was above the method control limit for this analyte. Analyte not detected, data not impacted.

b Laboratory control sample and/or laboratory control sample duplicate recovery was above the acceptance limits. Analyte not detected, data not impacted.

TABLE 5 PHYSICAL PROPERTIES ANALYTICAL RESULTS FOR SOIL SAMPLES,
FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Boring ID	Sample Date	Sample Depth (feet bgs)	Moisture Content (%)	Porosity (pore volume %)	Bulk Density (gm/cc)	Specific Gravity (gm/cc)
SB14	04/26/06	2.5	23.91	38.57	NA	2.63
SB15	04/27/06	2.5	22.08	42.04	NA	2.63
SB16	04/27/06	2.5	20.18	46.82	NA	2.57
SB17	04/26/06	2.5	20.32	39.20	NA	2.56
SB18	04/26/06	3.0	23.88	43.45	NA	2.61
SB19	04/26/06	2.5	23.54	41.35	NA	2.58
SB20	04/26/06	2.5	21.83	43.04	NA	2.54
SB21	05/02/06	2.5	20.89	38.81	NA	2.65
VW1	01/22/07	5.5	23.4	35	NA	NA
VW2	01/22/07	5.5	17.4	37	NA	NA
VW3	01/22/07	5.5	21.6	38	NA	NA
VW4	01/22/07	5.5	21.7	49	NA	NA
VW5	01/22/07	5.5	24.3	43	NA	NA
VW6	03/23/09	5-5.5	17.3	40.3	1.58	NA
VW7	03/23/09	5-5.5	15.4	39.1	1.61	NA
VW8	03/23/09	5-5.5	19.3	39.3	1.60	NA
VW9	03/23/09	5-5.5	18.8	40.9	1.56	NA
VW10	03/23/09	5-5.5	17.3	45.7	1.44	NA
VW11	03/23/09	5-5.5	16.8	41.3	1.52	NA
VW12	03/23/09	5-5.5	21.4	42.7	1.48	NA

feet bgs Feet below ground surface.
gm/cc Grams per cubic centimeter.
% Percent.
NA Not analyzed.

TABLE 6 SOIL VAPOR SAMPLE ANALYTICAL RESULTS, FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Boring ID	Depth (feet bgs)	Date	Concentration (% by Volume)					Concentration (µg/m ³)												
			Oxygen and Argon	Methane	Carbon Dioxide	Benzene	Toluene	Ethyl-benzene	m,p-Xylene	o-Xylene	Total Xylene	TPH-g	MTBE	TBA	DIPE	ETBE	1,2-DCA	TAME	1,2-EDB	1,1-DFA
V1	5.5	05/01/06	9.4	--	--	200	<100	<100	<100	<100	--	790,000	<100	--	--	--	--	--	--	<10,000
V2 ^a	--	05/01/06	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
V3	5.5	05/01/06	19	--	--	120	160	140	<100	<100	--	110,000	<100	--	--	--	--	--	--	<10,000
V3 ^a	10	05/01/06	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
V4 ^a	--	05/01/06	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
V5 ^a	--	05/01/06	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
V6	7.0	05/01/06	9.1	--	--	170	<100	540	410	<100	--	880,000	<100	--	--	--	--	--	--	<10,000
V7	7.5	05/01/06	21	--	--	84	140	<100	110	<100	--	2,200	<100	--	--	--	--	--	--	<10,000
V7 dup	7.5	05/01/06	20	--	--	<80	110	<100	<100	<100	--	2,400	<100	--	--	--	--	--	--	<10,000
V8 ^a	--	05/01/06	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
V9	7.5	05/01/06	19	--	--	<80	<100	<100	<100	<100	--	360,000	<100	--	--	--	--	--	--	<10,000
V10	8.0	05/01/06	11	--	--	1,100	130	340	180	<100	--	6,600,000	<100	--	--	--	--	--	--	<10,000
V10	10.0	05/01/06	9.0	--	--	1,900	<100	<100	<100	<100	--	17,000,000	<100	--	--	--	--	--	--	<10,000
VW1 ^b	5 - 6	4/27/07	11.1	--	--	<2.4	12	<3.2	10	4.8	--	<20,000	<11	<9.0	<12	<12	<3.0	<19	<5.7	<8.1
VW1 ^c	--	4/23/09	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
VW2 ^c	--	4/27/07	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
VW2	5 - 6	4/23/09	8.05	<0.770	6.55	<6.1	<7.3	<8.4	--	--	<33	210,000	<28	<23	<32	<32	<7.8	<32	<15	<21
VW2 dup	5 - 6	4/23/09	7.88	<0.780	6.05	<6.2	<7.3	<8.5	--	--	<34	220,000	<28	<24	<33	<33	<7.9	<33	<15	29
VW3 ^c	--	4/27/07	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
VW3 ^c	--	4/23/09	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
VW4 ^c	--	4/27/07	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
VW4 ^c	--	4/23/09	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
VW5 ^b	5 - 6	4/27/07	3.49	--	--	4.4	11	4.4	12	4.8	--	<23,000	<12	<9.9	<14	<14	<3.3	<21	<6.3	<8.9
VW5	5 - 6	4/23/09	2.57	<0.710	9.84	<2.3	<2.7	<3.1	--	--	<12	9,800	<10	<8.6	<12	<12	<2.9	<12	<5.5	<7.7
VW6 ^c	--	3/27/09	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
VW7	5 - 6	3/27/09	6.94	<0.810	5.52	54	910	180	--	--	860	11,000	<12	<9.8	<14	<14	<3.3	<14	<6.2	<8.8
VW8	5 - 6	3/27/09	2.91	2.61	5.98	<99	<120	<130	--	--	<540	4,400,000	<450	<380	<520	<520	<130	<520	<240	<330

TABLE 6 SOIL VAPOR SAMPLE ANALYTICAL RESULTS, FORMER EXXON RETAIL SITE 74121, 10605 FOOTHILL BOULEVARD, OAKLAND, CALIFORNIA

Boring ID	Depth (feet bgs)	Date	Concentration (% by Volume)					Concentration ($\mu\text{g}/\text{m}^3$)												
			Oxygen and Argon	Methane	Carbon Dioxide	Benzene	Toluene	Ethyl- benzene	m,p- Xylene	o- Xylene	Total Xylene	TPH-g	MTBE	TBA	DIPE	ETBE	1,2-DCA	TAME	1,2-EDB	1,1-DFA
VW9	5 - 6	3/27/09	11.2	<0.820	4.36	25	250	51	--	--	260	65,000	<30	<25	<34	<34	<8.3	<34	<34	<22
VW9 dup	5 - 6	3/27/09	<9.05	<9.05	<9.05	150	1,600	310	--	--	1,600	130,000	<130	<110	<150	<150	<37	<150	<70	<98
VW10	5 - 6	3/27/09	4.21	<0.780	2.69	38	520	120	--	--	550	880,000	<110	<95	<130	<130	<32	<130	<60	<84
VW11	5 - 6	3/27/09	6.18	<0.770	6.69	110	860	230	--	--	1,000	210,000	<110	<93	<130	<130	<31	<130	<59	5,300
VW12	5 - 6	3/27/09	12.9	<1.26	4.78	90	1,700	340	--	--	1,500	17,000	<18	<15	<21	<21	<5.1	<21	<9.7	<14
Lowest Residential ESL ^d			--	--	--	84	63,000	980	21,000	21,000	21,000	10,000	9,400	--	--	--	94	--	4.1	--
Lowest Commercial/Industrial ESL ^d			--	--	--	280	180,000	3,300	58,000	58,000	58,000	29,000	31,000	--	--	--	310	--	14	--

Notes: Soil vapor samples in soil borings V1 through V10 were collected after purging 7 casing volumes or approximately 70 cc of vapor from the tubing (10 cc per 12 feet of tubing).
ESLs adopted by RWQCB correspond to a 1×10^{-6} target risk level and a target hazard quotient of 0.2.

a Soil vapor could not be extracted at depths between 4 and 10 feet bgs from this boring.

b Soil vapor samples were collected without purging (grab samples).

c Soil vapor samples were not collected due to the presence of water.

d From Table E-1a: Groundwater Screening Levels for Evaluation of Potential Vapor Intrusion Concerns. Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater - Interim Final, Regional Water Quality Control Board - San Francisco Bay Region, May 2008.

feet bgs Feet below ground surface.

1,1-DFA 1,1-Difluoroethane.

1,2-DCA 1,2-Dichloroethane.

1,2-EDB 1,2-Dibromoethane.

DIPE Diisopropyl ether.

ETBE Ethyl tertiary butyl ether.

MTBE Methyl tertiary butyl ether.

TAME Tertiary amyl methyl ether.

TBA Tertiary butyl alcohol.

TPH-g Total Petroleum Hydrocarbons as gasoline reported as C6-C12.

dup Duplicate.

ESL Environmental screening level.

RWQCB Regional Water Quality Control Board - San Francisco Bay Region

-- Not analyzed or not applicable.

$\mu\text{g}/\text{m}^3$ micrograms per cubic meter.

Appendix A

Regulatory Correspondence



ENVIRONMENTAL HEALTH SERVICES
ENVIRONMENTAL PROTECTION
1131 Harbor Bay Parkway, Suite 250
Alameda, CA 94502-6577
(510) 567-6700
FAX (510) 337-9335

December 23, 2008

Ms. Jennifer Sedlachek
Exxon Mobil
4096 Piedmont, #194
Oakland, CA 94611

Mr. John Jay
C/o Jay Phares Corporation
10700 MacArthur Boulevard, Suite #200
Oakland, CA 94605

Subject: Fuel Leak Case No. RO0002635 and Geotracker Global ID T0600120383, Exxon #7-4121, 10605 Foothill Boulevard, Oakland, CA 94605

Dear Ms. Sedlacheck and Mr. Jay:

Alameda County Environmental Health (ACEH) staff has reviewed the fuel leak case file for the above-referenced site, including the recently submitted document entitled, "*Revised Vapor Sampling and Risk Assessment Work Plan*," dated December 5, 2008. The "*Revised Vapor Sampling and Risk Assessment Work Plan*," which was prepared by ETIC Engineering, Inc., presents plans for installing additional soil vapor probes and sampling five existing soil vapor probes that were installed at the site in January 2007. The Work Plan was revised in response to our October 7, 2008, correspondence, which requested additional soil vapor sampling locations outside the area of the proposed excavation to evaluate whether the proposed excavation will address potential vapor intrusion risks for future site occupants. The "*Revised Vapor Sampling and Risk Assessment Work Plan*," adequately addresses our technical comments and may be implemented as proposed. We request that you perform the proposed work and send us the reports requested below.

TECHNICAL REPORT REQUEST

Please submit technical reports to Alameda County Environmental Health (Attention: Jerry Wickham), according to the following schedule:

- **February 11, 2009** – Quarterly Groundwater Monitoring Report (Fourth Quarter 2008)
- **May 16, 2009** – Soil Vapor Sampling Report
- **May 11, 2009** – Quarterly Groundwater Monitoring Report (First Quarter 2009)
- **August 11, 2009** – Quarterly Groundwater Monitoring Report (Second Quarter 2009)

Jennifer Sedlachek
John Jay
RO0002635
December 23, 2008
Page 2

These reports are being requested pursuant to California Health and Safety Code Section 25296.10. 23 CCR Sections 2652 through 2654, and 2721 through 2728 outline the responsibilities of a responsible party in response to an unauthorized release from a petroleum UST system, and require your compliance with this request.

ELECTRONIC SUBMITTAL OF REPORTS

ACEH's Environmental Cleanup Oversight Programs (LOP and SLIC) require submission of reports in electronic form. The electronic copy replaces paper copies and is expected to be used for all public information requests, regulatory review, and compliance/enforcement activities. Instructions for submission of electronic documents to the Alameda County Environmental Cleanup Oversight Program FTP site are provided on the attached "Electronic Report Upload Instructions." Submission of reports to the Alameda County FTP site is an addition to existing requirements for electronic submittal of information to the State Water Resources Control Board (SWRCB) Geotracker website. In September 2004, the SWRCB adopted regulations that require electronic submittal of information for all groundwater cleanup programs. For several years, responsible parties for cleanup of leaks from underground storage tanks (USTs) have been required to submit groundwater analytical data, surveyed locations of monitoring wells, and other data to the Geotracker database over the Internet. Beginning July 1, 2005, these same reporting requirements were added to Spills, Leaks, Investigations, and Cleanup (SLIC) sites. Beginning July 1, 2005, electronic submittal of a complete copy of all reports for all sites is required in Geotracker (in PDF format). Please visit the SWRCB website for more information on these requirements (http://www.swrcb.ca.gov/ust/cleanup/electronic_reporting).

PERJURY STATEMENT

All work plans, technical reports, or technical documents submitted to ACEH must be accompanied by a cover letter from the responsible party that states, at a minimum, the following: "I declare, under penalty of perjury, that the information and/or recommendations contained in the attached document or report is true and correct to the best of my knowledge." This letter must be signed by an officer or legally authorized representative of your company. Please include a cover letter satisfying these requirements with all future reports and technical documents submitted for this fuel leak case.

PROFESSIONAL CERTIFICATION & CONCLUSIONS/RECOMMENDATIONS

The California Business and Professions Code (Sections 6735, 6835, and 7835.1) requires that work plans and technical or implementation reports containing geologic or engineering evaluations and/or judgments be performed under the direction of an appropriately registered or certified professional. For your submittal to be considered a valid technical report, you are to present site specific data, data interpretations, and recommendations prepared by an appropriately licensed professional and include the professional registration stamp, signature, and statement of professional certification. Please ensure all that all technical reports submitted for this fuel leak case meet this requirement.

Jennifer Sedlachek
John Jay
RO0002635
December 23, 2008
Page 3

UNDERGROUND STORAGE TANK CLEANUP FUND

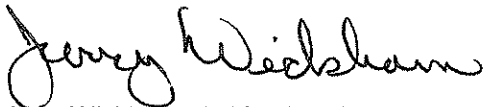
Please note that delays in investigation, later reports, or enforcement actions may result in your becoming ineligible to receive grant money from the state's Underground Storage Tank Cleanup Fund (Senate Bill 2004) to reimburse you for the cost of cleanup.

AGENCY OVERSIGHT

If it appears as though significant delays are occurring or reports are not submitted as requested, we will consider referring your case to the Regional Board or other appropriate agency, including the County District Attorney, for possible enforcement actions. California Health and Safety Code, Section 25299.76 authorizes enforcement including administrative action or monetary penalties of up to \$10,000 per day for each day of violation.

If you have any questions, please call me at (510) 567-6791 or send me an electronic mail message at jerry.wickham@acgov.org.

Sincerely,



Jerry Wickham, California PG 3766, CEG 1177, and CHG 297
Senior Hazardous Materials Specialist

Enclosure: ACEH Electronic Report Upload (ftp) Instructions

cc: Leroy Griffin, Oakland Fire Department, 250 Frank H. Ogawa Plaza, Ste. 3341, Oakland, CA 94612-2032

K. Erik Appel, ETIC Engineering, Inc., 2285 Morello Avenue, Pleasant Hill, CA 94523

Peter McIntyre, AEI Consultants, 2500 Camino Diablo, Suite 100, Walnut Creek CA 94597

Donna Drogos, ACEH
Jerry Wickham, ACEH
File

Alameda County Environmental Cleanup Oversight Programs (LOP and SLIC)	ISSUE DATE: July 5, 2005
	REVISION DATE: December 16, 2005
	PREVIOUS REVISIONS: October 31, 2005
SECTION: Miscellaneous Administrative Topics & Procedures	SUBJECT: Electronic Report Upload (ftp) Instructions

Effective January 31, 2006, the Alameda County Environmental Cleanup Oversight Programs (LOP and SLIC) require submission of all reports in electronic form to the county's ftp site. Paper copies of reports will no longer be accepted. The electronic copy replaces the paper copy and will be used for all public information requests, regulatory review, and compliance/enforcement activities.

REQUIREMENTS

- Entire report including cover letter must be submitted to the ftp site as a **single portable document format (PDF) with no password protection**. (Please do not submit reports as attachments to electronic mail.)
- It is preferable that reports be converted to PDF format from their original format, (e.g., Microsoft Word) rather than scanned.
- Signature pages and perjury statements **must** be included and have either original or electronic signature.
- **Do not password protect the document**. Once indexed and inserted into the correct electronic case file, the document will be secured in compliance with the County's current security standards and a password. **Documents with password protection will not be accepted.**
- Each page in the PDF document should be rotated in the direction that will make it easiest to read on a computer monitor.
- Reports must be named and saved using the following naming convention:
RO#_Report Name_Year-Month-Date (e.g., RO#5555_WorkPlan_2005-06-14)

Additional Recommendations

- A separate copy of the tables in the document should be submitted by e-mail to your Caseworker in Excel format. These are for use by assigned Caseworker only.

Submission Instructions

- 1) Obtain User Name and Password:
 - a) Contact the Alameda County Environmental Health Department to obtain a User Name and Password to upload files to the ftp site.
 - i) Send an e-mail to dehloptoxic@acgov.org
 - or
 - ii) Send a fax on company letterhead to (510) 337-9335, to the attention of Alicia Lam-Finneke.
 - b) In the subject line of your request, be sure to include "**ftp PASSWORD REQUEST**" and in the body of your request, include the **Contact Information, Site Addresses, and the Case Numbers (RO# available in Geotracker) you will be posting for.**

- 2) Upload Files to the ftp Site
 - a) Using Internet Explorer (IE4+), go to <ftp://alcoftp1.acgov.org>
 - (i) Note: Netscape and Firefox browsers will not open the FTP site.
 - b) Click on File, then on Login As.
 - c) Enter your User Name and Password. (Note: Both are Case Sensitive.)
 - d) Open "My Computer" on your computer and navigate to the file(s) you wish to upload to the ftp site.
 - e) With both "My Computer" and the ftp site open in separate windows, drag and drop the file(s) from "My Computer" to the ftp window.

- 3) Send E-mail Notifications to the Environmental Cleanup Oversight Programs
 - a) Send email to dehloptoxic@acgov.org notify us that you have placed a report on our ftp site.
 - b) Copy your Caseworker on the e-mail. Your Caseworker's e-mail address is the entire first name then a period and entire last name at acgov.org. (e.g., firstname.lastname@acgov.org)
 - c) The subject line of the e-mail must start with the RO# followed by **Report Upload**. (e.g., Subject: RO1234 Report Upload)

Appendix B

Permits

Alameda County Public Works Agency - Water Resources Well Permit



399 Elmhurst Street
Hayward, CA 94544-1395
Telephone: (510)670-6633 Fax:(510)782-1939

Application Approved on: 01/23/2009 By jamesy

Permit Numbers: W2009-0053
Permits Valid from 03/23/2009 to 03/25/2009

Application Id:	1232664896166	City of Project Site:	Oakland
Site Location:	10605 Foothill Boulevard	Completion Date:	03/25/2009
Project Start Date:	03/23/2009	Assigned Inspector: Contact Vicky Hamlin at (510) 670-5443 or vickyh@acpwa.org	
Applicant:	ETIC Engineering, Inc. - Bryan Campbell 2285 Morello Avenue, Pleasant Hill, CA 94523	Phone:	925-602-4710 x24
Property Owner:	Ken Phares 10700 Macarthur Blvd., Oakland, CA 94605	Phone:	510-522-0450
Client:	N/A ExxonMobil Environmental Services Company 4096 Piedmont Ave. #194, Oakland, CA 94611	Phone:	510-547-8196
Contact:	Yukoa Mamiya	Phone:	925-602-4710 x37 Cell: 925-303-6421

Receipt Number: WR2009-0026	Total Due:	\$230.00
Payer Name : ETIC Engineering, Inc.	Total Amount Paid:	\$230.00
Paid By: VISA		PAID IN FULL

Works Requesting Permits:

Remediation Well Construction-Vapor Remediation Well - 7 Wells
Driller: Vironex, Inc. - Lic #: 705927 - Method: Hand

Work Total: \$230.00

Specifications

Permit #	Issued Date	Expire Date	Owner Well Id	Hole Diam.	Casing Diam.	Seal Depth	Max. Depth
W2009-0053	01/23/2009	06/21/2009	VW10	6.00 in.	0.25 in.	4.00 ft	6.00 ft
W2009-0053	01/23/2009	06/21/2009	VW11	6.00 in.	0.25 in.	4.00 ft	6.00 ft
W2009-0053	01/23/2009	06/21/2009	VW12	6.00 in.	0.25 in.	4.00 ft	6.00 ft
W2009-0053	01/23/2009	06/21/2009	VW6	6.00 in.	0.25 in.	4.00 ft	6.00 ft
W2009-0053	01/23/2009	06/21/2009	VW7	6.00 in.	0.25 in.	4.00 ft	6.00 ft
W2009-0053	01/23/2009	06/21/2009	VW8	6.00 in.	0.25 in.	4.00 ft	6.00 ft
W2009-0053	01/23/2009	06/21/2009	VW9	6.00 in.	0.25 in.	4.00 ft	6.00 ft

Specific Work Permit Conditions

1. Permittee shall assume entire responsibility for all activities and uses under this permit and shall indemnify, defend and save the Alameda County Public Works Agency, its officers, agents, and employees free and harmless from any and all expense, cost, liability in connection with or resulting from the exercise of this Permit including, but not limited to, property damage, personal injury and wrongful death.
















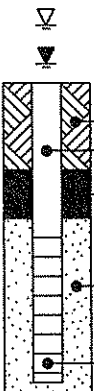







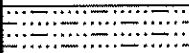
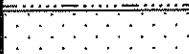
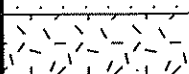

2. Permittee, permittee's contractors, consultants or agents shall be responsible to assure that all material or waters generated during drilling, boring destruction, and/or other activities associated with this Permit will be safely handled, properly managed, and disposed of according to all applicable federal, state, and local statutes regulating such. In no case shall these materials and/or waters be allowed to enter, or potentially enter, on or off-site storm sewers, dry wells, or

Alameda County Public Works Agency - Water Resources Well Permit

waterways or be allowed to move off the property where work is being completed.

3. Compliance with the well-sealing specifications shall not exempt the well-sealing contractor from complying with appropriate State reporting-requirements related to well construction or destruction (Sections 13750 through 13755 (Division 7, Chapter 10, Article 3) of the California Water Code). Contractor must complete State DWR Form 188 and mail original to the Alameda County Public Works Agency, Water Resources Section, within 60 days. Including permit number and site map.
 4. Applicant shall submit the copies of the approved encroachment permit to this office within 60 days.
 5. Applicant shall contact Vicky Hamlin for an inspection time at 510-670-5443 or email to vickyh@acpwa.org at least five (5) working days prior to starting, once the permit has been approved. Confirm the scheduled date(s) at least 24 hours prior to drilling.
 6. Minimum seal depth (Neat Cement Seal) is 2 feet below ground surface (BGS).
 7. Minimum surface seal thickness is two inches of cement grout placed by tremie
 8. Copy of approved drilling permit must be on site at all times. Failure to present or show proof of the approved permit application on site shall result in a fine of \$500.00.
 9. Prior to any drilling activities onto any public right-of-ways, it shall be the applicants responsibilities to contact and coordinate a Underground Service Alert (USA), obtain encroachment permit(s), excavation permit(s) or any other permits required for that City or to the County and follow all City or County Ordinances. It shall also be the applicants responsibilities to provide to the Cities or to Alameda County a Traffic Safety Plan for any lane closures or detours planned. No work shall begin until all the permits and requirements have been approved or obtained.
-

Appendix C
Soil Boring Logs

MAJOR DIVISIONS			TYPICAL NAMES		
COARSE-GRAINED SOILS More than half is coarser than No. 200 sieve	GRAVELS more than half coarse fraction is larger than No. 4 sieve size	Clean gravels with little or no fines	GW		Well graded gravels with or without sand, little or no fines.
		Gravels with over 12% fines	GP		Poorly graded gravels with or without sand, little or no fines.
			GM		Silty gravels, silty gravels with sand.
		GC		Clayey gravels, clayey gravels with sand.	
	SANDS more than half coarse fraction is smaller than No. 4 sieve size	Clean sands with little or no fines	SW		Well graded sands with or without gravel, little or no fines.
		Sands with over 12% fines	SP		Poorly graded sands with or without gravels, little or no fines.
			SM		Silty sands with or without gravel.
		SC		Clayey sands with or without gravel.	
FINE-GRAINED SOILS More than half is finer than No. 200 sieve	SILTS AND CLAYS liquid limit 50% or less		ML		Inorganic silts and very fine sands, rock flour, silts with sands and gravels.
	SILTS AND CLAYS liquid limit greater than 50%		CL		Inorganic clays of low to medium plasticity, clays with sands and gravels, lean clays.
			OL		Organic silts or clays of low plasticity.
			MH		Inorganic silts, micaceous or diatomaceous, fine sandy or silty soils, elastic silts.
	CH		Inorganic clays of high plasticity, fat clays		
	OH		Organic clays or clays of medium to high plasticity.		
HIGHLY ORGANIC SOILS			PT		Peat and other highly organic soils.
SYMBOLS			DRILL LOG ROCK TYPES		
		Samples  Air  Soil  Water  Open Hole	 Limestone  Dolomite  Mudstone  Siltstone  Sandstone  Igneous		
		UNIFIED SOIL CLASSIFICATION SYSTEM DESCRIPTIONS AND SYMBOLS USED ON ETIC DRILL LOGS			



CLIENT ExxonMobil	SITE NUMBER 74121	LOCATION 10605 Foothill Blvd Oakland, California
----------------------	----------------------	--

LOG OF SOIL BORING:

VW6

DRILLING AND SAMPLING METHODS: Borehole cleared to 6 feet bgs using a hand auger. Sampled with a slide hammer using 6-inch long stainless-steel liners.

COORDINATES: N2097721.6 :E6084709.7
 ELEVATION TOP OF CASING: 83.44
 CASING BELOW SURFACE:

WATER LEVEL				START TIME	FINISH TIME
TIME				1045	1505
DATE				DATE	DATE
REFERENCE				3/23/09	3/23/09

DRILLING COMPANY: Vironex
 LICENSE NUMBER: C57-705927

INCHES				DEPTH (feet)	AIR SAMPLE	WATER SAMPLE	SOIL SAMPLE	RECOVERED	GRAPHIC LOG	SURFACE CONDITIONS	
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	O/A READING							Top Soil/Grass	
60			1.5	0						DESCRIPTION BY: M. Garcia	DETAILS
				1						SILTY CLAY - very dark brown (10YR 2/2), soft, low plasticity, moist.	
				2						- moist to wet.	
			0.3	3					CL	- very stiff.	
	12			4							
				5						Bentonite chips from 4 to 5 feet bgs.	
				6						#2/12 sand from 5 to 6 feet bgs.	
				7						0.4-inch 0.0057-inch pore stainless steel screen from 5.25 to 5.75 feet bgs.	
				8						Boring terminated at 6 feet bgs.	
				9							
				10							
				11							
				12							
				13							
				14							
				15							
				16							
				17							
				18							
				19							
				20							

LOG OF SOIL BORING 7-4121 LOGS.GPJ ETIC.GDT 5/14/09



CLIENT ExxonMobil	SITE NUMBER 74121	LOCATION 10605 Foothill Blvd Oakland, California
----------------------	----------------------	--

LOG OF SOIL BORING: **VW7**

DRILLING AND SAMPLING METHODS: Borehole cleared to 6 feet bgs using a hand auger. Sampled with a slide hammer using 6-inch long stainless-steel liners.

COORDINATES: N2097715.7 :E6084729.7
 ELEVATION TOP OF CASING: 83.96
 CASING BELOW SURFACE:

WATER LEVEL				START TIME	FINISH TIME
TIME				1000	1445
DATE				DATE	DATE
REFERENCE				3/23/09	3/23/09

DRILLING COMPANY: Vironex
 LICENSE NUMBER: C57-705927

INCHES				DEPTH (feet)	AIR SAMPLE	WATER SAMPLE	SOIL SAMPLE	RECOVERED	GRAPHIC LOG	SURFACE CONDITIONS	
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING							Top Soil/Grass	
DESCRIPTION BY: M. Garcia										DETAILS	
60			0.9	0							<p>SILTY CLAY - very dark brown (10YR 2/2) mottled with dark yellowish brown (5YR 3/4), very stiff, low plasticity, moist.</p>
			0.5	1							
				2					CL		
			0.9	3							
				4					CL		
	12			5					CL		
				6						<p>Boring terminated at 6 feet bgs.</p>	
				7							
				8							
				9							
				10							
				11							
				12							
				13							
				14							
				15							
				16							
				17							
				18							
				19							
				20							

LOG OF SOIL BORING 7-4121 LOGS.GPJ ETIC.GDT 5/14/09



CLIENT ExxonMobil	SITE NUMBER 74121	LOCATION 10605 Foothill Blvd Oakland, California
----------------------	----------------------	--

LOG OF SOIL BORING:

VW8

COORDINATES: N2097687.2 :E6084729.7
 ELEVATION TOP OF CASING: 83.70
 CASING BELOW SURFACE:

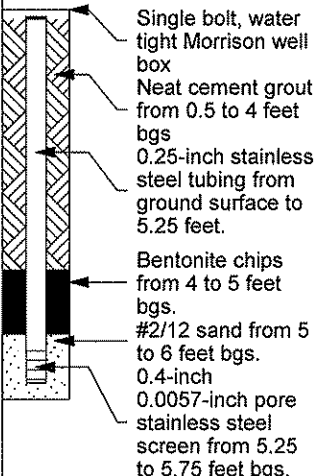
DRILLING AND SAMPLING METHODS: Borehole cleared to 6 feet bgs using a hand auger. Sampled with a slide hammer using 6-inch long stainless-steel liners.

WATER LEVEL				START TIME 0955	FINISH TIME 1424
TIME				DATE 3/23/09	DATE 3/23/09
DATE					
REFERENCE					

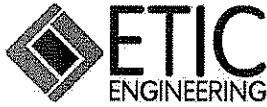
DRILLING COMPANY: Vironex
 LICENSE NUMBER: C57-705927

INCHES				DEPTH (feet)	AIR SAMPLE	WATER SAMPLE	SOIL SAMPLE	RECOVERED	GRAPHIC LOG	SURFACE CONDITIONS	
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING							Top Soil/Grass	
				0						DESCRIPTION BY: M. Garcia	DETAILS
60			2.7	0						<p>SILTY CLAY WITH TRACE SAND - very dark brown (10YR 2/2), firm to stiff, low plasticity, fine grained sand, moist.</p> <p>- mottled with dark yellowish brown (10YR 4/6).</p> <p>- with some small roots and trace subangular gravel 0.5 inches in diameter.</p>	
				1							
				2					CL		
			2.2	3							
				4							
				5					CL		
	12			6							
				7							
				8							
				9							
				10							
				11							
				12							
				13							
				14							
				15							
				16							
				17							
				18							
				19							
				20							

Boring terminated at 6 feet bgs.



LOG OF SOIL BORING 7-4121 LOGS.GPJ ETIC.GDT 5/14/09



CLIENT ExxonMobil	SITE NUMBER 74121	LOCATION 10605 Foothill Blvd Oakland, California
----------------------	----------------------	--

DRILLING AND SAMPLING METHODS: Borehole cleared to 6 feet bgs using a hand auger. Sampled with a slide hammer using 6-inch long stainless-steel liners.

LOG OF SOIL BORING: **VW9**

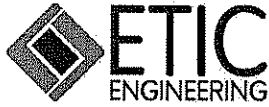
COORDINATES: N2097692.4 :E6084705.7
 ELEVATION TOP OF CASING: 82.72
 CASING BELOW SURFACE:

WATER LEVEL				START TIME	FINISH TIME
TIME				1045	1600
DATE				DATE	DATE
REFERENCE				3/23/09	3/23/09

DRILLING COMPANY: Vironex
 LICENSE NUMBER: C57-705927

INCHES		BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	AIR SAMPLE	WATER SAMPLE	SOIL SAMPLE RECOVERED	GRAPHIC LOG	SURFACE CONDITIONS	
DRIVEN	RECOVER								Top Soil/Grass	
DESCRIPTION BY: M. Garcia									DETAILS	
60			1.0	0						
				1				ML		CLAYEY SILT - very dark brown (10YR 2/2), firm, dry to moist.
				2						
			0.2	3				CL		CLAY - very dark brown (10YR 2/2), hard, low plasticity, dry.
	12			4						
				5						
				6						Boring terminated at 6 feet bgs.
				7						
				8						
				9						
				10						
				11						
				12						
				13						
				14						
				15						
				16						
				17						
				18						
				19						
				20						

LOG OF SOIL BORING 7-4121 LOGS.GPJ ETIC.GDT 5/14/09



CLIENT ExxonMobil	SITE NUMBER 74121	LOCATION 10605 Foothill Blvd Oakland, California
----------------------	----------------------	--

DRILLING AND SAMPLING METHODS: Borehole cleared to 6 feet bgs using a hand auger. Sampled with a slide hammer using 6-inch long stainless-steel liners.

LOG OF SOIL BORING: **VW10**

COORDINATES: N2097745.6 :E6084725.4
 ELEVATION TOP OF CASING: 84.05
 CASING BELOW SURFACE:

WATER LEVEL				
TIME			START TIME 1150	FINISH TIME 1535
DATE			DATE 3/23/09	DATE 3/23/09
REFERENCE				

DRILLING COMPANY: Vironex
 LICENSE NUMBER: C57-705927

INCHES				DEPTH (feet)	AIR SAMPLE	WATER SAMPLE	SOIL SAMPLE	RECOVERED	GRAPHIC LOG	SURFACE CONDITIONS	
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING							Top Soil/Wood Chips	
60			0.7	0						DESCRIPTION BY: M. Garcia SILTY CLAY - black (10YR 2/1) mottled with dark yellowish brown (10YR 4/6), very stiff, low plasticity, moist. - color becomes dark yellowish brown (10YR 4/6), moist to wet. Boring terminated at 6 feet bgs.	DETAILS
			0.6	1							
				2							
				3							
				4							
	12			5							
				6							
				7							
				8							
				9							
				10							
				11							
				12							
				13							
				14							
				15							
				16							
				17							
				18							
				19							
				20							

LOG OF SOIL BORING 7-4121 LOGS.GPJ ETIC.GDT 5/14/09



CLIENT ExxonMobil	SITE NUMBER 74121	LOCATION 10605 Foothill Blvd Oakland, California
----------------------	----------------------	--

LOG OF SOIL BORING: **VW11**

DRILLING AND SAMPLING METHODS: Borehole cleared to 6 feet bgs using a hand auger. Sampled with a slide hammer using 6-inch long stainless-steel liners.

COORDINATES: N2097685.5 : E6084794.6
 ELEVATION TOP OF CASING: 85.51
 CASING BELOW SURFACE:

WATER LEVEL				
TIME			START TIME 0843	FINISH TIME 1310
DATE			DATE 3/23/09	DATE 3/23/09
REFERENCE				

DRILLING COMPANY: Vironex
 LICENSE NUMBER: C57-705927

INCHES				DEPTH (feet)	AIR SAMPLE	WATER SAMPLE	SOIL SAMPLE	RECOVERED	GRAPHIC LOG	SURFACE CONDITIONS	
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	O/A READING							Top Soil/Grass	
60				0						DESCRIPTION BY: M. Garcia	DETAILS
				1					ML	CLAYEY SILT - dark brown (10YR 3/6), soft, low plasticity, moist.	
				2							
				3					CL	CLAY - very dark brown (10YR 2/2) hard, low plasticity, dry to moist.	
	12		4.4	4							
				5							
				6						Boring terminated at 6 feet bgs.	
				7							
				8							
				9							
				10							
				11							
				12							
				13							
				14							
				15							
				16							
				17							
				18							
				19							
				20							

LOG OF SOIL BORING 7-4121 LOGS.GPJ ETIC.GDT 5/14/09



CLIENT ExxonMobil	SITE NUMBER 74121	LOCATION 10605 Foothill Blvd Oakland, California
----------------------	----------------------	--

LOG OF SOIL BORING: **VW12**

DRILLING AND SAMPLING METHODS: Borehole cleared to 6 feet bgs using a hand auger. Sampled with a slide hammer using 6-inch long stainless-steel liners.

COORDINATES: N2097662.3 : E6084713.8
 ELEVATION TOP OF CASING: 83.04
 CASING BELOW SURFACE:

WATER LEVEL				
TIME			START TIME 0925	FINISH TIME 1355
DATE			DATE 3/23/09	DATE 3/23/09
REFERENCE				

DRILLING COMPANY: Vironex
 LICENSE NUMBER: C57-705927

INCHES		BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	AIR SAMPLE	WATER SAMPLE	SOIL SAMPLE	RECOVERED	GRAPHIC LOG	SURFACE CONDITIONS	
DRIVEN	RECOVER									Top Soil/Grass	
DESCRIPTION BY: M. Garcia										DETAILS	
60			4.4	0							
				1					CL	<p>SILTY CLAY - black (10YR 2/1) soft to firm, low plasticity, moist.</p>	
			0.6	3							
			0.1	4					CL	<p>CLAY - very dark brown (10YR 2/2) very stiff, low plasticity, moist.</p>	
	12			5						<p>Boring terminated at 6 feet bgs.</p>	
				6							
				7							
				8							
				9							
				10							
				11							
				12							
				13							
				14							
				15							
				16							
				17							
				18							
				19							
				20							

LOG OF SOIL BORING 7-4121 LOGS.GPJ ETIC.GDT 5/14/09

Appendix D
Field Protocols

PROTOCOLS FOR INSTALLATION AND SAMPLING OF SOIL VAPOR WELLS

SUBSURFACE CLEARANCE SURVEY PROCEDURES

Prior to drilling, the proposed locations of borings will be marked with white paint. Underground Service Alert (USA) will be contacted prior to subsurface activities and a “ticket” will be issued for this investigation. USA members will mark underground utilities in the delineated areas using standard color code identifiers.

Once USA has marked the site, all proposed borehole locations will be investigated by subsurface clearance surveys to identify possible buried hazards (pipelines, drums, tanks). Subsurface clearance surveys use several geophysical methods to locate shallow buried man-made objects. The geophysical methods include electromagnetic induction (EMI) profiling, ground penetrating radar (GPR), and/or magnetic surveying. The choice of methods depends on the target object and potential interference from surrounding features.

Prior to drilling, all boreholes will be cleared of underground utilities to a depth of at least 4 feet below ground surface (bgs) in “non-critical zones” and to 8 feet bgs in “critical zones”. Critical zones are defined as locations that are within 10 feet from the furthest edge of any underground storage tank (UST), within 10 feet of the product dispenser islands, the entire area between the UST field and the product dispenser islands, and within 10 feet of any suspected underground line. An 8- to 12-inch-diameter circle will be cut in the surface cover at each boring location. A hole will then be cleared at each boring location using a hand auger.

SOIL SAMPLING

Shallow soil samples are collected using a 6-inch sample barrel connected to a slide hammer and containing a 6-inch stainless steel sample sleeve. After driving the hammer 6 inches, the rods and sample barrel are withdrawn from the borehole and the sample sleeve is removed.

Soil from the hand auger is removed and placed in a sealed plastic bag. The soil is scanned with an organic vapor analyzer (OVA) equipped with a flame ionization detector (FID) or photoionization detector (PID), and the readings are noted on the soil boring logs. The remaining soil from the hand auger is examined and classified according to the Unified Soil Classification System (USCS).

Soil samples are delivered, under chain of custody, to a laboratory certified by the California Department of Health Services (DHS) for analyses.

SOIL VAPOR WELL INSTALLATION PROCEDURES

The vapor wells are constructed with 0.25-inch-diameter stainless steel tubing connected to 0.4-inch-diameter vapor sampling implant with a 0.0057-inch slot stainless steel screen and bottom implant anchor. All connections are sealed with Swagelok® type fittings. A filter pack of #2/12 sand is placed at the screened interval and above and below the slotted PVC casing for each well. The wells are then sealed with hydrated bentonite chips or granules, followed by neat cement grout to just

below ground surface. The tubing is sealed at the surface with a stainless steel Swagelok® valve and stainless steel cap.

The wells are finished at the surface with a slightly raised, watertight steel traffic-rated box set in concrete. The lid on the traffic-rated box is bolted to the rim of the well box.

SOIL VAPOR SAMPLING PROCEDURES

To allow for subsurface conditions to equilibrate, the wells are not disturbed for a period of at least 48 hours.

A vacuum tightness test is performed on each well. The test consists of the application of vacuum and monitoring of vacuum tightness using vacuum gauges and/or flow meter for 5 to 10 minutes.

A purge test will be conducted for one well. The selected well should be the one with the highest expected concentrations. The test consists of the collection of vapor samples using Tedlar bags after purging the well of one (1), three (3), and seven (7) purge volumes by drawing vapor using a syringe connected to a valve on the tubing or a vacuum pump. The purge volume is estimated based on the internal volume of the tubing used and the annular space around the slotted screen. The samples are collected through a particulate filter and flow controller which regulates the flow of soil gas to no more than 200 milliliters per minute. The results of the purge test are used to dictate the purge volume to be used during the sampling of subsequent wells.

The vapor samples are collected in 1-liter stainless steel Summa canisters. The samples are collected through a particulate filter and flow controller which regulates the flow of soil gas to no more than 200 milliliters per minute. To ensure air-tight connections between the tubing, sampling port, valves, and other connections, a tracer compound is applied to joints as a tracer. A leak will be evident if the tracer is detected in the analysis of the soil vapor samples.

The 1-liter Summa canisters are labeled and packaged for delivery to a state-certified laboratory for chemical analysis. The initial pressure and the final pressure readings taken from the gauges on the Summa canisters are recorded. A small vacuum of about 5 inches of mercury is left inside the sample canister and is recorded on the chain-of-custody. Upon receipt, the laboratory will check the pressure in the sample canister and compare it to the pressure recorded on the chain-of-custody for quality control purposes.

Appendix E
Field Documents



SUMMA Canister Soil Vapor Sampling Form

Site: Former Exxon RS 74121
 Address: 10605 Foothill Blvd., Oakland, CA
 Project #: UP4121.3.27
 Date: 3/27/09

Personnel: Yuko Mamiya
 Page: _____ of _____
 Purge Canister Volume (liters): 6
 Sample Canister Volume (liters): 1

Temperature: _____ °F
 Barometric Pressure: 30.4 inches Hg
 Precipitation: 0.0
 Relative Humidity: 45 %
 Purge Volume: 3 liters
 Flow Rate: _____ liters/minute

Sampling Location	Purge Canister Serial Number	Sample Canister Serial Number	Flow Regulator Serial Number	Initial Purge Canister Vacuum (Inches Hg)	Leak Check		Purge Canister Vacuum (Inches Hg)	Vapor Purge		Final Purge Canister Vacuum (Inches Hg)	Initial Sample Canister Vacuum	Vapor Sample		Final Sample Canister Vacuum	System Induced Vacuum at Well (Inches H ₂ O)
					Start Time	Stop Time		Start Time	Stop Time			Start Time	Stop Time		
VW6	D455			-30	1351	1355	-30	1355	Water						
VW7	D627	LC056	A76	-30	1228	1234	-30	1234	1251	-17.5	-30	1251	1259	-1	
VW8	D671	LC112	A227	-30	1210	1214	-30	1214	1233	-17.5	-30	1233	1241	-5	
VW9	D537	LC479	A268	-30	1126	1130	-30	1130	1152	-5	-30	1152	1200	-5	
VW10	D684	LC335	A196	-30	1251	1302	-30	1302	1316	-17	-30	1316	1322	-3	
VW11	D510	LC380	A216	-30	1315	1319	-30	1319	1337	-16	-30	1337	1343	-5	
VW12	D826	LC178	A163	-30	1123	1127	-30	1127	1157	-17.5	-30	1157	1203	-4	
DUP VW9	D537	LC479	A268	-30	1354	1401	-30				-30	1409	1415	-26	

D467

Notes:

General Weather Conditions: clear

Other: Water encountered in VW6 during purging (3.5' in the tubing)

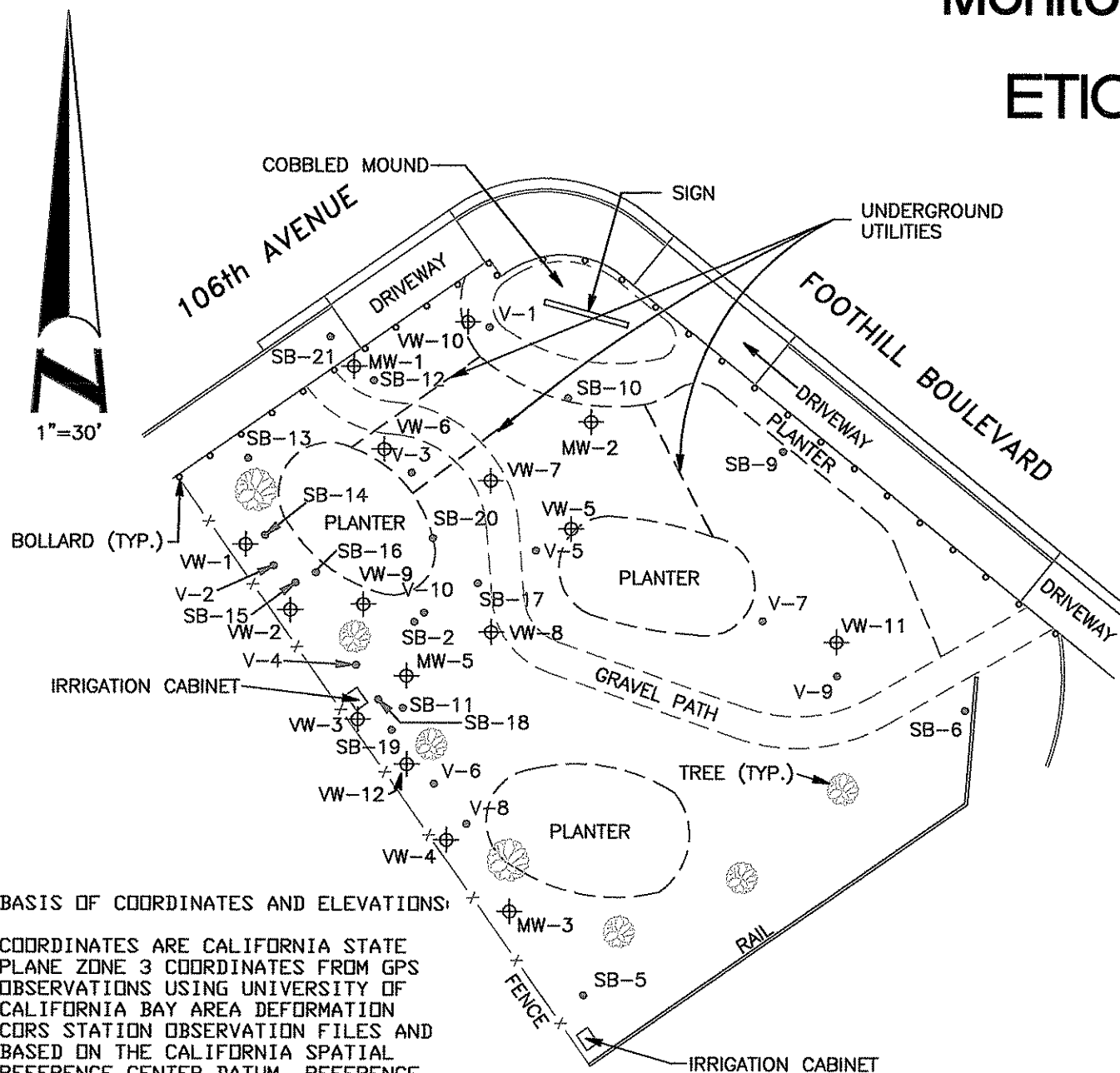
Appendix F

Survey Data

Monitoring Well Exhibit

Prepared For:

ETIC Engineering



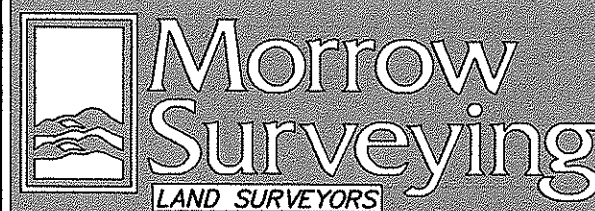
DESCRIPTION	NORTHING	EASTING	LATITUDE	LONGITUDE	ELEV (PVC)	ELEV (BOX)	ELEV (GND)
SB-2	2097689.1	6084715.4	37.7443190	-122.1496322			83.1
SB-5	2097618.9	6084747.2	37.7441278	-122.1495180			83.7
SB-6	2097672.7	6084818.9	37.7442791	-122.1492733			85.5
SB-9	2097721.3	6084784.7	37.7444109	-122.1493945			85.3
SB-10	2097731.3	6084744.3	37.7444362	-122.1495348			84.4
SB-11	2097672.9	6084713.2	37.7442745	-122.1496387			82.9
SB-12	2097734.5	6084707.8	37.7444433	-122.1496611			83.0
SB-13	2097719.9	6084684.2	37.7444019	-122.1497420			81.7
SB-14	2097705.4	6084687.4	37.7443624	-122.1497299			81.6
SB-15	2097696.5	6084693.1	37.7443382	-122.1497097			81.9
SB-16	2097698.4	6084696.9	37.7443436	-122.1496967			82.1
SB-17	2097696.4	6084727.4	37.7443396	-122.1495913			83.5
SB-18	2097674.5	6084708.6	37.7442786	-122.1496548			82.5
SB-19	2097668.7	6084711.1	37.7442629	-122.1496458			82.6
SB-20	2097704.9	6084718.9	37.7443625	-122.1496210			83.1
SB-21	2097742.7	6084699.7	37.7444654	-122.1496899			82.4
V-1	2097744.6	6084729.6	37.7444720	-122.1495864			84.0
V-2	2097699.7	6084689.0	37.7443468	-122.1497240			81.8
V-3	2097717.2	6084714.9	37.7443960	-122.1496356			83.2
V-4	2097681.0	6084704.5	37.7442961	-122.1496695			82.4
V-5	2097702.6	6084738.3	37.7443571	-122.1495539			84.0
V-6	2097658.7	6084719.1	37.7442356	-122.1496175			82.9
V-7	2097689.4	6084780.9	37.7443231	-122.1494057			85.1
V-8	2097651.1	6084725.2	37.7442152	-122.1495960			83.0
V-9	2097679.1	6084794.8	37.7442954	-122.1493569			85.4
V-10	2097690.8	6084717.3	37.7443238	-122.1496259			83.1
MW-1	2097737.2	6084704.0	37.7444504	-122.1496746	82.47	82.86	
MW-2	2097726.8	6084748.5	37.7444241	-122.1495199	84.40	84.69	
MW-3	2097634.7	6084733.1	37.7441703	-122.1495675	83.25	83.58	
MW-5	2097678.9	6084713.8	37.7442910	-122.1496371	82.65	82.94	
VW-1	2097703.7	6084683.6	37.7443575	-122.1497432		81.77	
VW-2	2097691.3	6084692.0	37.7443240	-122.1497133		81.98	
VW-3	2097670.8	6084704.6	37.7442681	-122.1496683		82.64	
VW-4	2097648.1	6084721.3	37.7442067	-122.1496092		83.13	
VW-5	2097706.7	6084744.8	37.7443686	-122.1495318		84.47	
VW-6	2097721.6	6084709.7	37.7444080	-122.1496540		83.44	
VW-7	2097715.7	6084729.7	37.7443926	-122.1495845		83.96	
VW-8	2097687.2	6084729.7	37.7443145	-122.1495825		83.70	
VW-9	2097692.4	6084705.7	37.7443276	-122.1496661		82.72	
VW-10	2097745.6	6084725.4	37.7444745	-122.1496010		84.05	
VW-11	2097685.5	6084794.6	37.7443128	-122.1493582		85.51	
VW-12	2097662.3	6084713.8	37.7442454	-122.1496360		83.04	

BASIS OF COORDINATES AND ELEVATIONS:

COORDINATES ARE CALIFORNIA STATE PLANE ZONE 3 COORDINATES FROM GPS OBSERVATIONS USING UNIVERSITY OF CALIFORNIA BAY AREA DEFORMATION CORS STATION OBSERVATION FILES AND BASED ON THE CALIFORNIA SPATIAL REFERENCE CENTER DATUM, REFERENCE EPOCH 2000.35. COORDINATE DATUM IS NAD 83(1986). DATUM ELLIPSOID IS GRS80. REFERENCE GEOID IS NGS99. CORS STATIONS USED WERE DIAB AND PTRB. VERTICAL DATUM IS NAVD 88 FROM GPS OBSERVATIONS.



10605 Foothill Boulevard
Oakland
Alameda County
California

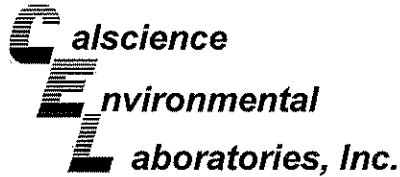


1255 Starboard Drive
West Sacramento
California 95691
(916) 372-8124
curt@morrrowsurveying.com

Date: 5-16-06
Scale: 1" = 30'
Sheet 1 of 1
Revised: 5-6-09
Field Book: MW-26,42
Dwg. No. 1893-056 ct

Appendix G

Laboratory Analytical Reports and Chain-of-Custody Documentation



April 09, 2009

Erik Appel
ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Subject: **Calscience Work Order No.: 09-03-2304**
Client Reference: **ExxonMobil 74121, 10605 Foothill Boulevard,
CA**

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 03/26/2009 and analyzed in accordance with the attached chain-of-custody.

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

Note that the Chain-of-Custody Record and Sample Receipt Form are integral parts of this report.

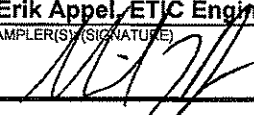
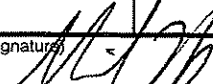

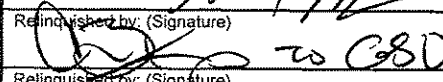
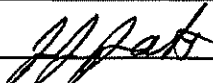
If you have any questions regarding this report, please do not hesitate to contact the undersigned.

Sincerely,

A handwritten signature in cursive script that reads "Cecile deGuia".

Calscience Environmental
Laboratories, Inc.
Cecile deGuia
Project Manager

A handwritten signature in cursive script, likely belonging to Cecile deGuia, located at the bottom left of the page.

LABORATORY CLIENT: ExxonMobil c/o ETIC Engineering				CLIENT PROJECT NAME / NUMBER: 74121, 10605 Foothill Boulevard, CA				P.O. NO.: 4510816445												
ADDRESS: 2285 Morello Avenue				PROJECT CONTACT: Erik Appel, ETIC Engineering				Project Number: TM4121.3.27												
CITY: Pleasant Hill, CA 94523				SAMPLER(S) / SIGNATURE: 				QUOTE NO.:												
TEL: 925-602-4710 x21		FAX: 925-602-4720		E-MAIL: see instructions		LAB USE ONLY 03-2304														
TURNAROUND TIME <input type="checkbox"/> SAME DAY <input type="checkbox"/> 24 HR <input type="checkbox"/> 48HR <input type="checkbox"/> 72 HR <input checked="" type="checkbox"/> 5 DAYS <input type="checkbox"/> 10 DAYS				REQUESTED ANALYSIS																
SPECIAL REQUIREMENTS (ADDITIONAL COSTS MAY APPLY) <input type="checkbox"/> RWQCB REPORTING <input type="checkbox"/> ARCHIVE SAMPLES UNTIL ___/___/___				Moisture Content by ASTM D2216 Porosity and Density including Dry Bulk by API RP40																
SPECIAL INSTRUCTIONS edf file required, Global ID #T0600120383 email report to eappel@eticeng.com & eticlabreports@eticeng.com																				
LAB USE ONLY	SAMPLE ID	LOCATION/ DESCRIPTION	SAMPLING		Matrix	#Cont	Moisture	Porosity	Density	Dry Bulk	API	RP40								
			DATE	TIME																
1	VW6 @ 5 - 5.5		03/23/09	1224	Soil	1	X	X												
2	VW7 @ 5 - 5.5		03/23/09	1205	Soil	1	X	X												
3	VW8 @ 5 - 5.5		03/23/09	1118	Soil	1	X	X												
4	VW9 @ 5 - 5.5		03/23/09	1145	Soil	1	X	X												
5	VW10 @ 5 - 5.5		03/23/09	1242	Soil	1	X	X												
6	VW11 @ 5 - 5.5		03/23/09	0910	Soil	1	X	X												
7	VW12 @ 5 - 5.5		03/23/09	1135	Soil	1	X	X												
Relinquished by: (Signature) 				Received by: (Signature) 				Date: 3/25/09		Time: 1549										
Relinquished by: (Signature) 				Received by: (Signature) 				Date: 3/26/09		Time: 1030										
Relinquished by: (Signature)				Received by: (Signature)				Date:		Time:										

SIIS 31796

SAMPLE RECEIPT FORM

Cooler 1 of 1

CLIENT: ETIC

DATE: 03/26/09

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

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

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

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

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

Ambient Temperature: Air Filter Metals Only PCBs Only Initial: JP

CUSTODY SEALS INTACT:

Cooler _____ No (Not Intact) Not Present N/A Initial: JP

Sample _____ No (Not Intact) Not Present Initial: JP

SAMPLE CONDITION:

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

CONTAINER TYPE:

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

Water: VOA VOA_h VOA_{na2} 125AGB 125AGB_h 125AGB_{po4} 1AGB 1AGB_{na2}

1AGB_s 500AGB 500AGB_s 250CGB 250CGB_s 1PB 500PB 500PB_{na} 250PB

250PB_n 125PB 125PB_{znna} 100PBsterile 100PB_{na2} _____ _____ _____

Air: Tedlar® Summa® _____ **Sludge/Other:** _____ Checked/Labeled by: PS

Container: C:Clear A:Amber P:Poly/Plastic G:Glass J:Jar B:Bottle Reviewed by: W.S.C

Preservative: h:HCL n:HNO₃ na₂:Na₂S₂O₃ na:NaOH p:H₃PO₄ s:H₂SO₄ znna:ZnAc₂+NaOH Scanned by: PS



8100 Secura Way • Santa Fe Springs, CA 90670
Telephone (562) 347-2500 • Fax (562) 907-3610

April 9, 2009

Cecile de Guia
Calscience
7440 Lincoln Way
Garden Grove, CA 92841-1427

Re: PTS File No: 39288
09-03-2304

Dear Ms. de Guia:

Please find enclosed report for Physical Properties analyses conducted upon cores received from your 09-03-2304 project. All analyses were performed by applicable ASTM, EPA, or API methodologies. An electronic version of the report has previously been sent to your attention via the internet. The cores are currently in storage and will be retained for thirty days past completion of testing at no charge. Please note that the cores will be disposed of at that time. You may contact me regarding storage, disposal, or return of the cores.

PTS Laboratories appreciates the opportunity to be of service. If you have any questions or require additional information, please give me a call at (562) 347-2504.

Sincerely,
PTS Laboratories

A handwritten signature in black ink, appearing to read "Rachel Spitz", written in a cursive style.

Rachel Spitz
Project Manager

Encl.

Project Name: N/A
 Project Number: 09-03-2304

PTS File No: 39288
 Client: Calscience

TEST PROGRAM

CORE ID	Depth ft.	Core Recovery ft.	Moisture Content ASTM D2216	Grain Density API RP40	Dry Bulk Density API RP 40	Total Porosity API RP 40			Notes	
		Plugs:	Vert. 1"							
Rcvd. 3/27/09										
VW6 @ 5-5.5	N/A	N/A	X	X	X	X				
VW7 @ 5-5.5	N/A	N/A	X	X	X	X				
VW8 @ 5-5.5	N/A	N/A	X	X	X	X				
VW9 @ 5-5.5	N/A	N/A	X	X	X	X				
VW10 @ 5-5.5	N/A	N/A	X	X	X	X				
VW11 @ 5-5.5	N/A	N/A	X	X	X	X				
VW12 @ 5-5.5	N/A	N/A	X	X	X	X				
TOTALS:	7 Cores		7	7	7	7				

Laboratory Test Program Notes

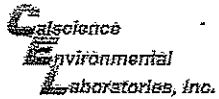
PTS File No: 39288
 Client: Calscience

PHYSICAL PROPERTIES DATA

PROJECT NAME: N/A
 PROJECT NO: 09-03-2304

SAMPLE ID.	DEPTH, ft.	METHODS: SAMPLE ORIENTATION (1)	API RP 40 / ASTM D2216	API RP 40		API RP 40
			MOISTURE CONTENT, % weight	DENSITY		TOTAL POROSITY, %Vb (2)
				BULK, g/cc	GRAIN, g/cc	
VW6 @ 5-5.5	N/A	V	17.3	1.58	2.64	40.3
VW7 @ 5-5.5	N/A	V	15.4	1.61	2.64	39.1
VW8 @ 5-5.5	N/A	V	19.3	1.60	2.63	39.3
VW9 @ 5-5.5	N/A	V	18.8	1.56	2.64	40.9
VW10 @ 5-5.5	N/A	V	17.3	1.44	2.65	45.7
VW11 @ 5-5.5	N/A	V	16.8	1.52	2.60	41.3
VW12 @ 5-5.5	N/A	V	21.4	1.48	2.58	42.7

(1) Sample Orientation: H = horizontal; V = vertical (2) Total Porosity = no pore fluids in place; all interconnected pore channels; Vb = Bulk Volume, cc



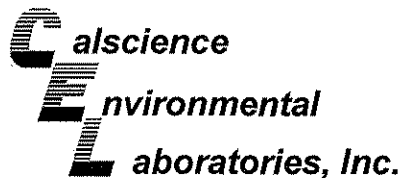
7440 LINCOLN WAY
 GARDEN GROVE, CA 92841-1432
 TEL: (714) 895-5494 . FAX: (714) 894-7501

TO: **PTS - SFS**

CHAIN OF CUSTODY RECORD

DATE: 03/27/09
 PAGE: 1 OF 1

LABORATORY CLIENT: CALSCIENCE ENVIRONMENTAL LABORATORIES, INC.				CLIENT PROJECT NAME/NUMBER: 09-03-2304				P.O. NO.:	
ADDRESS: 7440 LINCOLN WAY				PROJECT CONTACT: Cecile de Guia				LAB USE ONLY: <input type="checkbox"/> <input checked="" type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>	
GARDEN GROVE, CA 92841-1427				SAMPLER(S): (PRINT NAME)				COELT LOG CODE <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>	
TEL: 714-895-5494	FAX:	E-MAIL: cdeguia@calscience.com						COOLER RECEIPT: TEMP: <u>55°F</u>	
TURNAROUND TIME <input type="checkbox"/> SAME DAY <input type="checkbox"/> 24 HR <input type="checkbox"/> 48HR <input checked="" type="checkbox"/> 72 HR <input type="checkbox"/> 5 DAYS <input checked="" type="checkbox"/> STANDARD				REQUESTED ANALYSIS					
SPECIAL REQUIREMENTS (ADDITIONAL COSTS MAY APPLY) <input type="checkbox"/> RWQCB REPORTING <input type="checkbox"/> COELT EDF <input type="checkbox"/>				API RP40: Total Porosity and Bulk Density and Density ASTM D2216 Moisture Content					
SPECIAL INSTRUCTIONS									
LAB USE ONLY	SAMPLE ID	SAMPLING		MAT-RIX	NO. OF CONT.			CONTAINER TYPE	
		DATE	TIME						
	VW6 @ 5-5.5	03/23/09	1224	soil	1	X	X	sleeve	
	VW7 @ 5-5.5	03/23/09	1205	soil	1	X	X		
	VW8 @ 5-5.5	03/23/09	1118	soil	1	X	X		
	VW9 @ 5-5.5	03/23/09	1145	soil	1	X	X		
	VW10 @ 5-5.5	03/23/09	1242	soil	1	X	X		
	VW11 @ 5-5.5	03/23/09	0910	soil	1	X	X		
	VW12 @ 5-5.5	03/23/09	1135	soil	1	X	X	↓	
Relinquished by: (Signature) (CALSCIENCE)				Received by: (Signature / Affiliation) PTS				Date: <u>3-27-09</u>	Time: <u>11:04</u>
Relinquished by: (Signature)				Received by: (Signature / Affiliation)				Date:	Time:
Relinquished by: (Signature)				Received by: (Signature / Affiliation)				Date:	Time:



April 02, 2009

Erik Appel
ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Subject: **Calscience Work Order No.: 09-03-2303**
Client Reference: **ExxonMobil 74121**

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 3/26/2009 and analyzed in accordance with the attached chain-of-custody.

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

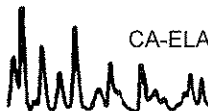
Note that the Chain-of-Custody Record and Sample Receipt Form are integral parts of this report.

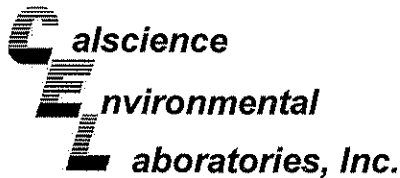
If you have any questions regarding this report, please do not hesitate to contact the undersigned.

Sincerely,

A handwritten signature in black ink that reads "Cecile deGuia". The signature is written in a cursive, flowing style.

Calscience Environmental
Laboratories, Inc.
Cecile deGuia
Project Manager





Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 3550B
Method: EPA 8015B (M)

Project: ExxonMobil 74121

Page 1 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW6@5.5-6	09-03-2303-1-A	03/23/09 12:35	Solid	GC 43	03/26/09	03/26/09 20:50	090326B04

Comment(s): -The sample extract was subjected to Silica Gel treatment prior to analysis.

-Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	85	61-145				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW7@5.5-6	09-03-2303-2-A	03/23/09 12:15	Solid	GC 43	03/26/09	03/26/09 21:10	090326B04

Comment(s): -The sample extract was subjected to Silica Gel treatment prior to analysis.

-Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	86	61-145				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW8@5.5-6	09-03-2303-3-A	03/23/09 11:29	Solid	GC 43	03/26/09	03/26/09 21:30	090326B04

Comment(s): -The sample extract was subjected to Silica Gel treatment prior to analysis.

-Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	83	61-145				

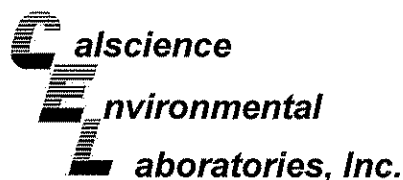
Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9@5.5-6	09-03-2303-4-A	03/23/09 11:55	Solid	GC 43	03/26/09	03/26/09 21:50	090326B04

Comment(s): -The sample extract was subjected to Silica Gel treatment prior to analysis.

-Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	86	61-145				

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 3550B
Method: EPA 8015B (M)

Project: ExxonMobil 74121

Page 2 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW10@5.5-6	09-03-2303-5-A	03/23/09 12:53	Solid	GC 43	03/26/09	03/26/09 10:10	090326B04

Comment(s): -The sample extract was subjected to Silica Gel treatment prior to analysis.

-Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	83	61-145				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW11@5.5-6	09-03-2303-6-A	03/23/09 09:50	Solid	GC 43	03/26/09	03/26/09 10:30	090326B04

Comment(s): -The sample extract was subjected to Silica Gel treatment prior to analysis.

-Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	83	61-145				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW12@5.5-6	09-03-2303-7-A	03/23/09 11:40	Solid	GC 43	03/26/09	03/26/09 10:51	090326B04

Comment(s): -The sample extract was subjected to Silica Gel treatment prior to analysis.

-Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

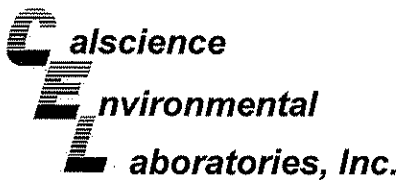
Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	86	61-145				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	099-12-275-2,592	N/A	Solid	GC 43	03/26/09	03/26/09 19:10	090326B04

Comment(s): -Results were evaluated to the MDL, concentrations \geq to the MDL but $<$ RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Diesel	ND	5.0	4.8	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
Decachlorobiphenyl	92	61-145				

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: ExxonMobil 74121

Page 1 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW6@5.5-6	09-03-2303-1-A	03/23/09 12:35	Solid	GC 24	03/31/09	04/01/09 08:31	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	79	42-126				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW7@5.5-6	09-03-2303-2-A	03/23/09 12:15	Solid	GC 24	03/31/09	04/01/09 09:05	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	77	42-126				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW8@5.5-6	09-03-2303-3-A	03/23/09 11:29	Solid	GC 24	03/31/09	04/01/09 11:20	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

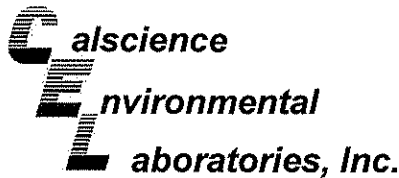
Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	80	42-126				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9@5.5-6	09-03-2303-4-A	03/23/09 11:55	Solid	GC 24	03/31/09	04/01/09 13:26	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	76	42-126				

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: ExxonMobil 74121

Page 2 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW10@5.5-6	09-03-2303-5-A	03/23/09 12:53	Solid	GC 24	03/31/09	04/01/09 14:00	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	79	42-126				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW11@5.5-6	09-03-2303-6-A	03/23/09 09:50	Solid	GC 24	03/31/09	04/01/09 14:33	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	79	42-126				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW12@5.5-6	09-03-2303-7-A	03/23/09 11:40	Solid	GC 24	03/31/09	04/01/09 15:07	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	79	42-126				

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	099-12-279-2,754	N/A	Solid	GC 24	03/31/09	03/31/09 22:49	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	77	42-126				

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

Analytical Report



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
 Work Order No: 09-03-2303
 Preparation: EPA 5030B
 Method: EPA 8260B
 Units: mg/kg

Project: ExxonMobil 74121

Page 1 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW6@5.5-6	09-03-2303-1-A	03/23/09 12:35	Solid	GC/MS QQ	03/31/09	03/31/09 16:30	090331L01

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	0.00032	0.0050	0.00016	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	0.0015	0.0050	0.00032	1	J						
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	Limits		Qual	
Dibromofluoromethane	102	73-139				1,2-Dichloroethane-d4	109	73-145			
Toluene-d8	100	90-108				1,4-Bromofluorobenzene	95	71-113			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW7@5.5-6	09-03-2303-2-A	03/23/09 12:15	Solid	GC/MS QQ	03/30/09	03/30/09 21:45	090330L01

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

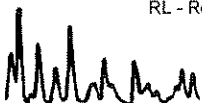
Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	ND	0.0050	0.00016	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	ND	0.0050	0.00032	1							
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	Limits		Qual	
Dibromofluoromethane	96	73-139				1,2-Dichloroethane-d4	98	73-145			
Toluene-d8	98	90-108				1,4-Bromofluorobenzene	93	71-113			

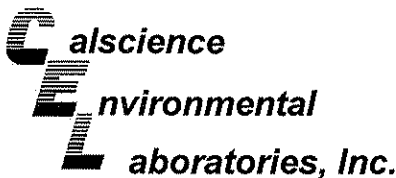
Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW8@5.5-6	09-03-2303-3-A	03/23/09 11:29	Solid	GC/MS QQ	03/30/09	03/30/09 22:10	090330L01

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	0.00018	0.0050	0.00016	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	ND	0.0050	0.00032	1							
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	Limits		Qual	
Dibromofluoromethane	96	73-139				1,2-Dichloroethane-d4	98	73-145			
Toluene-d8	100	90-108				1,4-Bromofluorobenzene	95	71-113			

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





Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B
Units: mg/kg

Project: ExxonMobil 74121

Page 2 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9@5.5-6	09-03-2303-4-A	03/23/09 11:55	Solid	GC/MS QQ	03/30/09	03/30/09 22:35	090330L01

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	ND	0.0050	0.00016	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	ND	0.0050	0.00032	1							
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	I Limits		Qual	
Dibromofluoromethane	96	73-139				1,2-Dichloroethane-d4	96	73-145			
Toluene-d8	101	90-108				1,4-Bromofluorobenzene	94	71-113			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW10@5.5-6	09-03-2303-5-A	03/23/09 12:53	Solid	GC/MS QQ	03/30/09	03/30/09 23:00	090330L01

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

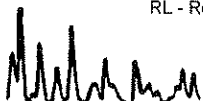
Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	ND	0.0050	0.00016	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	ND	0.0050	0.00032	1							
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	I Limits		Qual	
Dibromofluoromethane	98	73-139				1,2-Dichloroethane-d4	99	73-145			
Toluene-d8	99	90-108				1,4-Bromofluorobenzene	94	71-113			

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW11@5.5-6	09-03-2303-6-A	03/23/09 09:50	Solid	GC/MS QQ	03/30/09	03/30/09 23:26	090330L01

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	0.00071	0.0050	0.00016	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	0.00051	0.0050	0.00029	1	J	Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	0.0032	0.0050	0.00032	1	J						
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	I Limits		Qual	
Dibromofluoromethane	98	73-139				1,2-Dichloroethane-d4	99	73-145			
Toluene-d8	99	90-108				1,4-Bromofluorobenzene	93	71-113			

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B
Units: mg/kg

Project: ExxonMobil 74121

Page 3 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW12@5.5-6	09-03-2303-7-A	03/23/09 11:40	Solid	GC/MS QQ	03/30/09	03/30/09 23:51	090330L01

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	ND	0.0050	0.00016	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	0.00033	0.0050	0.00032	1	J						
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	Limits		Qual	
Dibromofluoromethane	97	73-139				1,2-Dichloroethane-d4	97	73-145			
Toluene-d8	100	90-108				1,4-Bromofluorobenzene	91	71-113			

Method Blank 099-12-796-1,238 N/A Solid GC/MS QQ 03/30/09 03/30/09 090330L01
15:00

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

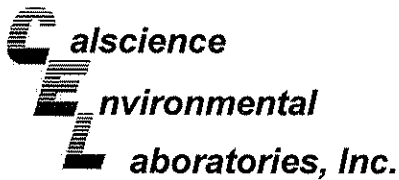
Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	ND	0.0050	0.00016	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	ND	0.0050	0.00032	1							
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	Limits		Qual	
Dibromofluoromethane	94	73-139				1,2-Dichloroethane-d4	95	73-145			
Toluene-d8	100	90-108				1,4-Bromofluorobenzene	92	71-113			

Method Blank 099-12-796-1,247 N/A Solid GC/MS QQ 03/31/09 03/31/09 090331L01
15:39

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.00020	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	0.00025	1	
1,2-Dibromoethane	ND	0.0050	0.00025	1		Tert-Butyl Alcohol (TBA)	ND	0.050	0.022	1	
1,2-Dichloroethane	ND	0.0050	0.00026	1		Diisopropyl Ether (DIPE)	ND	0.010	0.00034	1	
Ethylbenzene	ND	0.0050	0.00016	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	0.00028	1	
Toluene	ND	0.0050	0.00029	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	0.00026	1	
Xylenes (total)	ND	0.0050	0.00032	1							
Surrogates:	REC (%)	Control Limits		Qual		Surrogates:	REC (%)	Limits		Qual	
Dibromofluoromethane	101	73-139				1,2-Dichloroethane-d4	102	73-145			
Toluene-d8	101	90-108				1,4-Bromofluorobenzene	93	71-113			

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B
Units: mg/kg

Project: ExxonMobil 74121

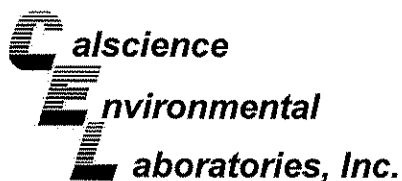
Page 4 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	099-12-796-1,260	N/A	Solid	GC/MS QQ	04/01/09	04/01/09 15:14	090401L02

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.020	100		Methyl-t-Butyl Ether (MTBE)	ND	0.50	0.025	100	
1,2-Dibromoethane	ND	0.50	0.025	100		Tert-Butyl Alcohol (TBA)	ND	5.0	2.2	100	
1,2-Dichloroethane	ND	0.50	0.026	100		Diisopropyl Ether (DIPE)	ND	1.0	0.034	100	
Ethylbenzene	ND	0.50	0.016	100		Ethyl-t-Butyl Ether (ETBE)	ND	1.0	0.028	100	
Toluene	ND	0.50	0.029	100		Tert-Amyl-Methyl Ether (TAME)	ND	1.0	0.026	100	
Xylenes (total)	ND	0.50	0.032	100							
Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Limits	Qual				
Dibromofluoromethane	101	73-139		1,2-Dichloroethane-d4	106	73-145					
Toluene-d8	100	90-108		1,4-Bromofluorobenzene	94	71-113					

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



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

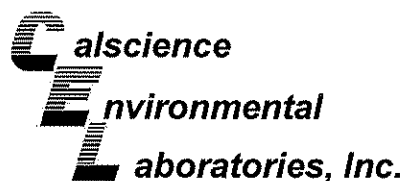
Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 3550B
Method: EPA 8015B (M)

Project ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
VW6@5.5-6	Solid	GC 43	03/26/09	03/26/09	090326S04

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Diesel	91	93	64-130	2	0-15	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

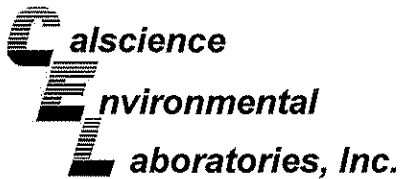
Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-03-2665-1	Solid	GC-24	03/31/09	04/01/09	090331S03

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	73	72	48-114	2	0-23	

RPD - Relative Percent Difference, CL - Control Limit



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

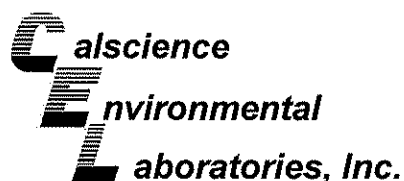
Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B

Project ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-03-1797-21	Solid	GC/MS QQ	03/30/09	03/30/09	090330S01

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	102	100	79-115	2	0-13	
Carbon Tetrachloride	105	104	55-139	1	0-15	
Chlorobenzene	102	101	79-115	1	0-17	
1,2-Dibromoethane	101	101	70-130	0	0-30	
1,2-Dichlorobenzene	101	102	63-123	1	0-23	
1,1-Dichloroethene	102	101	69-123	1	0-16	
Ethylbenzene	101	99	70-130	2	0-30	
Toluene	102	100	79-115	2	0-15	
Trichloroethene	103	100	66-144	2	0-14	
Vinyl Chloride	109	106	60-126	3	0-14	
Methyl-t-Butyl Ether (MTBE)	97	98	68-128	1	0-14	
Tert-Butyl Alcohol (TBA)	98	96	44-134	2	0-37	
Diisopropyl Ether (DIPE)	95	95	75-123	0	0-12	
Ethyl-t-Butyl Ether (ETBE)	95	97	75-117	2	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	96	79-115	1	0-12	
Ethanol	92	93	42-138	1	0-28	

RPD - Relative Percent Difference, CL - Control Limit



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

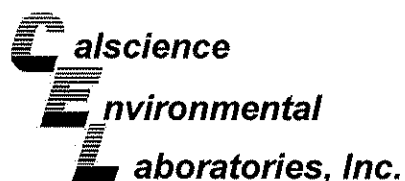
Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B

Project ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-03-2258-2	Solid	GC/MS QQ	03/31/09	03/31/09	090331S01

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	101	99	79-115	3	0-13	
Carbon Tetrachloride	109	106	55-139	2	0-15	
Chlorobenzene	100	99	79-115	1	0-17	
1,2-Dibromoethane	105	102	70-130	2	0-30	
1,2-Dichlorobenzene	98	98	63-123	0	0-23	
1,1-Dichloroethene	109	106	69-123	3	0-16	
Ethylbenzene	98	98	70-130	0	0-30	
Toluene	99	98	79-115	1	0-15	
Trichloroethene	103	100	66-144	3	0-14	
Vinyl Chloride	113	109	60-126	4	0-14	
Methyl-t-Butyl Ether (MTBE)	110	110	68-128	0	0-14	
Tert-Butyl Alcohol (TBA)	116	123	44-134	3	0-37	
Diisopropyl Ether (DIPE)	112	106	75-123	5	0-12	
Ethyl-t-Butyl Ether (ETBE)	102	100	75-117	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	96	79-115	1	0-12	
Ethanol	111	94	42-138	15	0-28	

RPD - Relative Percent Difference, CL - Control Limit



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

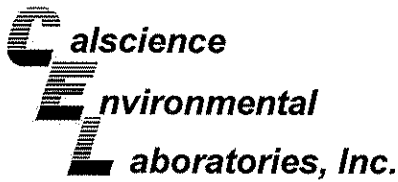
Date Received: 03/26/09
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B

Project ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-03-2642-1	Solid	GC/MS-QQ	04/01/09	04/01/09	090401S01

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	97	97	79-115	0	0-13	
Carbon Tetrachloride	101	102	55-139	1	0-15	
Chlorobenzene	98	96	79-115	2	0-17	
1,2-Dibromoethane	99	99	70-130	0	0-30	
1,2-Dichlorobenzene	95	96	63-123	2	0-23	
1,1-Dichloroethene	105	102	69-123	2	0-16	
Ethylbenzene	95	94	70-130	1	0-30	
Toluene	95	96	79-115	1	0-15	
Trichloroethene	96	97	66-144	1	0-14	
Vinyl Chloride	107	108	60-126	1	0-14	
Methyl-t-Butyl Ether (MTBE)	101	103	68-128	2	0-14	
Tert-Butyl Alcohol (TBA)	88	95	44-134	8	0-37	
Diisopropyl Ether (DIPE)	108	108	75-123	0	0-12	
Ethyl-t-Butyl Ether (ETBE)	101	101	75-117	0	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	98	79-115	2	0-12	
Ethanol	103	118	42-138	14	0-28	

RPD - Relative Percent Difference, CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

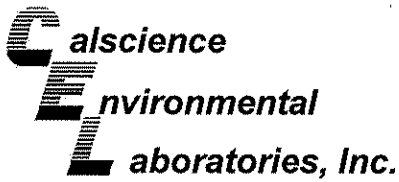
Date Received: N/A
 Work Order No: 09-03-2303
 Preparation: EPA 3550B
 Method: EPA 8015B (M)

Project: ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-275-2,592	Solid	GC 43	03/26/09	03/26/09	090326B04

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Diesel	90	90	75-123	0	0-12	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

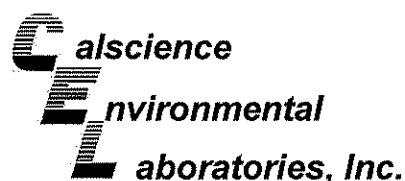
Date Received: N/A
 Work Order No: 09-03-2303
 Preparation: EPA 5030B
 Method: EPA 8015B (M)

Project: ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-2,754	Solid	GC 24	03/31/09	04/01/09	090331B03

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	99	100	70-124	1	0-18	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B

Project: ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
099-12-796-1,238	Solid	GC/MS QQ	03/30/09	03/30/09	090330L01		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	96	95	84-114	79-119	1	0-7	
Carbon Tetrachloride	98	98	66-132	55-143	0	0-12	
Chlorobenzene	101	100	87-111	83-115	1	0-7	
1,2-Dibromoethane	102	101	80-120	73-127	1	0-20	
1,2-Dichlorobenzene	102	100	79-115	73-121	2	0-8	
1,1-Dichloroethene	92	91	73-121	65-129	1	0-12	
Ethylbenzene	97	97	80-120	73-127	0	0-20	
Toluene	97	97	78-114	72-120	0	0-7	
Trichloroethene	99	100	84-114	79-119	1	0-8	
Vinyl Chloride	94	94	63-129	52-140	0	0-15	
Methyl-t-Butyl Ether (MTBE)	97	95	77-125	69-133	2	0-11	
Tert-Butyl Alcohol (TBA)	101	93	47-137	32-152	8	0-27	
Diisopropyl Ether (DIPE)	91	91	76-130	67-139	1	0-8	
Ethyl-t-Butyl Ether (ETBE)	95	95	76-124	68-132	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	100	98	82-118	76-124	2	0-11	
Ethanol	95	89	59-131	47-143	6	0-21	

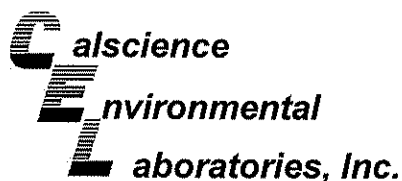
Total number of LCS compounds : 16

Total number of ME compounds : 0

Total number of ME compounds allowed : 1

LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B

Project: ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
099-12-796-1,247	Solid	GC/MS QQ	03/31/09	03/31/09	090331L01		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	100	99	84-114	79-119	0	0-7	
Carbon Tetrachloride	108	105	66-132	55-143	3	0-12	
Chlorobenzene	102	101	87-111	83-115	1	0-7	
1,2-Dibromoethane	102	101	80-120	73-127	1	0-20	
1,2-Dichlorobenzene	102	101	79-115	73-121	2	0-8	
1,1-Dichloroethene	107	103	73-121	65-129	3	0-12	
Ethylbenzene	100	99	80-120	73-127	1	0-20	
Toluene	100	98	78-114	72-120	1	0-7	
Trichloroethene	102	102	84-114	79-119	0	0-8	
Vinyl Chloride	112	108	63-129	52-140	3	0-15	
Methyl-t-Butyl Ether (MTBE)	99	100	77-125	69-133	1	0-11	
Tert-Butyl Alcohol (TBA)	95	93	47-137	32-152	2	0-27	
Diisopropyl Ether (DIPE)	108	106	76-130	67-139	2	0-8	
Ethyl-t-Butyl Ether (ETBE)	99	98	76-124	68-132	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	97	82-118	76-124	0	0-11	
Ethanol	100	95	59-131	47-143	6	0-21	

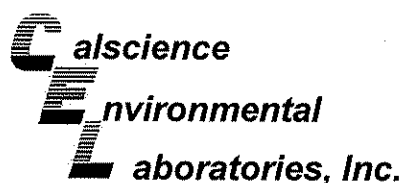
Total number of LCS compounds : 16

Total number of ME compounds : 0

Total number of ME compounds allowed : 1

LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2303
Preparation: EPA 5030B
Method: EPA 8260B

Project: ExxonMobil 74121

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
099-12-796-1,260	Solid	GC/MS QQ	04/01/09	04/01/09	090401L02		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	99	100	84-114	79-119	1	0-7	
Carbon Tetrachloride	108	109	66-132	55-143	1	0-12	
Chlorobenzene	102	102	87-111	83-115	1	0-7	
1,2-Dibromoethane	104	104	80-120	73-127	0	0-20	
1,2-Dichlorobenzene	103	102	79-115	73-121	0	0-8	
1,1-Dichloroethene	109	109	73-121	65-129	0	0-12	
Ethylbenzene	101	100	80-120	73-127	1	0-20	
Toluene	98	100	78-114	72-120	2	0-7	
Trichloroethene	100	102	84-114	79-119	2	0-8	
Vinyl Chloride	116	114	63-129	52-140	2	0-15	
Methyl-t-Butyl Ether (MTBE)	103	103	77-125	69-133	0	0-11	
Tert-Butyl Alcohol (TBA)	99	92	47-137	32-152	7	0-27	
Diisopropyl Ether (DIPE)	111	112	76-130	67-139	1	0-8	
Ethyl-t-Butyl Ether (ETBE)	101	103	76-124	68-132	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	98	82-118	76-124	1	0-11	
Ethanol	136	110	59-131	47-143	21	0-21	

Total number of LCS compounds : 16

Total number of ME compounds : 1

Total number of ME compounds allowed : 1

LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit



Work Order Number: 09-03-2303

<u>Qualifier</u>	<u>Definition</u>
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
I	Compound did not meet method-described identification guidelines. Identification was based on additional GC/MS characteristics.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.

SAMPLE RECEIPT FORM

Cooler 1 of 1

CLIENT: ETIC

DATE: 03/26/09

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

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

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

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

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

Ambient Temperature: Air Filter Metals Only PCBs Only Initial: JP

CUSTODY SEALS INTACT:

Cooler _____ No (Not Intact) Not Present N/A Initial: JP

Sample _____ No (Not Intact) Not Present Initial: J.L

SAMPLE CONDITION:

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

CONTAINER TYPE:

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

Water: VOA VOAh VOAna₂ 125AGB 125AGBh 125AGBpo₄ 1AGB 1AGBna₂

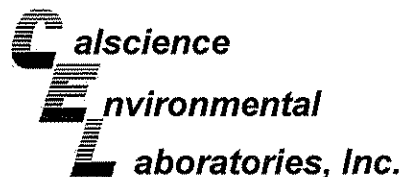
1AGBs 500AGB 500AGBs 250CGB 250CGBs 1PB 500PB 500PBna 250PB

250PBn 125PB 125PBznn 100PBsterile 100PBna₂ _____ _____ _____

Air: Tedlar® Summa® _____ **Sludge/Other:** _____ **Checked/Labeled by:** DL

Container: C:Clear A:Amber P:Poly/Plastic G:Glass J:Jar B: Bottle **Reviewed by:** W.S.C

Preservative: h:HCL n:HNO₃ na₂:Na₂S₂O₃ na:NaOH p:H₃PO₄ s:H₂SO₄ znn:ZnAc₂+NaOH **Scanned by:** DL



April 03, 2009

Erik Appel
ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Subject: **Calscience Work Order No.: 09-03-2526**
Client Reference: **ExxonMobil 74121, 10605 Foothill Boulevard,
CA**

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 3/28/2009 and analyzed in accordance with the attached chain-of-custody.

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

Note that the Chain-of-Custody Record and Sample Receipt Form are integral parts of this report.

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

Sincerely,

A handwritten signature in black ink that reads "Cecile deGuia".

Calscience Environmental
Laboratories, Inc.
Cecile deGuia
Project Manager

A handwritten signature in black ink, appearing to be a stylized name.

Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
Work Order No: 09-03-2526
Preparation: N/A
Method: ASTM D-1946
Units: %v

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW7	09-03-2526-1-A	03/27/09 12:59	Air	GC 34	N/A	03/31/09 15:32	090331L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.810	1.62		Oxygen + Argon	6.94	0.810	1.62	
Carbon Dioxide	5.52	0.810	1.62						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW8	09-03-2526-2-A	03/27/09 12:41	Air	GC 34	N/A	03/31/09 16:05	090331L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	2.61	0.775	1.55		Oxygen + Argon	2.91	0.775	1.55	
Carbon Dioxide	5.98	0.775	1.55						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9	09-03-2526-3-A	03/27/09 12:00	Air	GC 34	N/A	03/31/09 16:42	090331L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.820	1.64		Oxygen + Argon	11.2	0.820	1.64	
Carbon Dioxide	4.36	0.820	1.64						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW10	09-03-2526-4-A	03/27/09 13:22	Air	GC 34	N/A	03/31/09 17:18	090331L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.780	1.56		Oxygen + Argon	4.21	0.780	1.56	
Carbon Dioxide	2.69	0.780	1.56						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW11	09-03-2526-5-A	03/27/09 13:43	Air	GC 34	N/A	03/31/09 17:52	090331L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.770	1.54		Oxygen + Argon	6.18	0.770	1.54	
Carbon Dioxide	6.69	0.770	1.54						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW12	09-03-2526-6-A	03/27/09 12:03	Air	GC 34	N/A	03/31/09 18:27	090331L01

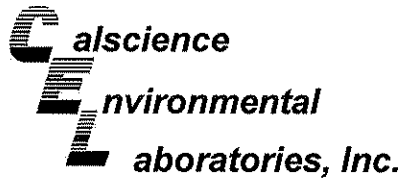
Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	1.26	2.53		Oxygen + Argon	12.9	1.26	2.53	
Carbon Dioxide	4.78	1.26	2.53						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9 DUP	09-03-2526-7-A	03/27/09 14:15	Air	GC 34	N/A	03/31/09 19:03	090331L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	9.05	18.1		Oxygen + Argon	ND	9.05	18.1	
Carbon Dioxide	ND	9.05	18.1						

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





Analytical Report



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
 Work Order No: 09-03-2526
 Preparation: N/A
 Method: ASTM D-1946
 Units: %v

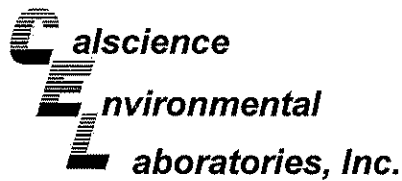
Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 2 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	099-03-002-764	N/A	Air	GC 34	N/A	03/31/09 09:19	090331L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.500	1		Oxygen + Argon	ND	0.500	1	
Carbon Dioxide	ND	0.500	1		Nitrogen	ND	0.500	1	
Carbon Monoxide	ND	0.500	1						

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



Analytical Report



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
 Work Order No: 09-03-2526
 Preparation: N/A
 Method: EPA TO-3M

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW7	09-03-2526-1-A	03/27/09 12:59	Air	GC 13	N/A	03/28/09 12:59	090328L01

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	11000	9300	1.62		ug/m3

VW8	09-03-2526-2-A	03/27/09 12:41	Air	GC 13	N/A	03/28/09 14:29	090328L01
-----	----------------	----------------	-----	-------	-----	----------------	-----------

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	4400000	44000	7.75		ug/m3

VW9	09-03-2526-3-A	03/27/09 12:00	Air	GC 13	N/A	03/28/09 14:57	090328L01
-----	----------------	----------------	-----	-------	-----	----------------	-----------

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	65000	9400	1.64		ug/m3

VW10	09-03-2526-4-A	03/27/09 13:22	Air	GC 13	N/A	03/28/09 13:42	090328L01
------	----------------	----------------	-----	-------	-----	----------------	-----------

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	880000	8900	1.56		ug/m3

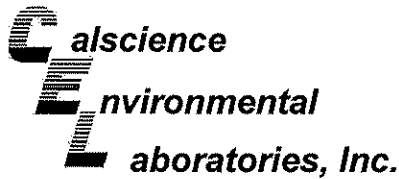
VW11	09-03-2526-5-A	03/27/09 13:43	Air	GC 13	N/A	03/28/09 13:52	090328L01
------	----------------	----------------	-----	-------	-----	----------------	-----------

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	210000	8800	1.54		ug/m3

VW12	09-03-2526-6-A	03/27/09 12:03	Air	GC 13	N/A	03/28/09 14:06	090328L01
------	----------------	----------------	-----	-------	-----	----------------	-----------

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	17000	15000	2.53		ug/m3

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



Analytical Report



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
 Work Order No: 09-03-2526
 Preparation: N/A
 Method: EPA TO-3M

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 2 of 2

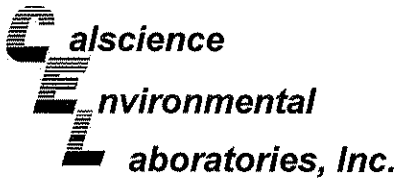
Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9 DUP	09-03-2526-7-A	03/27/09 14:15	Air	GC 13	N/A	03/28/09 14:16	090328L01

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	130000	100000	18.1		ug/m3

Method Blank	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	098-01-005-1,736	N/A	Air	GC 13	N/A	03/28/09 08:39	090328L01

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	5700	1		ug/m3

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15
Units: ug/m3

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW7	09-03-2526-1-A	03/27/09 12:59	Air	GC/MS II	N/A	03/29/09 00:38	090328L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	54	2.6	1.62		Methyl-t-Butyl Ether (MTBE)	ND	12	1.62	
Diisopropyl Ether (DIPE)	ND	14	1.62		Xylenes (total)	860	14	1.62	
1,2-Dibromoethane	ND	6.2	1.62		Tert-Amyl-Methyl Ether (TAME)	ND	14	1.62	
1,2-Dichloroethane	ND	3.3	1.62		Tert-Butyl Alcohol (TBA)	ND	9.8	1.62	
Ethyl-t-Butyl Ether (ETBE)	ND	14	1.62		Toluene	910	21	11.1	
Ethylbenzene	180	3.5	1.62		1,1-Difluoroethane	ND	8.8	1.62	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	104	57-129			1,2-Dichloroethane-d4	114	47-137		
Toluene-d8	99	78-156							

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW8	09-03-2526-2-A	03/27/09 12:41	Air	GC/MS II	N/A	03/31/09 04:00	090330L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	99	62		Methyl-t-Butyl Ether (MTBE)	ND	450	62	
Diisopropyl Ether (DIPE)	ND	520	62		Xylenes (total)	ND	540	62	
1,2-Dibromoethane	ND	240	62		Tert-Amyl-Methyl Ether (TAME)	ND	520	62	
1,2-Dichloroethane	ND	130	62		Tert-Butyl Alcohol (TBA)	ND	380	62	
Ethyl-t-Butyl Ether (ETBE)	ND	520	62		Toluene	ND	120	62	
Ethylbenzene	ND	130	62		1,1-Difluoroethane	ND	330	62	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	119	57-129			1,2-Dichloroethane-d4	112	47-137		
Toluene-d8	29	78-156		2					

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9	09-03-2526-3-A	03/27/09 12:00	Air	GC/MS II	N/A	03/29/09 01:24	090328L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	25	6.5	4.1		Methyl-t-Butyl Ether (MTBE)	ND	30	4.1	
Diisopropyl Ether (DIPE)	ND	34	4.1		Xylenes (total)	260	36	4.1	
1,2-Dibromoethane	ND	16	4.1		Tert-Amyl-Methyl Ether (TAME)	ND	34	4.1	
1,2-Dichloroethane	ND	8.3	4.1		Tert-Butyl Alcohol (TBA)	ND	25	4.1	
Ethyl-t-Butyl Ether (ETBE)	ND	34	4.1		Toluene	250	7.7	4.1	
Ethylbenzene	51	8.9	4.1		1,1-Difluoroethane	ND	22	4.1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	99	57-129			1,2-Dichloroethane-d4	110	47-137		
Toluene-d8	63	78-156		2					

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

Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15
Units: ug/m3

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 2 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW10	09-03-2526-4-A	03/27/09 13:22	Air	GC/MS II	N/A	03/31/09 00:55	090330L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	38	25	15.6		Methyl-t-Butyl Ether (MTBE)	ND	110	15.6	
Diisopropyl Ether (DIPE)	ND	130	15.6		Xylenes (total)	550	140	15.6	
1,2-Dibromoethane	ND	60	15.6		Tert-Amyl-Methyl Ether (TAME)	ND	130	15.6	
1,2-Dichloroethane	ND	32	15.6		Tert-Butyl Alcohol (TBA)	ND	95	15.6	
Ethyl-t-Butyl Ether (ETBE)	ND	130	15.6		Toluene	520	29	15.6	
Ethylbenzene	120	34	15.6		1,1-Difluoroethane	ND	84	15.6	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	103	57-129			1,2-Dichloroethane-d4	116	47-137		
Toluene-d8	30	78-156		2					

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW11	09-03-2526-5-A	03/27/09 13:43	Air	GC/MS II	N/A	03/29/09 02:56	090328L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	110	25	15.4		Methyl-t-Butyl Ether (MTBE)	ND	110	15.4	
Diisopropyl Ether (DIPE)	ND	130	15.4		Xylenes (total)	1000	130	15.4	
1,2-Dibromoethane	ND	59	15.4		Tert-Amyl-Methyl Ether (TAME)	ND	130	15.4	
1,2-Dichloroethane	ND	31	15.4		Tert-Butyl Alcohol (TBA)	ND	93	15.4	
Ethyl-t-Butyl Ether (ETBE)	ND	130	15.4		Toluene	860	29	15.4	
Ethylbenzene	230	33	15.4		1,1-Difluoroethane	5300	330	61.6	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	99	57-129			1,2-Dichloroethane-d4	112	47-137		
Toluene-d8	49	78-156		2					

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW12	09-03-2526-6-A	03/27/09 12:03	Air	GC/MS II	N/A	03/29/09 03:44	090328L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	90	4.0	2.53		Methyl-t-Butyl Ether (MTBE)	ND	18	2.53	
Diisopropyl Ether (DIPE)	ND	21	2.53		Xylenes (total)	1500	22	2.53	
1,2-Dibromoethane	ND	9.7	2.53		Tert-Amyl-Methyl Ether (TAME)	ND	21	2.53	
1,2-Dichloroethane	ND	5.1	2.53		Tert-Butyl Alcohol (TBA)	ND	15	2.53	
Ethyl-t-Butyl Ether (ETBE)	ND	21	2.53		Toluene	1700	33	17.7	
Ethylbenzene	340	5.5	2.53		1,1-Difluoroethane	ND	14	2.53	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	99	57-129			1,2-Dichloroethane-d4	110	47-137		
Toluene-d8	92	78-156							

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15
Units: ug/m3

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 3 of 4

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW9 DUP	09-03-2526-7-A	03/27/09 14:15	Air	GC/MS II	N/A	03/31/09 03:15	090330L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	150	29	18.1		Methyl-t-Butyl Ether (MTBE)	ND	130	18.1	
Diisopropyl Ether (DIPE)	ND	150	18.1		Xylenes (total)	1600	160	18.1	
1,2-Dibromoethane	ND	70	18.1		Tert-Amyl-Methyl Ether (TAME)	ND	150	18.1	
1,2-Dichloroethane	ND	37	18.1		Tert-Butyl Alcohol (TBA)	ND	110	18.1	
Ethyl-t-Butyl Ether (ETBE)	ND	150	18.1		Toluene	1600	34	18.1	
Ethylbenzene	310	39	18.1		1,1-Difluoroethane	ND	98	18.1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	98	57-129			1,2-Dichloroethane-d4	112	47-137		
Toluene-d8	87	78-156							

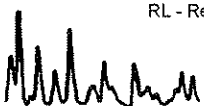
Method Blank	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	095-01-021-7,420	N/A	Air	GC/MS II	N/A	03/28/09 12:02	090328L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	1.6	1		Methyl-t-Butyl Ether (MTBE)	ND	7.2	1	
Diisopropyl Ether (DIPE)	ND	8.4	1		Xylenes (total)	ND	8.7	1	
1,2-Dibromoethane	ND	3.8	1		Tert-Amyl-Methyl Ether (TAME)	ND	8.4	1	
1,2-Dichloroethane	ND	2.0	1		Tert-Butyl Alcohol (TBA)	ND	6.1	1	
Ethyl-t-Butyl Ether (ETBE)	ND	8.4	1		Toluene	ND	1.9	1	
Ethylbenzene	ND	2.2	1		1,1-Difluoroethane	ND	5.4	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	97	57-129			1,2-Dichloroethane-d4	112	47-137		
Toluene-d8	94	78-156							

Method Blank	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	095-01-021-7,424	N/A	Air	GC/MS II	N/A	03/30/09 13:31	090330L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	1.6	1		Methyl-t-Butyl Ether (MTBE)	ND	7.2	1	
Diisopropyl Ether (DIPE)	ND	8.4	1		Xylenes (total)	ND	8.7	1	
1,2-Dibromoethane	ND	3.8	1		Tert-Amyl-Methyl Ether (TAME)	ND	8.4	1	
1,2-Dichloroethane	ND	2.0	1		Tert-Butyl Alcohol (TBA)	ND	6.1	1	
Ethyl-t-Butyl Ether (ETBE)	ND	8.4	1		Toluene	ND	1.9	1	
Ethylbenzene	ND	2.2	1		1,1-Difluoroethane	ND	5.4	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	96	57-129			1,2-Dichloroethane-d4	116	47-137		
Toluene-d8	93	78-156							

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/28/09
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15
Units: ug/m3

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 4 of 4

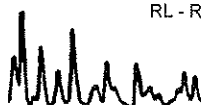
Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	095-01-021-7,428	N/A	Air	GC/MS II	N/A	03/31/09 14:08	090331L01

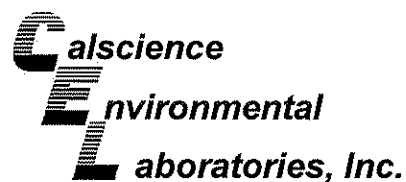
Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	1.6	1		Methyl-t-Butyl Ether (MTBE)	ND	7.2	1	
Diisopropyl Ether (DIPE)	ND	8.4	1		Xylenes (total)	ND	8.7	1	
1,2-Dibromoethane	ND	3.8	1		Tert-Amyl-Methyl Ether (TAME)	ND	8.4	1	
1,2-Dichloroethane	ND	2.0	1		Tert-Butyl Alcohol (TBA)	ND	6.1	1	
Ethyl-t-Butyl Ether (ETBE)	ND	8.4	1		Toluene	ND	1.9	1	
Ethylbenzene	ND	2.2	1		1,1-Difluoroethane	ND	5.4	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	95	57-129			1,2-Dichloroethane-d4	115	47-137		
Toluene-d8	100	78-156							

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	095-01-021-7,445	N/A	Air	GC/MS V	N/A	04/02/09 12:17	090402L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	1.6	1		Methyl-t-Butyl Ether (MTBE)	ND	7.2	1	
Diisopropyl Ether (DIPE)	ND	8.4	1		Xylenes (total)	ND	8.7	1	
1,2-Dibromoethane	ND	3.8	1		Tert-Amyl-Methyl Ether (TAME)	ND	8.4	1	
1,2-Dichloroethane	ND	2.0	1		Tert-Butyl Alcohol (TBA)	ND	6.1	1	
Ethyl-t-Butyl Ether (ETBE)	ND	8.4	1		Toluene	ND	1.9	1	
Ethylbenzene	ND	2.2	1		1,1-Difluoroethane	ND	5.4	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	96	57-129			1,2-Dichloroethane-d4	102	47-137		
Toluene-d8	98	78-156							

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





Quality Control - Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

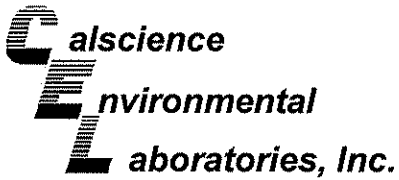
Date Received: 03/28/09
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-3M

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared:	Date Analyzed:	Duplicate Batch Number
09-03-2410-29	Air	GC 13	N/A	03/28/09	090328D01

Parameter	Sample Conc	DUP Conc	RPD	RPD CL	Qualifiers
TPH as Gasoline	950000	950000	0	0-20	

RPD - Relative Percent Difference, CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

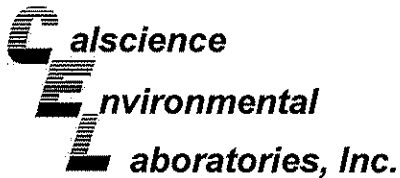
Date Received: N/A
 Work Order No: 09-03-2526
 Preparation: N/A
 Method: ASTM D-1946

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-03-002-764	Air	GC 34	N/A	03/31/09	090331L01

Parameter	LCS Conc	LCSD Conc	RPD	RPD CL	Qualifiers
Carbon Dioxide	4.808	5.229	8	0-30	
Oxygen + Argon	21.20	22.26	5	0-30	
Nitrogen	78.49	82.29	5	0-30	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
095-01-021-7,420	Air	GC/MS II	N/A	03/28/09	090328L01		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	112	112	60-156	44-172	0	0-40	
Carbon Tetrachloride	114	114	64-154	49-169	0	0-32	
1,2-Dibromoethane	113	115	54-144	39-159	2	0-36	
1,2-Dichlorobenzene	98	103	34-160	13-181	5	0-47	
1,2-Dichloroethane	118	117	69-153	55-167	1	0-30	
1,2-Dichloropropane	115	116	67-157	52-172	0	0-35	
1,4-Dichlorobenzene	100	105	36-156	16-176	4	0-47	
c-1,3-Dichloropropene	116	118	61-157	45-173	1	0-35	
Ethylbenzene	103	107	52-154	35-171	4	0-38	
o-Xylene	106	111	52-148	36-164	5	0-38	
p/m-Xylene	109	114	42-156	23-175	4	0-41	
Tetrachloroethene	104	105	56-152	40-168	1	0-40	
Toluene	109	112	56-146	41-161	3	0-43	
Trichloroethene	110	111	63-159	47-175	0	0-34	
1,1,2-Trichloroethane	111	113	65-149	51-163	1	0-37	
Vinyl Chloride	115	116	45-177	23-199	1	0-36	

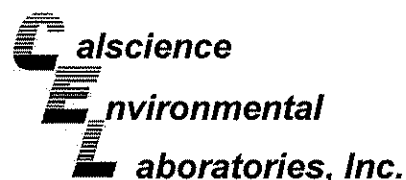
Total number of LCS compounds : 16

Total number of ME compounds : 0

Total number of ME compounds allowed : 1

LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
095-01-021-7,424	Air	GC/MS II	N/A	03/30/09	090330L01		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	106	111	60-156	44-172	5	0-40	
Carbon Tetrachloride	115	117	64-154	49-169	2	0-32	
1,2-Dibromoethane	110	116	54-144	39-159	6	0-36	
1,2-Dichlorobenzene	100	111	34-160	13-181	10	0-47	
1,2-Dichloroethane	116	123	69-153	55-167	6	0-30	
1,2-Dichloropropane	109	114	67-157	52-172	5	0-35	
1,4-Dichlorobenzene	102	111	36-156	16-176	9	0-47	
c-1,3-Dichloropropene	113	119	61-157	45-173	5	0-35	
Ethylbenzene	104	113	52-154	35-171	9	0-38	
o-Xylene	108	118	52-148	36-164	9	0-38	
p/m-Xylene	108	118	42-156	23-175	9	0-41	
Tetrachloroethene	100	106	56-152	40-168	6	0-40	
Toluene	106	112	56-146	41-161	6	0-43	
Trichloroethene	106	109	63-159	47-175	3	0-34	
1,1,2-Trichloroethane	109	114	65-149	51-163	4	0-37	
Vinyl Chloride	105	109	45-177	23-199	4	0-36	

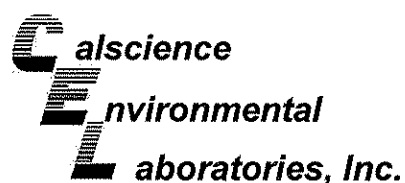
Total number of LCS compounds : 16

Total number of ME compounds : 0

Total number of ME compounds allowed : 1

LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
095-01-021-7,428	Air	GC/MS II	N/A	03/31/09	090331L01		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	103	110	60-156	44-172	7	0-40	
Carbon Tetrachloride	113	118	64-154	49-169	4	0-32	
1,2-Dibromoethane	111	116	54-144	39-159	5	0-36	
1,2-Dichlorobenzene	102	109	34-160	13-181	6	0-47	
1,2-Dichloroethane	111	121	69-153	55-167	9	0-30	
1,2-Dichloropropane	106	113	67-157	52-172	6	0-35	
1,4-Dichlorobenzene	103	110	36-156	16-176	7	0-47	
c-1,3-Dichloropropene	109	117	61-157	45-173	7	0-35	
Ethylbenzene	102	109	52-154	35-171	7	0-38	
o-Xylene	109	117	52-148	36-164	7	0-38	
p/m-Xylene	113	119	42-156	23-175	5	0-41	
Tetrachloroethene	100	105	56-152	40-168	4	0-40	
Toluene	104	110	56-146	41-161	5	0-43	
Trichloroethene	106	112	63-159	47-175	6	0-34	
1,1,2-Trichloroethane	107	114	65-149	51-163	6	0-37	
Vinyl Chloride	105	110	45-177	23-199	5	0-36	

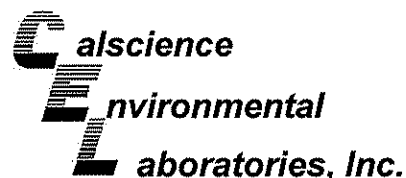
Total number of LCS compounds : 16

Total number of ME compounds : 0

Total number of ME compounds allowed : 1

LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2526
Preparation: N/A
Method: EPA TO-15

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
095-01-021-7,445	Air	GC/MS V	N/A	04/02/09	090402L01		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	123	122	60-156	44-172	1	0-40	
Carbon Tetrachloride	100	98	64-154	49-169	2	0-32	
1,2-Dibromoethane	121	122	54-144	39-159	1	0-36	
1,2-Dichlorobenzene	136	132	34-160	13-181	3	0-47	
1,2-Dichloroethane	106	104	69-153	55-167	2	0-30	
1,2-Dichloropropane	116	114	67-157	52-172	2	0-35	
1,4-Dichlorobenzene	128	127	36-156	16-176	1	0-47	
c-1,3-Dichloropropene	135	133	61-157	45-173	2	0-35	
Ethylbenzene	134	136	52-154	35-171	1	0-38	
o-Xylene	130	131	52-148	36-164	1	0-38	
p/m-Xylene	126	128	42-156	23-175	1	0-41	
Tetrachloroethene	117	119	56-152	40-168	1	0-40	
Toluene	116	117	56-146	41-161	1	0-43	
Trichloroethene	112	110	63-159	47-175	1	0-34	
1,1,2-Trichloroethane	115	112	65-149	51-163	3	0-37	
Vinyl Chloride	99	101	45-177	23-199	3	0-36	

Total number of LCS compounds : 16

Total number of ME compounds : 0

Total number of ME compounds allowed : 1

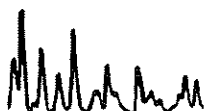
LCS ME CL validation result : Pass

RPD - Relative Percent Difference , CL - Control Limit



Work Order Number: 09-03-2526

<u>Qualifier</u>	<u>Definition</u>
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
I	Compound did not meet method-described identification guidelines. Identification was based on additional GC/MS characteristics.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.



Sandy Tat

From: Erik Appel [eappel@eticeng.com]
Sent: Monday, March 30, 2009 10:43 AM
To: Sandy Tat
Subject: Re: ExxonMobil 74121 (09-03-2526)

Sandy,

Please use the CoC. It has the correct designations.

Thanks,

--Erik

K. Erik Appel, PG
Senior Project Geologist
ETIC Engineering, Inc.
Office - 925-602-4710 ext. 21
Cell - 925-642-2545

>>> "Sandy Tat" <STat@calscience.com> 3/30/2009 10:26 AM >>>

Hi Erik,

Please verify the sample ID for VW9 (LC479), VW9(D537), & VW10(D684), because the sample ID on the COC doesn't match the sample ID on the summa cans.

<u>On the COC</u>	<u>On Summa Can</u>
-------------------	---------------------

VW9 (LC479)	VW12
-------------	------

VW9 (D537)	VW12
------------	------

VW10 (D684)	VW9
-------------	-----

There fore, which sample ID should Calscience use? Please advise. Please revise the COC if needed.

<<09-03-2526.PDF>>

Thanks,

Sandy Tat
Assistant Project Manager
Calscience Environmental
Laboratories, Inc.
7440 Lincoln Way
Garden Grove, CA 92841-1427
Tel.: 714-895-5494
Fax : 714-894-7501
stat@calscience.com

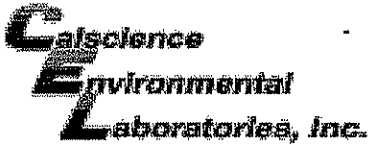
PRIVACY NOTICE:

LABORATORY CLIENT: ExxonMobil c/o ETIC Engineering				CLIENT PROJECT NAME / NUMBER: 74121, 10605 Foothill Boulevard, CA				P.O. NO.: 4510816445					
ADDRESS: 2285 Morello Avenue				PROJECT CONTACT: Erik Appel, ETIC Engineering				Project Number: TM4121.3.27					
CITY: Pleasant Hill, CA 94523				E-MAIL: see instructions				QUOTE NO.:					
TEL: 925-602-4710 x21		FAX: 925-602-4720						LAB USE ONLY: 032526					
TURNAROUND TIME <input type="checkbox"/> SAME DAY <input type="checkbox"/> 24 HR <input type="checkbox"/> 48HR <input type="checkbox"/> 72 HR <input checked="" type="checkbox"/> 5 DAYS <input type="checkbox"/> 10 DAYS								REQUESTED ANALYSIS					
SPECIAL REQUIREMENTS (ADDITIONAL COSTS MAY APPLY) <input type="checkbox"/> RWQCB REPORTING <input type="checkbox"/> ARCHIVE SAMPLES UNTIL ___/___/___													
SPECIAL INSTRUCTIONS edf file required, Global ID #T0600120383 email report to eappel@eticeng.com & eticlabreports@eticeng.com													
LAB USE ONLY	SAMPLE ID	LOCATION/ DESCRIPTION	SAMPLING		Matrix	#Cont							
			DATE	TIME									
8	D455	VW6	03/27/09	--	Vapor	1	DO NOT ANALYZE						
9	D627	VW7	03/27/09	--	Vapor	1	DO NOT ANALYZE						
10	D671	VW8	03/27/09	--	Vapor	1	DO NOT ANALYZE						
11	D537	VW9	03/27/09	--	Vapor	1	DO NOT ANALYZE						
12	D684	VW10	03/27/09	--	Vapor	1	DO NOT ANALYZE						
13	D510	VW11	03/27/09	--	Vapor	1	DO NOT ANALYZE						
14	D826	VW12	03/27/09	--	Vapor	1	DO NOT ANALYZE						
Relinquished by: (Signature)						Received by: (Signature)				Date: 3/27/09		Time: 1603	
Relinquished by: (Signature) to GSD 3-17-09 1730						Received by: (Signature)				Date:		Time:	
Relinquished by: (Signature)						Received by: (Signature)				Date: 3-28-09		Time: 9:20	

TK# 511550019
TK #511550017
#511525935

LABORATORY CLIENT: ExxonMobil c/o ETIC Engineering				CLIENT PROJECT NAME / NUMBER: 74121, 10605 Foothill Boulevard, CA				P.O. NO.: 4510816445										
ADDRESS: 2285 Morello Avenue				PROJECT CONTACT: Erik Appel, ETIC Engineering		Project Number: TM4121.3.27		QUOTE NO.:										
CITY: Pleasant Hill, CA 94523				SAMPLER(S): (SIGNATURE) 				LAB USE ONLY 032526										
TEL: 925-602-4710 x21	FAX: 925-602-4720	E-MAIL see instructions		REQUESTED ANALYSIS														
TURNAROUND TIME <input type="checkbox"/> SAME DAY <input type="checkbox"/> 24 HR <input type="checkbox"/> 48HR <input type="checkbox"/> 72 HR <input checked="" type="checkbox"/> 5 DAYS <input type="checkbox"/> 10 DAYS																		
SPECIAL REQUIREMENTS (ADDITIONAL COSTS MAY APPLY) <input type="checkbox"/> RWQCB REPORTING <input type="checkbox"/> ARCHIVE SAMPLES UNTIL ____ / ____ / ____																		
SPECIAL INSTRUCTIONS edf file required, Global ID #T0600120383 email report to eappel@eticeng.com & eticlabreports@eticeng.com * 7 OXYGENATES INCLUDE MTBE, TBA, TAME, ETBE, DIPE, EDB, AND 1,2-DCA Please use µg/m3 for TPHg, 7 Oxygenates, 1,1-DFA, and BTEX.				TPHg (EPA TO-3(M))	7 Oxygenates (EPA TO-15) *	1,1-DFA (TO-15)	Oxygen, Argon, Methane, Carbon dioxide (ASTM D-1946)	BTEX (TO-15)										
LAB USE ONLY	SAMPLE ID	LOCATION / DESCRIPTION	SAMPLING		Matrix	#Cont												
			DATE	TIME														
1	LC056	VW7	03/27/09	1259	Vapor	1	X	X	X	X	X							
2	LC112	VW8	03/27/09	1241	Vapor	1	X	X	X	X	X							
3	LC479	VW9	03/27/09	1200	Vapor	1	X	X	X	X	X							
4	LC335	VW10	03/27/09	1322	Vapor	1	X	X	X	X	X							
5	LC380	VW11	03/27/09	1343	Vapor	1	X	X	X	X	X							
6	LC178	VW12	03/27/09	1203	Vapor	1	X	X	X	X	X							
7	D467	VW9 DUP	03/27/09	1415	Vapor	1	X	X	X	X	X							
Relinquished by: (Signature) 				Received by: (Signature) 				Date: 3/23/09	Time: 1603									
Relinquished by: (Signature) to 680 327-09 1730				Received by: (Signature) 				Date:	Time:									
Relinquished by: (Signature) 				Received by: (Signature) 				Date: 3/28/09	Time: 9:20									

TK #511525935
TK #511550019
#511550017



WORK ORDER #: 09-03-2926

SAMPLE RECEIPT FORM

Cooler 0 of 0

CLIENT: ERIC

DATE: 3/28/09

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

Temperature _____ °C - 0.2°C (CF) = _____ °C Blank Sample

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

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

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

Ambient Temperature: Air Filter Metals Only PCBs Only Initial: JD

CUSTODY SEALS INTACT:

Cooler _____ No (Not Intact) Not Present N/A Initial: JD

Sample _____ No (Not Intact) Not Present Initial: JD

SAMPLE CONDITION:

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

CONTAINER TYPE:

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

Water: VOA VOAh VOAna₂ 125AGB 125AGBh 125AGBp 1AGB 1AGBna₂ 1AGBs

500AGB 500AGJ 500AGJs 250AGB 250CGB 250CGBs 1PB 500PB 500PBna

250PB 250PBn 125PB 125PBzanna 100PBsterile 100PBna₂ _____ _____ _____

Air: Tedlar® Summa® _____ **Sludge/Other:** _____ **Checked/Labeled by:** JD

Container: C: Clear A: Amber P: Plastic G: Glass J: Jar (Wide-mouth) B: Bottle (Narrow-mouth) **Reviewed by:** JD

Preservative: h: HCL n: HNO3 na₂: Na₂S₂O₃ Na: NaOH p: H₃PO₄ s: H₂SO₄ zanna: ZnAc₂+NaOH **Scanned by:** JD

SAMPLE ANOMALY FORM

SAMPLES - CONTAINERS & LABELS:

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

Comments:

(-3) Labeled as VW12,
 date & time matched.
 (-11) Labeled as VW12,
 date matched.
 (-12) Labeled as VW9,
 date matched.

 labeling according to
 canister ID.

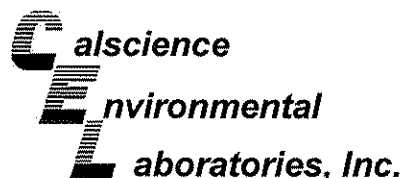
HEADSPACE – Containers with Bubble > 6mm or ¼ inch:

Sample #	Container ID(s)	# of Vials Received	Sample #	Container ID(s)	# of Vials Received	Sample #	Container ID(s)	# of RSK or CO ₂ or DO Received

Comments: _____

*Transferred at Client's request.

Initial / Date *JD* 3-28-09



April 28, 2009

Erik Appel
ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Subject: **Calscience Work Order No.: 09-04-2318**
Client Reference: **ExxonMobil 74121, 10605 Foothill Boulevard,
CA**

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 4/25/2009 and analyzed in accordance with the attached chain-of-custody.

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

Note that the Chain-of-Custody Record and Sample Receipt Form are integral parts of this report.

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

Sincerely,

A handwritten signature in cursive script, appearing to read "Cecile deGuia".

Calscience Environmental
Laboratories, Inc.
Cecile deGuia
Project Manager

A handwritten signature in cursive script, appearing to read "M. deGuia".

Analytical Report



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

Date Received: 04/25/09
 Work Order No: 09-04-2318
 Preparation: N/A
 Method: ASTM D-1946
 Units: %v

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 1

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW2	09-04-2318-1-A	04/23/09 12:54	Air	GC 34	N/A	04/25/09 12:48	090425L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.770	1.54		Oxygen + Argon	8.05	0.770	1.54	
Carbon Dioxide	6.55	0.770	1.54						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW2 DUP	09-04-2318-2-A	04/23/09 14:17	Air	GC 34	N/A	04/25/09 13:23	090425L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.780	1.56		Oxygen + Argon	7.88	0.780	1.56	
Carbon Dioxide	6.05	0.780	1.56						

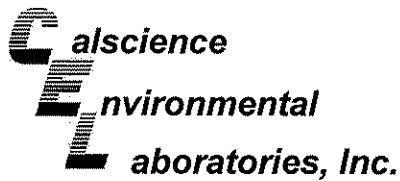
Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW5	09-04-2318-3-A	04/23/09 13:40	Air	GC 34	N/A	04/25/09 13:56	090425L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.710	1.42		Oxygen + Argon	2.57	0.710	1.42	
Carbon Dioxide	9.84	0.710	1.42						

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	099-03-002-778	N/A	Air	GC 34	N/A	04/25/09 08:46	090425L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Methane	ND	0.500	1		Oxygen + Argon	ND	0.500	1	
Carbon Dioxide	ND	0.500	1		Nitrogen	ND	0.500	1	
Carbon Monoxide	ND	0.500	1						

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 04/25/09
Work Order No: 09-04-2318
Preparation: N/A
Method: EPA TO-3M

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 1

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW2	09-04-2318-1-A	04/23/09 12:54	Air	GC 39	N/A	04/25/09 10:44	090425L01

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	210000	8800	1.54		ug/m3

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW2 DUP	09-04-2318-2-A	04/23/09 14:17	Air	GC 39	N/A	04/25/09 10:54	090425L01

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	220000	8900	1.56		ug/m3

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW5	09-04-2318-3-A	04/23/09 13:40	Air	GC 39	N/A	04/25/09 11:03	090425L01

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	9800	8100	1.42		ug/m3

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	098-01-005-1,773	N/A	Air	GC 39	N/A	04/25/09 08:20	090425L01

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	5700	1		ug/m3

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

Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 04/25/09
Work Order No: 09-04-2318
Preparation: N/A
Method: EPA TO-15
Units: ug/m3

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW2	09-04-2318-1-A	04/23/09 12:54	Air	GC/MS YY	N/A	04/25/09 18:13	090425L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	6.1	3.85		Methyl-t-Butyl Ether (MTBE)	ND	28	3.85	
Diisopropyl Ether (DIPE)	ND	32	3.85		Xylenes (total)	ND	33	3.85	
1,2-Dibromoethane	ND	15	3.85		Tert-Amyl-Methyl Ether (TAME)	ND	32	3.85	
1,2-Dichloroethane	ND	7.8	3.85		Tert-Butyl Alcohol (TBA)	ND	23	3.85	
Ethyl-t-Butyl Ether (ETBE)	ND	32	3.85		Toluene	ND	7.3	3.85	
Ethylbenzene	ND	8.4	3.85		1,1-Difluoroethane	ND	21	3.85	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	88	57-129			1,2-Dichloroethane-d4	95	47-137		
Toluene-d8	45	78-156		2					

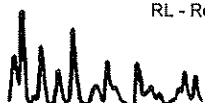
Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW2 DUP	09-04-2318-2-A	04/23/09 14:17	Air	GC/MS YY	N/A	04/25/09 19:47	090425L01

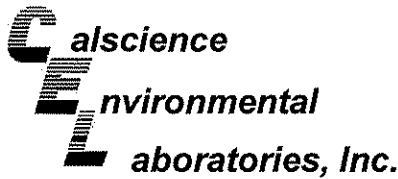
Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	6.2	3.9		Methyl-t-Butyl Ether (MTBE)	ND	28	3.9	
Diisopropyl Ether (DIPE)	ND	33	3.9		Xylenes (total)	ND	34	3.9	
1,2-Dibromoethane	ND	15	3.9		Tert-Amyl-Methyl Ether (TAME)	ND	33	3.9	
1,2-Dichloroethane	ND	7.9	3.9		Tert-Butyl Alcohol (TBA)	ND	24	3.9	
Ethyl-t-Butyl Ether (ETBE)	ND	33	3.9		Toluene	ND	7.3	3.9	
Ethylbenzene	ND	8.5	3.9		1,1-Difluoroethane	29	21	3.9	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	93	57-129			1,2-Dichloroethane-d4	97	47-137		
Toluene-d8	46	78-156		2					

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
VW5	09-04-2318-3-A	04/23/09 13:40	Air	GC/MS YY	N/A	04/25/09 15:55	090425L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	2.3	1.42		Methyl-t-Butyl Ether (MTBE)	ND	10	1.42	
Diisopropyl Ether (DIPE)	ND	12	1.42		Xylenes (total)	ND	12	1.42	
1,2-Dibromoethane	ND	5.5	1.42		Tert-Amyl-Methyl Ether (TAME)	ND	12	1.42	
1,2-Dichloroethane	ND	2.9	1.42		Tert-Butyl Alcohol (TBA)	ND	8.6	1.42	
Ethyl-t-Butyl Ether (ETBE)	ND	12	1.42		Toluene	ND	2.7	1.42	
Ethylbenzene	ND	3.1	1.42		1,1-Difluoroethane	ND	7.7	1.42	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
1,4-Bromofluorobenzene	88	57-129			1,2-Dichloroethane-d4	88	47-137		
Toluene-d8	94	78-156							

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





Analytical Report



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

Date Received: 04/25/09
 Work Order No: 09-04-2318
 Preparation: N/A
 Method: EPA TO-15
 Units: ug/m3

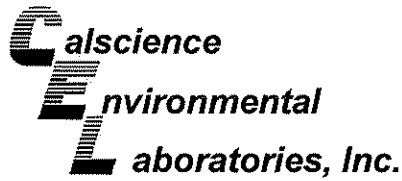
Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 2 of 2

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	095-01-021-7,558	N/A	Air	GC/MS YY	N/A	04/25/09 12:05	090425L01

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	1.6	1		Methyl-t-Butyl Ether (MTBE)	ND	7.2	1	
Diisopropyl Ether (DIPE)	ND	8.4	1		Xylenes (total)	ND	8.7	1	
1,2-Dibromoethane	ND	3.8	1		Tert-Amyl-Methyl Ether (TAME)	ND	8.4	1	
1,2-Dichloroethane	ND	2.0	1		Tert-Butyl Alcohol (TBA)	ND	6.1	1	
Ethyl-t-Butyl Ether (ETBE)	ND	8.4	1		Toluene	ND	1.9	1	
Ethylbenzene	ND	2.2	1		1,1-Difluoroethane	ND	5.4	1	
<u>Surrogates:</u>	<u>REC (%)</u>	<u>Control Limits</u>		<u>Qual</u>	<u>Surrogates:</u>	<u>REC (%)</u>	<u>Control Limits</u>		<u>Qual</u>
1,4-Bromofluorobenzene	92	57-129			1,2-Dichloroethane-d4	96	47-137		
Toluene-d8	97	78-156							

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



Quality Control - Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

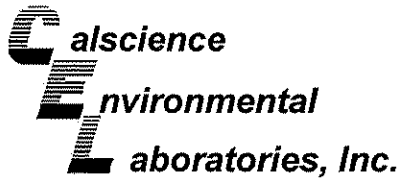
Date Received: 04/25/09
 Work Order No: 09-04-2318
 Preparation: N/A
 Method: EPA TO-3M

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared:	Date Analyzed:	Duplicate Batch Number
09-04-2317-2	Air	GC 39	N/A	04/25/09	090425D01

Parameter	Sample Conc.	DUP Conc	RPD	RPD CL	Qualifiers
TPH as Gasoline	1100000	1200000	1	0-20	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

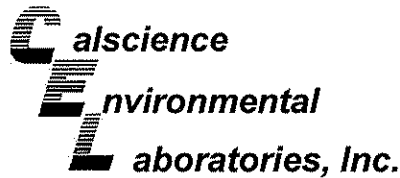
Date Received: N/A
 Work Order No: 09-04-2318
 Preparation: N/A
 Method: ASTM D-1946

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-03-002-778	Air	GC 34	N/A	04/25/09	090425L01

Parameter	LCS Conc	LCSD Conc	RPD	RPD CL	Qualifiers
Carbon Dioxide	4.876	4.717	3	0-30	
Oxygen + Argon	20.81	20.54	1	0-30	
Nitrogen	77.08	76.32	1	0-30	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-04-2318
Preparation: N/A
Method: EPA TO-15

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number		
095-01-021-7,558	Air	GC/MS YY	N/A	04/26/09	090425L01		
Parameter	LCS %REC	LCSD %REC	%REC CL	ME CL	RPD	RPD CL	Qualifiers
Benzene	106	104	60-156	44-172	2	0-40	
Carbon Tetrachloride	103	101	64-154	49-169	2	0-32	
1,2-Dibromoethane	105	104	54-144	39-159	1	0-36	
1,2-Dichlorobenzene	111	110	34-160	13-181	1	0-47	
1,2-Dichloroethane	95	94	69-153	55-167	1	0-30	
1,2-Dichloropropane	104	101	67-157	52-172	3	0-35	
1,4-Dichlorobenzene	110	108	36-156	16-176	2	0-47	
c-1,3-Dichloropropene	124	118	61-157	45-173	5	0-35	
Ethylbenzene	109	109	52-154	35-171	0	0-38	
o-Xylene	108	107	52-148	36-164	1	0-38	
p/m-Xylene	100	99	42-156	23-175	0	0-41	
Tetrachloroethene	106	105	56-152	40-168	0	0-40	
Toluene	102	101	56-146	41-161	0	0-43	
Trichloroethene	108	105	63-159	47-175	3	0-34	
1,1,2-Trichloroethane	108	103	65-149	51-163	5	0-37	
Vinyl Chloride	105	103	45-177	23-199	2	0-36	

Total number of LCS compounds : 16

Total number of ME compounds : 0

Total number of ME compounds allowed : 1

LCS ME CL validation result : Pass

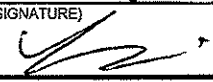
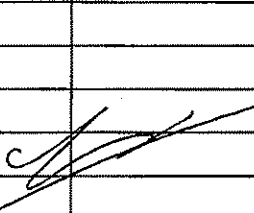
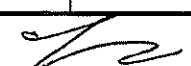

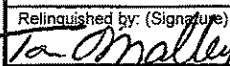
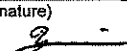
RPD - Relative Percent Difference , CL - Control Limit



Work Order Number: 09-04-2318

<u>Qualifier</u>	<u>Definition</u>
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
I	Compound did not meet method-described identification guidelines. Identification was based on additional GC/MS characteristics.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.

A handwritten signature in black ink, appearing to be a stylized name.

LABORATORY CLIENT: ExxonMobil c/o ETIC Engineering				CLIENT PROJECT NAME/NUMBER: 74121, 10605 Foothill Boulevard, CA				P.O. NO.: 4510816445							
ADDRESS: 2285 Morello Avenue				PROJECT CONTACT: Erik Appel, ETIC Engineering				Project Number: TM4121.3.12							
CITY: Pleasant Hill, CA 94523				SAMPLER(S): (SIGNATURE) 				QUOTE NO.:							
TEL: 925-602-4710 x21		FAX: 925-602-4720		E-MAIL see instructions		LAB USE ONLY 0 4 2 3 1 8									
TURNAROUND TIME <input type="checkbox"/> SAME DAY <input type="checkbox"/> 24 HR <input checked="" type="checkbox"/> 48HR <input type="checkbox"/> 72 HR <input type="checkbox"/> 5 DAYS <input type="checkbox"/> 10 DAYS				REQUESTED ANALYSIS											
SPECIAL REQUIREMENTS (ADDITIONAL COSTS MAY APPLY) <input type="checkbox"/> RWQCB REPORTING <input type="checkbox"/> ARCHIVE SAMPLES UNTIL ___/___/___				TPHg (EPA TO-3(M))	7 Oxygenates (EPA TO-15) *	1,1-DFA (TO-15)	Oxygen, Argon, Methane, Carbon dioxide (ASTM D-1946)	BTEX (TO-15)							
SPECIAL INSTRUCTIONS edf file required, Global ID #T0600120383 email report to eappel@eticeng.com & eticlabreports@eticeng.com * 7 OXYGENATES INCLUDE MTBE, TBA, TAME, ETBE, DIPE, EDB, AND 1,2-DCA Please use µg/m3 for TPHg, 7 Oxygenates, 1,1-DFA, and BTEX.															
LAB USE ONLY	SAMPLE ID	LOCATION/ DESCRIPTION	SAMPLING		Matrix	#Cont	TPHg (EPA TO-3(M))	7 Oxygenates (EPA TO-15) *	1,1-DFA (TO-15)	Oxygen, Argon, Methane, Carbon dioxide (ASTM D-1946)	BTEX (TO-15)				
			DATE	TIME											
<input checked="" type="checkbox"/>	LC019	VW2	04/23/09	1254	Vapor	1	X	X	X	X	X				
<input checked="" type="checkbox"/>	LC108	VW2 DUP	04/23/09	1417	Vapor	1	X	X	X	X	X				
<input checked="" type="checkbox"/>	LC083	VW5	04/23/09	1340	Vapor	1	X	X	X	X	X				
															
Relinquished by: (Signature) 						Received by: (Signature) 						Date: 4/24/09		Time: 1440	
Relinquished by: (Signature) 						Received by: (Signature)						Date:		Time:	
Relinquished by: (Signature) 450511732701						Received by: (Signature)  CEL						Date: 4/25/09		Time: 0825	

SAMPLE RECEIPT FORM

Box 1 of 1
Cooler

CLIENT: Eyxon

DATE: 04/25/09

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

Temperature _____ °C - 0.2°C (CF) = _____ °C Blank Sample

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

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

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

Ambient Temperature: Air Filter Metals Only PCBs Only Initial: YL

CUSTODY SEALS INTACT:

Cooler _____ No (Not Intact) Not Present N/A Initial: YL

Sample _____ No (Not Intact) Not Present Initial: YL

SAMPLE CONDITION:

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

CONTAINER TYPE:

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

Water: VOA VOA_h VOA_{na2} 125AGB 125AGB_h 125AGB_p 1AGB 1AGB_{na2} 1AGB_s

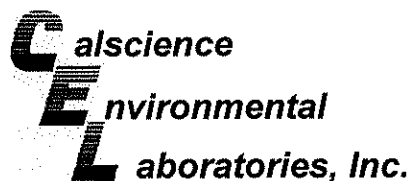
500AGB 500AGJ 500AGJ_s 250AGB 250CGB 250CGB_s 1PB 500PB 500PB_{na}

250PB 250PB_n 125PB 125PB_{z_{na}} 100PB 100PB_{na2} _____ _____ _____

Air: Tedlar® Summa® _____ **Other:** _____ **Checked/Labeled by:** [Signature]

Container: C: Clear A: Amber P: Plastic G: Glass J: Jar (Wide-mouth) B: Bottle (Narrow-mouth) **Reviewed by:** [Signature]

Preservative: h: HCL n: HNO₃ na₂: Na₂S₂O₃ Na: NaOH p: H₃PO₄ s: H₂SO₄ z_{na}: ZnAc₂+NaOH f: Field-filtered **Scanned by:** [Signature]



April 01, 2009

Erik Appel
ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Subject: **Calscience Work Order No.: 09-03-2300**
Client Reference: **ExxonMobil 74121, 10605 Foothill Boulevard,
CA**

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 3/26/2009 and analyzed in accordance with the attached chain-of-custody.

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

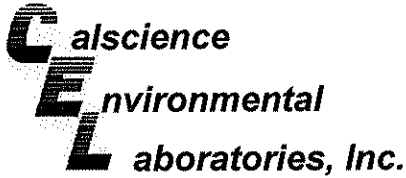
Note that the Chain-of-Custody Record and Sample Receipt Form are integral parts of this report.

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

Sincerely,

A handwritten signature in black ink, appearing to read "Cecile deGuia". The signature is written in a cursive, flowing style.

Calscience Environmental
Laboratories, Inc.
Cecile deGuia
Project Manager



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2300
Preparation: EPA 3050B
Method: EPA 6010B

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 1

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Drum 1	09-03-2300-1-A	03/23/09 12:40	Solid	ICP 5300	03/26/09	03/27/09 21:30	090326L02

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

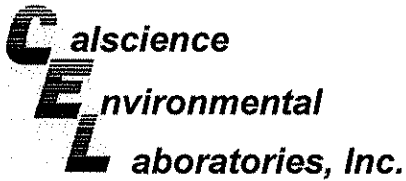
Parameter	Result	RL	MDL	DF	Qual	Units
Lead	1.55	0.500	0.0527	1		mg/kg

Method Blank		097-01-002-12,147	N/A	Solid	ICP 5300	03/26/09	03/27/09 12:11	090326L02
--------------	--	-------------------	-----	-------	----------	----------	-------------------	-----------

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
Lead	ND	0.500	0.0527	1		mg/kg

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2300
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 1

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Drum 1	09-03-2300-1-A	03/23/09 12:40	Solid	GC 24	03/31/09	04/01/09 03:16	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

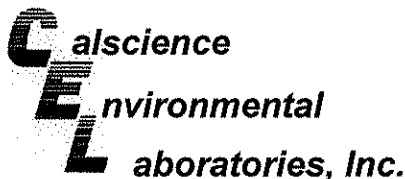
Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	78	42-126				

Method Blank	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	099-12-279-2,754	N/A	Solid	GC 24	03/31/09	03/31/09 22:49	090331B03

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Units
TPH as Gasoline	ND	0.50	0.42	1		mg/kg
Surrogates:	REC (%)	Control Limits			Qual	
1,4-Bromofluorobenzene - FID	77	42-126				

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



Analytical Report



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: 03/26/09
Work Order No: 09-03-2300
Preparation: EPA 5030B
Method: EPA 8021B
Units: mg/kg

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Page 1 of 1

Client Sample Number	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Drum 1	09-03-2300-1-A	03/23/09 12:40	Solid	GC 8	03/27/09	03/28/09 03:13	090327B02

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

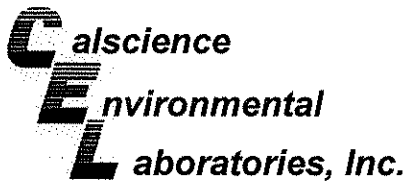
Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.0012	1		Ethylbenzene	ND	0.0050	0.0011	1	
Toluene	ND	0.0050	0.0012	1		Xylenes (total)	ND	0.010	0.0023	1	
Surrogates:	REC (%)	Control Limits			Qual						
1,4-Bromofluorobenzene	101	51-129									

Method Blank	Lab Sample Number	Date/Time Collected	Matrix	Instrument	Date Prepared	Date/Time Analyzed	QC Batch ID
Method Blank	099-12-657-275	N/A	Solid	GC 8	03/27/09	03/28/09 00:57	090327B02

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.0050	0.0012	1		Ethylbenzene	ND	0.0050	0.0011	1	
Toluene	ND	0.0050	0.0012	1		Xylenes (total)	ND	0.010	0.0023	1	
Surrogates:	REC (%)	Control Limits			Qual						
1,4-Bromofluorobenzene	84	51-129									

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



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

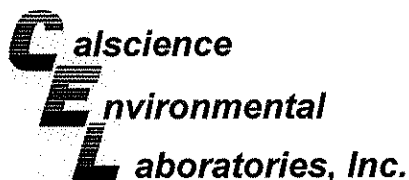
Date Received: 03/26/09
 Work Order No: 09-03-2300
 Preparation: EPA 3050B
 Method: EPA 6010B

Project ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-03-2116-1	Solid	ICP 5300	03/26/09	03/27/09	090326S02

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Lead	110	84	75-125	20	0-20	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

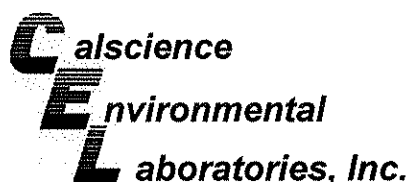
Date Received: 03/26/09
Work Order No: 09-03-2300
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
09-03-2665-1	Solid	GC 24	03/31/09	04/01/09	090331S03

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	73	72	48-114	2	0-23	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - Spike/Spike Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

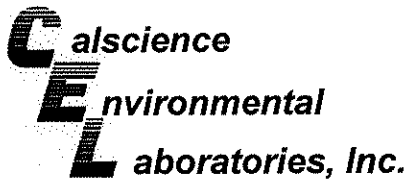
Date Received: 03/26/09
Work Order No: 09-03-2300
Preparation: EPA 5030B
Method: EPA 8021B

Project ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
Drum 1	Solid	GC 8	03/27/09	03/28/09	090327S02

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	100	98	58-118	2	0-24	
Toluene	93	90	61-109	3	0-20	
Ethylbenzene	101	97	59-113	4	0-20	
p/m-Xylene	105	98	55-115	7	0-20	
o-Xylene	99	94	56-110	5	0-20	
Methyl-t-Butyl Ether (MTBE)	105	98	65-113	7	0-9	

RPD - Relative Percent Difference, CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

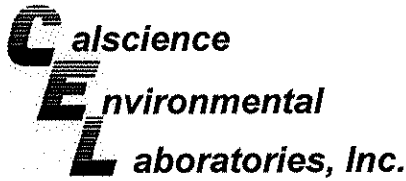
Date Received: N/A
 Work Order No: 09-03-2300
 Preparation: EPA 3050B
 Method: EPA 6010B

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
097-01-002-12,147	Solid	ICP 5300	03/26/09	03/26/09	090326L02

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Lead	100	99	80-120	0	0-20	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
 2285 Morello Avenue
 Pleasant Hill, CA 94523-1850

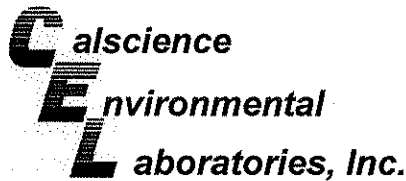
Date Received: N/A
 Work Order No: 09-03-2300
 Preparation: EPA 5030B
 Method: EPA 8015B (M)

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-2,754	Solid	GC 24	03/31/09	04/01/09	090331B03

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	99	100	70-124	1	0-18	

RPD - Relative Percent Difference , CL - Control Limit



Quality Control - LCS/LCS Duplicate



ETIC Engineering, Inc.
2285 Morello Avenue
Pleasant Hill, CA 94523-1850

Date Received: N/A
Work Order No: 09-03-2300
Preparation: EPA 5030B
Method: EPA 8021B

Project: ExxonMobil 74121, 10605 Foothill Boulevard, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-657-275	Solid	GC 8	03/27/09	03/28/09	090327B02

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	101	94	70-118	7	0-7	
Toluene	93	89	71-107	5	0-8	
Ethylbenzene	104	99	66-120	5	0-7	
p/m-Xylene	107	103	66-120	4	0-8	
o-Xylene	101	97	66-114	4	0-9	
Methyl-t-Butyl Ether (MTBE)	106	103	70-112	2	0-12	

RPD - Relative Percent Difference, CL - Control Limit



Work Order Number: 09-03-2300

<u>Qualifier</u>	<u>Definition</u>
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
I	Compound did not meet method-described identification guidelines. Identification was based on additional GC/MS characteristics.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.

SAMPLE RECEIPT FORM

Cooler 1 of 1

CLIENT: ETIC

DATE: 03/26/09

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

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

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

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

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

Ambient Temperature: Air Filter Metals Only PCBs Only Initial: AP

CUSTODY SEALS INTACT:

Cooler _____ No (Not Intact) Not Present N/A Initial: JP

Sample _____ No (Not Intact) Not Present Initial: PS

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

CONTAINER TYPE:

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

Water: VOA VOAh VOAna₂ 125AGB 125AGBh 125AGBpo₄ 1AGB 1AGBna₂

1AGBs 500AGB 500AGBs 250CGB 250CGBs 1PB 500PB 500PBna 250PB

250PBn 125PB 125PBzanna 100PBsterile 100PBna₂ _____ _____ _____

Air: Tedlar® Summa® _____ Sludge/Other: _____ Checked/Labeled by: PS

Container: C:Clear A:Amber P:Poly/Plastic G:Glass J:Jar B:Bottle Reviewed by: WJC

Preservative: h:HCL n:HNO₃ na₂:Na₂S₂O₃ na:NaOH p:H₃PO₄ s:H₂SO₄ znna:ZnAc₂+NaOH Scanned by: PS