

EXXON COMPANY, U.S.A.

EXXONMOBIL • REFINING AND SUPPLY
Safety, Health and Environment
Environmental Engineering

P.O. Box 4032 • Concord, CA 94524-4032

DARIN L. ROUSE
Senior Engineer

(925) 246-8768
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darin.l.rouse@exxon.com

May 17, 2000

ENVIRONMENTAL
PROTECTION
00 MAY 23 PM 3:39

Mr. Scott Seery
Alameda County Health Care Services Agency
Department of Environmental Health
1131 Harbor Bay Parkway, Room 250
Alameda, California 94502-6577

RE: Exxon RAS #7-0235/2225 Telegraph Avenue, Oakland, California.

Dear Mr. Seery:

Attached for your review and comment is a letter report entitled *Quarterly Groundwater Monitoring Report, Second Quarter 2000*, dated May 8, 2000, for the above referenced site. The report was prepared by Environmental Resolutions, Inc. (ERI) of Novato, California, and details the results of quarterly groundwater monitoring and sampling activities at the subject site.

If you have any questions or comments, please contact me at (925) 246-8768.

Sincerely,


Darin L. Rouse
Senior Engineer

Attachment: ERI's Quarterly Groundwater Monitoring Report, Second Quarter 2000, dated May 8, 2000.

cc: w/attachment
Mr. Stephen Hill - California Regional Water Quality Control Board-San Francisco Bay Region

w/o attachment
Mr. James F. Chappell - Environmental Resolutions, Inc.

EXXON COMPANY, U.S.A.

ENVIRONMENTAL
PROTECTION

00 MAR 15 PM 3:55

P.O. BOX 4032 • CONCORD, CA 94524-4032
MARKETING DEPARTMENT • ENVIRONMENTAL ENGINEERING

DARIN L. ROUSE
SENIOR ENGINEER

(925) 246-8768
(925) 246-8798 FAX

March 9, 2000

Mr. Scott Seery
Alameda County Health Care Services Agency
Department of Environmental Health
1131 Harbor Bay Parkway, Room 250
Alameda, California 94502-6577

RE: Exxon RAS #7-0235/2225 Telegraph Avenue, Oakland, California.

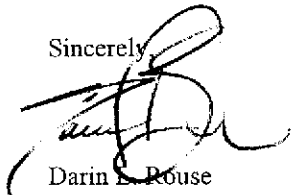
Dear Mr. Seery:

Attached for your review and comment is a letter report entitled *Quarterly Groundwater Monitoring Report, First Quarter 2000*, dated February 25, 2000, for the above referenced site. The report was prepared by Environmental Resolutions, Inc. (ERI) of Novato, California, and details the results of quarterly groundwater monitoring and sampling activities at the subject site.

ExxonMobil is in the process of evaluating the possibility of using the former Texaco remedial system and awaiting approval from Alameda County Health Care Services Agency to proceed with an off-site evaluation.

If you have any questions or comments, please contact me at (925) 246-8768.

Sincerely,

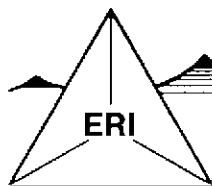


Darin L. Rouse
Senior Engineer

Attachment: ERI's Quarterly Groundwater Monitoring Report, First Quarter 2000, dated February 25, 2000.

cc: w/attachment
Mr. Stephen Hill - California Regional Water Quality Control Board-San Francisco Bay Region

w/o attachment
Mr. James F. Chappell - Environmental Resolutions, Inc.



ENVIRONMENTAL RESOLUTIONS, INC.

May 8, 2000
ERI 222913.R10

Mr. Darin L. Rouse
ExxonMobil Refining and Supply
P.O. Box 4032
Concord, California 94524-4032

Subject: Quarterly Groundwater Monitoring Report, Second Quarter 2000, Exxon Service Station 7-0235, 2225 Telegraph Avenue, Oakland, California.

Mr. Rouse:

At the request of ExxonMobil Refining and Supply (formerly known as Exxon Company, U.S.A.) (ExxonMobil), Environmental Resolutions, Inc. (ERI) is reporting the results of the second quarter 2000 groundwater monitoring and sampling event. The location of the site is shown on the Site Vicinity Map (Plate 1). The purpose of quarterly monitoring is to evaluate concentrations of dissolved hydrocarbons in groundwater and groundwater flow direction and gradient. Blaine Tech Services, Inc. (Blaine Tech) performed the site field activities at the request of ExxonMobil.

GROUNDWATER MONITORING AND SAMPLING

On April 3, 2000, Blaine Tech measured depth to water (DTW) and collected groundwater samples from select wells for laboratory analyses. Work was performed in accordance with Blaine Tech's groundwater sampling protocol provided in Attachment A. Field data sheets are presented in Attachment B.

Calculated groundwater gradient and flow direction are presented on Plate 2. Historical and recent monitoring data are summarized in Table 1.

LABORATORY ANALYSES AND RESULTS

Groundwater samples were submitted to Southern Petroleum Laboratories, Inc. (SPL), a California state-certified laboratory, under Chain of Custody protocol. The samples were analyzed for benzene, toluene, ethylbenzene, and total xylenes (BTEX), methyl tertiary butyl ether (MTBE), and total purgeable petroleum hydrocarbons as gasoline (TPPHg) using the methods listed in the notes in Table 1. The laboratory analysis report and Chain of Custody record are provided in Attachment C. Cumulative results of laboratory analyses of groundwater samples are summarized in Table 1. The results of analyses of groundwater samples collected during the recent sampling event are shown on Plate 2.

LIMITATIONS

This report was prepared in accordance with generally accepted standards of environmental practice in California at the time this investigation was performed. This report has been prepared for ExxonMobil, and any reliance on this report by third parties shall be at such party's sole risk.

ERI recommends forwarding copies of this report to:

Mr. Scott Seery
 Alameda County Health Care Services Agency
 Department of Environmental Health
 1131 Harbor Bay Parkway, Room 250
 Alameda, California 94502-6577

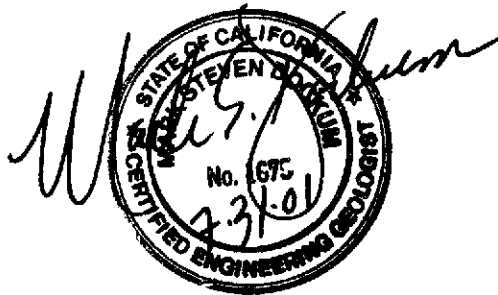
Mr. Stephen Hill
 California Regional Water Quality Control Board
 San Francisco Bay Region
 1515 Clay Street, Suite 1400
 Oakland, California 94612

If you have any questions or comments regarding this report, please call Mr. James F. Chappell at (415) 382-4323.

Sincerely,
 Environmental Resolutions, Inc.

James F. Chappell
 James F. Chappell
 Senior Staff Geologist

Mark S. Dockum
 Mark S. Dockum
 R.G. 4412
 C.E.G. 1675



- Attachments: Table 1: Cumulative Groundwater Monitoring and Sampling Data
- Plate 1: Site Vicinity Map
- Plate 2: Generalized Site Plan
- Attachment A: Groundwater Sampling Protocol
- Attachment B: Field Data Sheets
- Attachment C: Laboratory Analysis Report and Chain of Custody Record

TABLE 1
 CUMULATIVE GROUNDWATER MONITORING AND SAMPLING DATA
 Exxon Service Station 7-0235
 2225 Telegraph Avenue
 Oakland, California
 (Page 1 of 4)

Well ID # (TOC)	Sampling Date	SUBJ <.....feet.....>	DTW	Elev.	TPPHg <.....ug/L.....>	MTBE	B	T	E	X	
MW6B (17.48)	11/26/96	NLPH	12.26	5.22	<50	<30	<0.5	<0.5	<0.5	<0.5	
	2/27/97	NLPH	11.73	5.75	<50	<30	<0.5	<0.5	<0.5	0.80	
	5/21/97	NLPH	12.70	4.78	<50	<30	<0.5	<0.5	<0.5	<0.5	
	8/18/97	NLPH	12.89	4.59	380	<30	4.3	<0.5	1.2	1.5	
	3/13/98	NLPH	11.15	6.33	360	<6.2	93	4.9	4.1	12	
	4/20/98	NLPH	11.49	5.99	110	5.5	19	1.3	1.5	3.9	
	(21.37)	7/21/98	NLPH	12.18	9.19	<50	8.7	0.84	0.59	<0.5	<0.5
	10/6/98	NLPH	12.70	8.67	190	6.0	2.4	0.56	0.51	1.2	
	1/11/99	NLPH	12.48	8.89	50	3.9	1.2	<0.5	<0.5	0.95	
	4/8/99	NLPH	11.52	9.85	85	14.0	4.4	<0.5	<0.5	<0.5	
	7/19/99	NLPH	11.39	9.98	<50	<2.50	<0.5	<0.5	<0.5	<0.5	
	7/27/99	NLPH	12.71	8.66	---	---	---	---	---	---	
	10/25/99	NLPH	12.49	8.88	260	<2	2.3	<0.5	<0.5	<0.5	
	1/27/00	NLPH	11.80	9.57	770	13	210	4.8	4.9	13	
4/3/00	NLPH	11.61	9.76	670	3.4	110	6.6	3.8	9.45		
MW6E (17.63)	11/26/96	NLPH	12.94	4.69	<50	<30	1.1	<0.5	<0.5	<0.5	
	2/27/97	NLPH	12.28	5.35	<50	<30	<0.5	<0.5	<0.5	<0.5	
	5/21/97	NLPH	13.60	4.03	160	<5	10	1.4	5.5	4.8	
	8/18/97	NLPH	13.75	3.88	66	<30	<0.5	<0.5	<0.5	<0.5	
	3/13/98	NLPH	11.36	6.27	<50	<2.5	<0.5	<0.5	<0.5	<0.5	
	4/20/98	NLPH	11.88	5.75	<50	<2.5	<0.5	<0.5	<0.5	<0.5	
	(21.58)	7/21/98	NLPH	13.10	8.48	1,200	<10	81	3.1	28	77
	10/6/98	NLPH	13.55	8.03	<50	6.6	1.4	0.51	<0.5	0.97	
	1/11/99	NLPH	13.40	8.18	<50	5.1	<0.5	<0.5	<0.5	<0.5	
	4/8/99	NLPH	12.04	9.54	<50	4.7	<0.5	<0.5	<0.5	<0.5	
	7/19/99	NLPH	11.59	9.99	---	---	---	---	---	---	
	7/27/99	NLPH	13.65	7.93	---	---	---	---	---	---	
	10/25/99	NLPH	13.52	8.06	<50	2.5	<0.5	<0.5	<0.5	<0.5	
	1/27/00	NLPH	11.71	9.87	<50	2.3	<0.5	<0.5	<0.5	<0.5	
4/3/00	NLPH	12.11	9.47	<50	<2	0.51	<0.5	<0.5	<0.5		
MW6F (18.58)	11/26/96	NLPH	13.29	5.29	<50	<30	<0.5	<0.5	<0.5	<0.5	
	2/27/97	---	---	---	---	---	---	---	---	---	
	5/21/97	NLPH	14.18	4.40	---	---	---	---	---	---	
	8/18/97	NLPH	14.69	3.89	---	---	---	---	---	---	
	3/13/98	NLPH	10.93	7.65	<50	<2.5	<0.5	<0.5	<0.5	<0.5	
	4/20/98	NLPH	11.77	6.81	---	---	---	---	---	---	
	(22.51)	7/21/98	NLPH	13.62	8.89	---	---	---	---	---	
10/6/98	NLPH	13.52	8.99	---	---	---	---	---	---		

TABLE 1
 CUMULATIVE GROUNDWATER MONITORING AND SAMPLING DATA
 Exxon Service Station 7-0235
 2225 Telegraph Avenue
 Oakland, California
 (Page 2 of 4)

Well ID # (TOC)	Sampling Date	SUBJ <.....feet.....>	DTW	Elev.	TPPHg <.....ug/L.....>	MTBE	B	T	E	X
MW6F (cont.) (22.51)	1/11/99	NLPH	14.06	8.45	---	---	---	---	---	---
	4/8/99	NLPH	11.86	10.65	---	---	---	---	---	---
	7/19/99	---	---	---	---	---	---	---	---	---
	7/27/99	Well Inaccessible	---	---	---	---	---	---	---	---
	10/25/99	NLPH	12.63	9.88	---	---	---	---	---	---
	1/27/00	NLPH	12.23	10.28	---	---	---	---	---	---
	4/3/00	NLPH	12.11	10.4	---	---	---	---	---	---
MW6G (16.82)	11/26/96	NLPH	11.12	5.70	<50	<30	<0.5	<0.5	<0.5	<0.5
	2/27/97	---	---	---	---	---	---	---	---	---
	5/21/97	NLPH	11.76	5.06	---	---	---	---	---	---
	8/18/97	NLPH	12.23	4.59	---	---	---	---	---	---
	3/13/98	NLPH	9.13	7.69	<50	4.4	<0.5	<0.5	<0.5	<0.5
	4/20/98	NLPH	9.73	7.09	---	---	---	---	---	---
	7/21/98	NLPH	11.15	9.57	---	---	---	---	---	---
	10/6/98	NLPH	11.91	8.81	---	---	---	---	---	---
	1/11/99	NLPH	12.00	8.72	---	---	---	---	---	---
	4/8/99	NLPH	10.04	10.68	---	---	---	---	---	---
	7/19/99	---	---	---	---	---	---	---	---	---
	7/27/99	NLPH	11.75	8.97	---	---	---	---	---	---
	10/25/99	NLPH	11.76	8.96	---	---	---	---	---	---
	1/27/00	NLPH	11.46	9.26	---	---	---	---	---	---
4/3/00	NLPH	10.00	10.72	---	---	---	---	---	---	
MW6H (16.58)	11/26/96	NLPH	11.87	4.71	1,200	<30	320	110	22	85
	2/27/97	NLPH	11.58	5.00	1,800	<200	760	31	8.4	44
	5/21/97	NLPH	12.23	4.35	1,100	81	640	18	5.4	45
	8/18/97	NLPH	12.29	4.29	870	26	200	3.6	2.4	7.4
	3/13/98	NLPH	11.44	5.14	5,300	<125	1,900	720	100	470
	4/20/98	NLPH	11.58	5.00	6,000	2,700	1,500	600	91	440
	7/21/98	NLPH	11.97	8.5	2,200	1,600	740	44	15	63
	10/6/98	NLPH	12.23	8.24	5,400	3,000	1,900	<25	<25	76
	1/11/99	NLPH	12.17	8.30	2,600	4,300	1,200	<12	<12	20
	4/8/99	NLPH	11.56	8.91	13,000	13,000	3,400	1,300	260	1,200
	7/19/99	NLPH	11.71	8.76	<2,000	6,920/8,520*	732	<20	<20	<20
	7/27/99	NLPH	12.39	8.08	---	---	---	---	---	---
	10/25/99	NLPH	12.16	8.31	700	4,000	360	1.1	0.68	2
	1/27/00	NLPH	11.60	8.87	9,100	7,600	2,400	840	150	670
4/3/00	NLPH	11.62	8.85	12,000	8,800	2,800	1,100	230	1,020	

**TABLE 1
CUMULATIVE GROUNDWATER MONITORING AND SAMPLING DATA**

Exxon Service Station 7-0235
2225 Telegraph Avenue
Oakland, California
(Page 3 of 4)

Well ID # (TOC)	Sampling Date	SUBJ <.....>	DTW feet	Elev.	TPPHg <.....>	MTBE ug/L	B <.....>	T <.....>	E <.....>	X <.....>	
MW61 (16.26)	11/26/96	NLPH	12.45	3.81	<50	<30	<0.5	<0.5	<0.5	<0.5	
	2/27/97	NLPH	12.24	4.02	<50	<30	<0.5	<0.5	<0.5	<0.5	
	5/21/97	NLPH	12.82	3.44	<50	<30	<0.5	<0.5	<0.5	<0.5	
	8/18/97	NLPH	12.81	3.45	<50	<30	<0.5	<0.5	<0.5	<0.5	
	3/13/98	---	---	---	---	---	---	---	---	---	
	4/20/98	NLPH	12.14	4.12	<50	<2.5	<0.5	<0.5	<0.5	<0.5	
	(20.24)	7/21/98	NLPH	12.59	7.65	<50	<2.5	<0.5	<0.5	<0.5	<0.5
		10/6/98	NLPH	12.81	7.43	---	---	---	---	---	---
		1/11/99	NLPH	12.74	7.50	<50	<2.5	<0.5	<0.5	<0.5	<0.5
		4/8/99	NLPH	11.93	8.31	---	---	---	---	---	---
		7/19/99	NLPH	11.75	8.49	281	17.6	35.4	9.1	7.4	30.7
		7/27/99	NLPH	12.95	7.29	---	---	---	---	---	---
		10/25/99	NLPH	12.79	7.45	---	---	---	---	---	---
		1/27/00	NLPH	12.06	8.18	<50	<2	<0.5	<0.5	<0.5	<0.5
	4/3/00	NLPH	12.24	8.00	---	---	---	---	---	---	
RW1 (20.24)	Not Monitored 6/16/92 through 10/6/98.										
	1/11/99	NLPH	12.37	7.87	---	---	---	---	---	---	
	4/8/99	NLPH	10.41	9.83	---	---	---	---	---	---	
	7/19/99	---	---	---	---	---	---	---	---	---	
	7/27/99	NLPH	12.76	7.48	---	---	---	---	---	---	
	10/25/99	NLPH	12.50	7.74	---	---	---	---	---	---	
	1/27/00	NLPH	12.11	8.13	---	---	---	---	---	---	
	4/3/00	NLPH	12.07	8.17	---	---	---	---	---	---	
RW2 (20.44)	Not Monitored 6/16/92 through 4/20/98.										
	7/21/98	NLPH	12.65	7.79	3,500	170	240	100	41	96	
	10/6/98	NLPH	13.06	7.38	3,200	200	120	48	56	120	
	1/11/99	NLPH	12.88	7.56	3,300	350	150	17	35	40	
	4/8/99	sheen	11.76	8.68	---	---	---	---	---	---	
	7/19/99	NLPH	11.61	8.83	1,980	160/499*	44	4.16	22.3	11.6	
	7/27/99	NLPH	13.26	7.18	---	---	---	---	---	---	
	10/25/99	NLPH	12.96	7.48	1,800	440	51	<0.5	4.7	9.5	
	1/27/00	NLPH	12.70	7.74	1,900	750	38	<2.5	4.8	10.4	
	4/3/00	NLPH	11.97	8.47	2,100	300	28	2.4	1.4	0.73	
RW3A (21.75)	Not Monitored 6/16/92 through 4/20/98.										
	7/21/98	NLPH	13.08	8.67	280	16	97	<1.2	<1.2	<1.2	
	10/6/98	NLPH	13.72	8.03	78	26	26	0.89	<0.5	<0.5	
	1/11/99	NLPH	12.00	9.75	1,000	230	490	5.0	<5.0	7.4	
	4/8/99	NLPH	11.90	9.85	130	11	70	<1.0	<1.0	<1.0	
	7/19/99	NLPH	11.75	10.00	989	16.4	393	6.40	5.70	15.0	

TABLE 1
CUMULATIVE GROUNDWATER MONITORING AND SAMPLING DATA

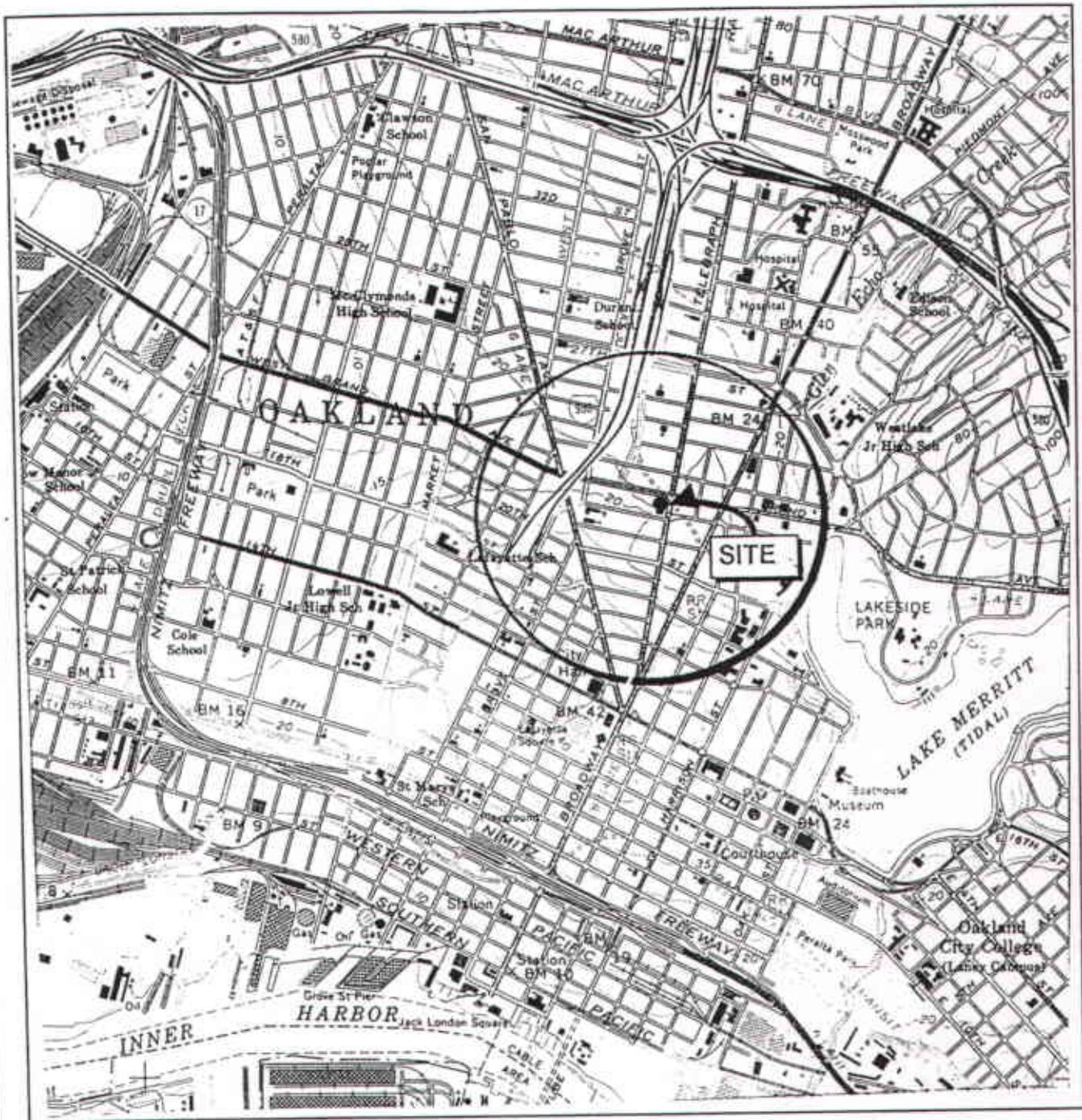
Exxon Service Station 7-0235
2225 Telegraph Avenue
Oakland, California
(Page 4 of 4)

Well ID # (TOC)	Sampling Date	SUBJ <.....>	DTW feet.....>	Elev.	TPPHg <.....>	MTBEug/L.....>	B	T	E	X
RW3A(Cont.) (21.75)	7/27/99	NLPH	13.68	8.07	---	---	---	---	---	---
	10/25/99	NLPH	13.61	8.14	150	19	53	<0.5	<0.5	<0.5
	1/27/00	NLPH	12.22	9.53	500	12	210	0.59	1.40	2.29
	4/3/00	NLPH	12.00	9.75	1,100	16	420	1.6	1.8	1.4

Notes:

- SUBJ = Results of subjective evaluation.
- NLPH = No liquid-phase hydrocarbons present in well.
- sheen = Liquid-phase hydrocarbon present as sheen.
- TOC = Elevation of top of well casing; relative to mean sea level.
- DTW = Depth to water.
- Elev. = Elevation of groundwater surface; relative to mean sea level.
- TPPHg = Total purgeable petroleum hydrocarbons as gasoline analyzed using EPA method 5030/8015 (modified).
- MTBE = Methyl tertiary butyl ether analyzed using EPA method 8021B.
- BTEX = Benzene, toluene, ethylbenzene, and total xylenes analyzed using EPA method 8021B.
- < = Less than the indicated detection limit shown by the laboratory.
- = Not measured or sampled.
- * = Methyl tertiary butyl ether analyzed using EPA method 8260B.
- ug/L = Micrograms per liter.

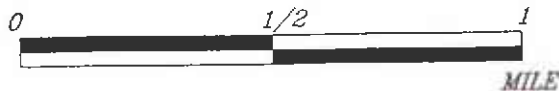
Sampling discontinued for wells MW6F, MW6G, and RW1 per Alameda County Health Services Agency letter dated June 1, 1998.



FN 22290001



APPROXIMATE SCALE



Source: U.S.G.S. 7.5 minute topographic quadrangle map Oakland West, California (Photorevised 1980)



PROJECT ERI 2229

SITE VICINITY MAP

EXXON SERVICE STATION 7-0235
2225 Telegraph Avenue
Oakland, California

PLATE

1

APPROXIMATE SCALE



WEST GRAND AVENUE

TELEGRAPH AVENUE

22ND STREET

Chevron Station



$i = 0.020$
April 3, 2000

SOURCE:
Modified from a map
provided by
Ron Archer Civil Engineer Inc.

FN 22290003

EXPLANATION

- MW6I Groundwater Monitoring Well
- 8.00 Groundwater elevation in feet above mean sea level
- $i =$ Interpreted Groundwater Gradient
- RW3A Groundwater Recovery Well

Groundwater Concentrations in ug/L
Sampled April 3, 2000

- 12,000 Total Purgeable Petroleum Hydrocarbons as gasoline
- 8,800 Methyl Tertiary Butyl Ether
- 2,800 Benzene
- 1,100 Toluene
- 230 Ethylbenzene
- 1,020 Total Xylenes
- < Less Than the Stated Laboratory Detection Limit
- ug/L Micrograms per Liter
- NS Not Sampled



GENERALIZED SITE PLAN

EXXON SERVICE STATION 7-0235
2225 Telegraph Avenue
Oakland, California

PROJECT NO.

2229

PLATE

2

April 19, 2000

ATTACHMENT A
GROUNDWATER SAMPLING PROTOCOL

BLAINE TECH SERVICES, INC. METHODS AND PROCEDURES FOR THE ROUTINE MONITORING OF GROUNDWATER WELLS AT EXXON STATIONS

Blaine Tech Services, Inc. performs environmental sampling and documentation as an independent third party. We specialize in groundwater monitoring assignments and intentionally limit the scope of our services to those centered on the generation of objective information.

To avoid conflicts of interest, Blaine Tech Services, Inc. personnel do not evaluate or interpret the information we collect. As a state licensed contractor (C-57 well drilling –water – 746684) performing strictly technical services, we do not make any professional recommendations and perform no consulting of any kind.

SAMPLING PROCEDURES OVERVIEW

SAFETY

All groundwater monitoring assignments performed for Exxon comply with Exxon's safety guidelines, 29 CFR 1910.120 and SB-198 Injury and Illness Prevention Program (IIPP). All Field Technicians receive the full 40 hour 29CFR 1910.120 OSHA SARA HAZWOPER course, medical clearance and on-the-job training prior to commencing any work on any Exxon site.

INSPECTION AND GAUGING

Wells are inspected prior to evacuation and sampling. The condition of the wellhead is checked and noted according to a wellhead inspection checklist. Each wellcap is removed prior to gauging to allow the water level to equilibrate for at least 15 minutes.

Standard measurements include the depth to water (DTW) and the total well depth (TD) obtained with industry standard electronic sounders which are graduated in increments of hundredths of a foot.

The water in each well is inspected for the presence of Immiscibles or sheen and when free product is suspected, it is confirmed using an electronic interface probe (e.g. MMC). If sheen or product is found in a well, the Project Coordinator notifies the appropriate party (e.g. Exxon employee or consultant).

No samples are collected from a well containing sheen or product.

EVACUATION

Depth to water measurements are collected by our personnel prior to purging and minimum purge volumes are calculated anew for each well based on the height of the water column and the diameter of the well. Expected purge volumes are never less than three case volumes and are set at no less than four case volumes in some jurisdictions.

Well purging devices are selected on the basis of the well diameter and the total volume to be evacuated. In most cases the well will be purged using an electric submersible pump (i.e. Grundfos) suspended near (but not touching) the bottom of the well. Small volumes of purgewater are often removed by hand bailing with a disposable bailer.

PARAMETER STABILIZATION

Well purging completion standards include minimum purge volumes, but additionally require stabilization of specific groundwater parameters prior to sample collection. Typical groundwater parameters used to measure stability are electrical conductivity, pH, and temperature. Instrument readings are obtained at regular intervals during the evacuation process (no less than once per case volume).

Stabilization standards for routine quarterly monitoring of fuel sites include the following: Temperature is considered to have stabilized when successive readings do not fluctuate more than +/- 1 degree Celsius. Electrical conductivity is considered stable when successive readings are within 10%. pH is considered to be stable when successive readings remain constant or vary no more than 0.2 of a pH unit.

DEWATERED WELLS

Normal evacuation removes no less than three case volumes of water from the well. However, less water may be removed in cases where the well dewateres and does not recharge.

Wells known to dewater are evacuated as early as possible during each site visit in order to allow for the greatest amount of recovering. Any well that does not recharge to 80% of its original volume will be sampled prior to the departure of our personnel from the site in order to eliminate the need of a return visit.

In jurisdictions where a certain percentage of recovery is included in the local completion standard, our personnel follow the regulatory expectation.

PURGEWATER CONTAINMENT

All non-hazardous purgewater evacuated from each groundwater monitoring well is captured and contained in on-board storage tanks on the Sampling Vehicle and/or special water hauling trailers. Effluent from the decontamination of reusable apparatus (sounders, electric pumps and hoses etc.), consisting of groundwater combined with deionized water and non-phosphate soap, is also captured and pumped into effluent tanks.

Non hazardous purgewater is transported under standard Bill of Lading documentation to a

Blaine Tech Services, Inc. facility before being transported to an Exxon approved disposal facility (e.g. Romco Environmental Technologies Corporation in East Palo Alto, California).

SAMPLE COLLECTION DEVICES

All samples are collected using a disposable bailer.

SAMPLE CONTAINERS

Sample material is decanted directly from the sampling bailer into sample containers provided by the laboratory which will analyze the samples. The transfer of sample material from the bailer to the sample container conforms to specifications contained in the USEPA T.E.G.D. The type of sample container, material of construction, method of closure and filling requirements are specific to the intended analysis. Chemicals needed to preserve the sample material are commonly placed inside the sample containers by the laboratory or glassware vendor prior to delivery of the bottle to our personnel. The laboratory sets the number of replicate containers.

TRIP BLANKS

A Trip Blank is carried to each site and is kept inside the cooler for the duration of the sampling event. It is turned over to the laboratory for analysis with the samples from that site.

SAMPLE STORAGE

All sample containers are promptly placed in food grade ice chests for storage in the field and transport (direct or via our facility) to the analytical laboratory that will perform the intended analytical procedures. These ice chests contain quantities of restaurant grade ice as a refrigerant material. The samples are maintained in either an ice chest or a refrigerator until relinquished into the custody of the laboratory or laboratory courier.

DOCUMENTATION CONVENTIONS

Each and every sample container has a label affixed to it. In most cases these labels are generated by our office personnel and are partially preprinted. Labels can also be hand written by our field personnel. The site is identified with the store number and site address, as is the particular groundwater well from which the sample is drawn (e.g. MW-1, MW-2, S-1 etc.). The time at which the sample was collected and the initials of the person collecting the sample are handwritten onto the label.

Chain of Custody records are created using client specific preprinted forms following USEPA specifications.

Bill of Lading records are contemporaneous records created in the field at the site where the non-hazardous purgewater is generated. Field Technicians use preprinted Bill of Lading forms.

DECONTAMINATION

All equipment is brought to the site in clean and serviceable condition and is cleaned after use in each well and before subsequent use in any other well. Equipment is decontaminated before leaving the site.

The primary decontamination device is a commercial steam cleaner. The steam cleaner is de-tuned to function as a hot pressure washer which is then operated with high quality deionized water which is produced at our facility and stored onboard our sampling vehicle. Cleaning is facilitated by the use of proprietary fixtures and devices included in the patented workstation (U.S. Patent 5,535,775) that is incorporated in each sampling vehicle. The steam cleaner is used to decon reels, pumps and bailers.

Any sensitive equipment or parts (i.e. Dissolved Oxygen sensor membrane, sounder etc.) that cannot be washed using the hot high pressure water, will be sprayed with a non-phosphate soap and deionized water solution and rinsed with deionized water.

EXAMPLE: The sounder is cleaned between wells using the non-phosphate soap and deionized water solution followed by deionized water rinses. The sounder is then washed with the steam cleaner between sites or as necessitated by use in a particularly contaminated well.

DISSOLVED OXYGEN READINGS

All Dissolved Oxygen readings are taken using YSI meters (e.g. YSI Model 58 or equivalent YSI meter). These meters are equipped with a YSI stirring device that enables them to collect accurate in-situ readings. The probe/stirring devices are modified to allow downhole measurements to be taken from wells as small as two-inch diameter.

The probe and reel is decontaminated between wells as described above. The meter is calibrated between wells as per the instructions in the operating manual. The probe and stirrer is lowered into the water column allowed to stabilize before use.

OXYIDATON REDUCTION POTENTIAL READINGS

All readings are obtained with either Corning or Myron-L meters (e.g. Corning ORP-65 or a Myron-L Ultrameter GP). The meter is cleaned between wells as described above. The meter is calibrated at the start of each day according to the instruction manual. In use the probe is placed in a cup of freshly obtained monitoring well water and allowed to stabilize.

ATTACHMENT B
FIELD DATA SHEETS

WELL GAUGING DATA

Project # 000403-21 Date 4-3-00 Client Exxon 7-0235

Site 2225 Telegraph Ave. Oakland, CA

Well ID	Well Size (in.)	Sheen / Odor	Depth to Immiscible Liquid (ft.)	Thickness of Immiscible Liquid (ft.)	Volume of Immiscibles Removed (ml)	Depth to water (ft.)	Depth to well bottom (ft.)	Survey Point - TOB or TOC
MW-6B	2					11.61	18.31	/
MW-6E	4					12.11	19.54	
MW-6F	4					12.10	19.56	
MW-6G	4					10.00	19.48	
MW-6H	4					11.62	19.69	
MW-6I	4					12.24	19.42	
RW-1	4		Gauged with pump SW			12.07	23.59	
RW-2	4	ODOR	Gauged with pump SW			11.97	23.41	
RW-3A	4		Gauged with pump SW			12.00	21.14	

EXXON WELL MONITORING DATA SHEET

Project #: 000403-21	Store # 7-0235
Sampler: BF	Date: 4-3-00
Well I.D.: MW-6B	Well Diameter: (2) 3 4 6 8
Total Well Depth: 18.31	Depth to Water: 11.61
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: (PVC) Grade	D.O. Meter (if req'd): YSI HACH

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
(2) 2"	0.16	6"	1.47
3"	0.37	Other	radius ² * 0.163

Purge Method: Bailer
 Disposable Bailer
 Middleburg
 Electric Submersible
 Extraction Pump

Other: _____

Sampling Method: Bailer
 Disposable Bailer
 Extraction Port

Other: _____

1.0	x	3	=	3	Gals.
1 Case Volume (Gals.)		Specified Volumes		Calculated Volume	

Time	Temp (°F)	pH	Cond.	Gals. Removed	Observations
9:40	62.6	7.2	1090	1	slight odor
9:44	62.7	7.2	1089	2	cloudy
9:57	62.9	7.2	1044	3	↓ ↓

Did well dewater? Yes No Gallons actually evacuated: 3

Sampling Time: 10:05 Sampling Date: 4-3-00

Sample I.D.: MW-6B Laboratory: (SPL) Other _____

Analyzed for: (TPH-G) (BTEX) (MTBE) TPH-D Other: _____

D.O. (if req'd):	Pre-purge:	mg/L	Post-purge:	mg/L
O.R.P. (if req'd):	Pre-purge:	mV	Post-purge:	mV

EXXON WELL MONITORING DATA SHEET

Project #: 000403-21	Store # 7-0235
Sampler: BF	Date: 4-3-00
Well I.D.: MW-6E	Well Diameter: 2 3 (4) 6 8
Total Well Depth: 19.54	Depth to Water: 12.11
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: (PVC) Grade	D.O. Meter (if req'd): YSI HACH

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius ² * 0.163

Purge Method: Bailer Disposable Bailer Middleburg <u>Electric Submersible</u> Extraction Pump	Sampling Method: Bailer <u>Disposable Bailer</u> Extraction Port Other: _____
-----------------------------------------------------------------------------------------------------------	----------------------------------------------------------------------------------------

4.8	x	3	=	14.4	Gals.
1 Case Volume (Gals.)		Specified Volumes		Calculated Volume	

Time	Temp (°F)	pH	Cond.	Gals. Removed	Observations
10:30	62.2	7.7	547	5	- cloudy -
10:31	61.9	7.1	441	10	
10:33	62.0	7.1	406	15	

Did well dewater? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Gallons actually evacuated: 15
Sampling Time: 10:38	Sampling Date: 4-3-00
Sample I.D.: MW-6E	Laboratory: (SPL) Other _____
Analyzed for: (TPH-G) (BTEX) (MTBE) TPH-D Other:	
D.O. (if req'd):	Pre-purge: _____ mg/L Post-purge: _____ mg/L
O.R.P. (if req'd):	Pre-purge: _____ mV Post-purge: _____ mV

EXXON WELL MONITORING DATA SHEET

Project #: 000403-21	Store # 7-0235
Sampler: BF	Date: 4-3-00
Well I.D.: MW-6H	Well Diameter: 2 3 <u>4</u> 6 8
Total Well Depth: 19.69	Depth to Water: 11.62
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: <u>PVC</u> Grade	D.O. Meter (if req'd): YSI HACH

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius ² * 0.163

Purge Method:	Sampling Method:
Bailer Disposable Bailer Middleburg <u>Electric Submersible</u> Extraction Pump Other: _____	Bailer <u>Disposable Bailer</u> Extraction Port Other: _____

5.2	x	3	=	15.6	Gals.
1 Case Volume (Gals.)		Specified Volumes		Calculated Volume	

Time	Temp (°F)	pH	Cond.	Gals. Removed	Observations
11:11	64.9	7.2	1002	5.5	"ODOR" "grey"
11:13	65.9	7.1	1035	11	↓
11:15	66.2	7.1	1044	16	↓

Did well dewater? Yes <input type="radio"/> No <input checked="" type="radio"/>	Gallons actually evacuated: <u>16</u>	
Sampling Time: 11:20	Sampling Date: 4-3-00	
Sample I.D.: MW-6H	Laboratory: <u>SPL</u> Other: _____	
Analyzed for: <u>TPH-G</u> <u>BTEX</u> <u>MTBE</u> TPH-D Other: _____		
D.O. (if req'd):	Pre-purge: _____ mg/L	Post-purge: _____ mg/L
O.R.P. (if req'd):	Pre-purge: _____ mV	Post-purge: _____ mV

EXXON WELL MONITORING DATA SHEET

Project #: 000403-21	Store #: 7-0235
Sampler: BF	Date: 4-3-00
Well I.D.: RW-2	Well Diameter: 2 3 <u>4</u> 6 8
Total Well Depth: 23.41	Depth to Water: 11.97
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: <u>PVC</u> Grade	D.O. Meter (if req'd): YSI HACH

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius ² * 0.163

Purge Method: Bailer	Sampling Method: Bailer
Disposable Bailer	<u>Disposable Bailer</u>
Middleburg	Extraction Port
<u>Electric Submersible</u>	Other: _____
Extraction Pump	
Other: _____	

7.4	x	3	=	22.2	Gals.
1 Case Volume (Gals.)		Specified Volumes		Calculated Volume	

Time	Temp (°F)	pH	Cond.	Gals. Removed	Observations
10:50	61.8	7.2	747	7.5	ODOR / grey
10:52	62.5	7.2	815	15	↓
10:54	62.7	7.2	822	22	↓

Did well dewater? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Gallons actually evacuated: 22	
Sampling Time: 11:00	Sampling Date: 4-3-00	
Sample I.D.: RW-2	Laboratory: <u>SPL</u> Other: _____	
Analyzed for: <u>TPH-G</u> <u>BTEX</u> <u>MTBE</u> TPH-D Other: _____		
D.O. (if req'd):	Pre-purge: _____ mg/L	Post-purge: _____ mg/L
O.R.P. (if req'd):	Pre-purge: _____ mV	Post-purge: _____ mV

EXXON WELL MONITORING DATA SHEET

Project #: 000403-21	Store #: 7-0235
Sampler: BF	Date: 4-3-00
Well I.D.: RW-3A	Well Diameter: 2 3 <u>4</u> 6 8
Total Well Depth: 21.14	Depth to Water: 12.00
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: <u>PVC</u> Grade	D.O. Meter (if req'd): YSI HACH

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius ² * 0.163

Purge Method: Bailer Sampling Method: Bailer
 Disposable Bailer Disposable Bailer
 Middleburg Extraction Port
 Electric Submersible
 Extraction Pump
 Other: _____

5.9	x	3	=	17.7	Gals.
1 Case Volume (Gals.)		Specified Volumes		Calculated Volume	

Time	Temp (°F)	pH	Cond.	Gals. Removed	Observations
10:13	65.7	7.1	1287	6	odor/cloudy
10:14	65.7	7.1	1259	12	↓
10:16	65.7	7.2	1201	18	↓

Did well dewater? Yes No Gallons actually evacuated: 18

Sampling Time: 10:20 Sampling Date: 4-3-00

Well I.D.: RW-3A Laboratory: SPL Other: _____

Tested for: TPH-G BTEX MTBE TPH-D Other: _____

Pre-purge:	mg/L	Post-purge:	mg/L
Pre-purge:	mV	Post-purge:	mV

ATTACHMENT C

**LABORATORY ANALYSIS REPORT
AND CHAIN OF CUSTODY RECORD**



HOUSTON LABORATORY
 8880 INTERCHANGE DRIVE
 HOUSTON, TEXAS 77054
 (713) 660-0901

Case Narrative for:
EXXON Company U.S.A.

RECEIVED
APR 28 2000

Certificate of Analysis Number:
00040145

<p>Report To: Environmental Resolution, Inc. Jim Chappell 73 Digital Drive Suite 100 Novato California 94949- ph: (415) 382-9105 fax: (415) 382-1856</p>	<p>Project Name: 2229 Site: 7-0235,19900939 Site Address: 2225 Telegraph Avenue Oakland CA PO Number: State: California State Cert. No.: Date Reported: 4/20/00</p>
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Any data flags or quality control exceptions associated with this report will be footnoted in the analytical result page(s) or the quality control summary page(s).

Please do not hesitate to contact us if you have any questions or comments pertaining to this data report. Please reference the above Certificate of Analysis Number.

SPL, Inc. is pleased to be of service to you. We anticipate working with you in fulfilling all your current and future analytical needs.

This report shall not be reproduced except in full, without the written approval of the laboratory. The reported results are only representative of the samples submitted for testing.

Sonia West
 West, Sonia
 Senior Project Manager

4/20/00

Date



EXXON Company U.S.A.

Certificate of Analysis Number:
00040145

Report To: Environmental Resolution, Inc. Jim Chappell 73 Digital Drive Suite 100 Novato California 94949- ph: (415) 382-9105 fax: (415) 382-1856	Project Name: 2229 Site: 7-0235,19900939 Site Address: 2225 Telegraph Avenue Oakland CA PO Number: State: California State Cert. No.: Date Reported: 4/20/00
Analyst: Environmental Resolution, Inc. Jim Chappell fax: (415) 382-1856	

Client Sample ID	Lab Sample ID	Matrix	Date Collected	Date Received	COC ID	HOLD
W-6B	00040145-01	Water	4/3/00 10:05:00 AM	4/6/00 10:00:00 AM		<input type="checkbox"/>
W-6E	00040145-02	Water	4/3/00 10:38:00 AM	4/6/00 10:00:00 AM		<input type="checkbox"/>
W-6H	00040145-03	Water	4/3/00 11:20:00 AM	4/6/00 10:00:00 AM		<input type="checkbox"/>
W-2	00040145-04	Water	4/3/00 11:00:00 AM	4/6/00 10:00:00 AM		<input type="checkbox"/>
W-3	00040145-05	Water	4/3/00 10:20:00 AM	4/6/00 10:00:00 AM		<input type="checkbox"/>
	00040145-06	Water	4/3/00	4/6/00 10:00:00 AM		<input type="checkbox"/>

Sonia West

4/20/00

Ver: Sonia
 Senior Project Manager

Date

Joel Grice
 Laboratory Director

 Ted Yen
 Quality Assurance Officer



Client Sample ID: MW-6B

Collected: 4/3/00 10:05:00

SPL Sample ID: 00040145-01

Site: 7-0235,19900939

Analyses/Method	Result	Rep.Limit	Dil. Factor	QUAL	Date Analyzed	Analyst	Seq. #
GASOLINE RANGE ORGANICS			MCL	CA_GRO	Units: ug/L		
Gasoline Range Organics	670	50		1	04/14/00 21:52	D_R	251210
Surr: 1,4-Difluorobenzene	91.5	% 62-144		1	04/14/00 21:52	D_R	251210
Surr: 4-Bromofluorobenzene	94.7	% 44-153		1	04/14/00 21:52	D_R	251210
PURGEABLE AROMATICS			MCL	SW8021B	Units: ug/L		
Benzene	110	0.5		1	04/14/00 21:52	D_R	251064
Ethylbenzene	3.8	0.5		1	04/14/00 21:52	D_R	251064
Methyl tert-butyl ether	3.4	2		1	04/14/00 21:52	D_R	251064
Toluene	6.6	0.5		1	04/14/00 21:52	D_R	251064
m,p-Xylene	8.5	0.5		1	04/14/00 21:52	D_R	251064
o-Xylene	0.95	0.5		1	04/14/00 21:52	D_R	251064
Xylenes,Total	9.45	0.5		1	04/14/00 21:52	D_R	251064
Surr: 1,4-Difluorobenzene	111	% 72-137		1	04/14/00 21:52	D_R	251064
Surr: 4-Bromofluorobenzene	111	% 48-156		1	04/14/00 21:52	D_R	251064

Sonia West

West, Sonia
 Project Manager

Qualifiers: ND/U - Not Detected at the Reporting Limit >MCL - Result Over Maximum Contamination Limit(MCL)
 B - Analyte detected in the associated Method Blank D - Surrogate Recovery Unreportable due to Dilution
 * - Surrogate Recovery Outside Advisable QC Limits
 J - Estimated Value between MDL and PQL



Client Sample ID: MW-6E Collected: 4/3/00 10:38:00 SPL Sample ID: 00040145-02

Site: 7-0235,19900939

Analyses/Method	Result	Rep.Limit	Dil. Factor	QUAL	Date Analyzed	Analyst	Seq. #
GASOLINE RANGE ORGANICS			MCL	CA_GRO	Units: ug/L		
Gasoline Range Organics	ND	50		1	04/14/00 22:21	D_R	251212
Surr: 1,4-Difluorobenzene	92.6	% 62-144		1	04/14/00 22:21	D_R	251212
Surr: 4-Bromofluorobenzene	99.7	% 44-153		1	04/14/00 22:21	D_R	251212
PURGEABLE AROMATICS			MCL	SW8021B	Units: ug/L		
Benzene	0.51	0.5		1	04/14/00 22:21	D_R	251065
Ethylbenzene	ND	0.5		1	04/14/00 22:21	D_R	251065
Methyl tert-butyl ether	ND	2		1	04/14/00 22:21	D_R	251065
Toluene	ND	0.5		1	04/14/00 22:21	D_R	251065
m,p-Xylene	ND	0.5		1	04/14/00 22:21	D_R	251065
o-Xylene	ND	0.5		1	04/14/00 22:21	D_R	251065
Xylenes, Total	ND	0.5		1	04/14/00 22:21	D_R	251065
Surr: 1,4-Difluorobenzene	98.9	% 72-137		1	04/14/00 22:21	D_R	251065
Surr: 4-Bromofluorobenzene	99.6	% 48-156		1	04/14/00 22:21	D_R	251065

Sonia West

West, Sonia
 Project Manager

Qualifiers: ND/U - Not Detected at the Reporting Limit >MCL - Result Over Maximum Contamination Limit(MCL)
 B - Analyte detected in the associated Method Blank D - Surrogate Recovery Unreportable due to Dilution
 * - Surrogate Recovery Outside Advisable QC Limits
 J - Estimated Value between MDL and PQL



Client Sample ID: MW-6H

Collected: 4/3/00 11:20:00

SPL Sample ID: 00040145-03

Site: 7-0235,19900939

Analyses/Method	Result	Rep.Limit	Dil. Factor	QUAL	Date Analyzed	Analyst	Seq. #
GASOLINE RANGE ORGANICS			MCL	CA_GRO	Units: ug/L		
Gasoline Range Organics	12000	250		5	04/14/00 22:50	D_R	251213
Surr: 1,4-Difluorobenzene	100	% 62-144		5	04/14/00 22:50	D_R	251213
Surr: 4-Bromofluorobenzene	100	% 44-153		5	04/14/00 22:50	D_R	251213
PURGEABLE AROMATICS			MCL	SW8021B	Units: ug/L		
Benzene	2800	25		50	04/17/00 13:05	D_R	252334
Ethylbenzene	230	2.5		5	04/14/00 22:50	D_R	251066
Methyl tert-butyl ether	8800	100		50	04/17/00 13:05	D_R	252334
Toluene	1100	2.5		5	04/14/00 22:50	D_R	251066
m,p-Xylene	750	2.5		5	04/14/00 22:50	D_R	251066
o-Xylene	270	2.5		5	04/14/00 22:50	D_R	251066
Xylenes, Total	1020	2.5		5	04/14/00 22:50	D_R	251066
Surr: 1,4-Difluorobenzene	98.5	% 72-137		50	04/17/00 13:05	D_R	252334
Surr: 1,4-Difluorobenzene	99.7	% 72-137		5	04/14/00 22:50	D_R	251066
Surr: 4-Bromofluorobenzene	103	% 48-156		50	04/17/00 13:05	D_R	252334
Surr: 4-Bromofluorobenzene	108	% 48-156		5	04/14/00 22:50	D_R	251066

Sonia West

West, Sonia
 Project Manager

Qualifiers: ND/U - Not Detected at the Reporting Limit >MCL - Result Over Maximum Contamination Limit(MCL)
 B - Analyte detected in the associated Method Blank D - Surrogate Recovery Unreportable due to Dilution
 * - Surrogate Recovery Outside Advisable QC Limits
 J - Estimated Value between MDL and PQL



Client Sample ID: RW-2

Collected: 4/3/00 11:00:00

SPL Sample ID: 00040145-04

Site: 7-0235,19900939

Analyses/Method	Result	Rep.Limit	Dil. Factor	QUAL	Date Analyzed	Analyst	Seq. #
GASOLINE RANGE ORGANICS			MCL	CA_GRO	Units: ug/L		
Gasoline Range Organics	2100	50	1		04/17/00 16:30	D_R	252393
Surr: 1,4-Difluorobenzene	91.4	% 62-144	1		04/17/00 16:30	D_R	252393
Surr: 4-Bromofluorobenzene	140	% 44-153	1		04/17/00 16:30	D_R	252393
PURGEABLE AROMATICS			MCL	SW8021B	Units: ug/L		
Benzene	28	0.5	1		04/17/00 16:30	D_R	252399
Ethylbenzene	1.4	0.5	1		04/17/00 16:30	D_R	252399
Methyl tert-butyl ether	300	2	1		04/17/00 16:30	D_R	252399
Toluene	2.4	0.5	1		04/17/00 16:30	D_R	252399
m,p-Xylene	ND	0.5	1		04/17/00 16:30	D_R	252399
o-Xylene	0.73	0.5	1		04/17/00 16:30	D_R	252399
Xylenes, Total	0.73	0.5	1		04/17/00 16:30	D_R	252399
Surr: 1,4-Difluorobenzene	120	% 72-137	1		04/17/00 16:30	D_R	252399
Surr: 4-Bromofluorobenzene	128	% 48-156	1		04/17/00 16:30	D_R	252399

Sonia West

West, Sonia
 Project Manager

Qualifiers: ND/U - Not Detected at the Reporting Limit >MCL - Result Over Maximum Contamination Limit(MCL)
 B - Analyte detected in the associated Method Blank D - Surrogate Recovery Unreportable due to Dilution
 * - Surrogate Recovery Outside Advisable QC Limits
 J - Estimated Value between MDL and PQL



Client Sample ID: RW-3A

Collected: 4/3/00 10:20:00

SPL Sample ID: 00040145-05

Site: 7-0235,19900939

Analyses/Method	Result	Rep.Limit	Dil. Factor	QUAL	Date Analyzed	Analyst	Seq. #
GASOLINE RANGE ORGANICS			MCL	CA_GRO	Units: ug/L		
Gasoline Range Organics	1100	50	1		04/14/00 23:48	D_R	251215
Surr: 1,4-Difluorobenzene	98.4	% 62-144	1		04/14/00 23:48	D_R	251215
Surr: 4-Bromofluorobenzene	98.6	% 44-153	1		04/14/00 23:48	D_R	251215
PURGEABLE AROMATICS			MCL	SW8021B	Units: ug/L		
Benzene	420	0.5	1		04/14/00 23:48	D_R	251067
Ethylbenzene	1.8	0.5	1		04/14/00 23:48	D_R	251067
Methyl tert-butyl ether	16	2	1		04/14/00 23:48	D_R	251067
Toluene	1.6	0.5	1		04/14/00 23:48	D_R	251067
m,p-Xylene	1.4	0.5	1		04/14/00 23:48	D_R	251067
o-Xylene	ND	0.5	1		04/14/00 23:48	D_R	251067
Xylenes, Total	1.4	0.5	1		04/14/00 23:48	D_R	251067
Surr: 1,4-Difluorobenzene	100	% 72-137	1		04/14/00 23:48	D_R	251067
Surr: 4-Bromofluorobenzene	107	% 48-156	1		04/14/00 23:48	D_R	251067

Sonia West

West, Sonia
 Project Manager

Qualifiers: ND/U - Not Detected at the Reporting Limit >MCL - Result Over Maximum Contamination Limit(MCL)
 B - Analyte detected in the associated Method Blank D - Surrogate Recovery Unreportable due to Dilution
 * - Surrogate Recovery Outside Advisable QC Limits
 J - Estimated Value between MDL and PQL



Client Sample ID: TB

Collected: 4/3/00

SPL Sample ID: 00040145-06

Site: 7-0235,19900939

Analyses/Method	Result	Rep.Limit	Dil. Factor	QUAL	Date Analyzed	Analyst	Seq. #
GASOLINE RANGE ORGANICS			MCL	CA_GRO	Units: ug/L		
Gasoline Range Organics	ND	50	1		04/15/00 1:41	D_R	251217
Surr: 1,4-Difluorobenzene	93.7	% 62-144	1		04/15/00 1:41	D_R	251217
Surr: 4-Bromofluorobenzene	97.8	% 44-153	1		04/15/00 1:41	D_R	251217
PURGEABLE AROMATICS			MCL	SW8021B	Units: ug/L		
Benzene	ND	0.5	1		04/15/00 1:41	D_R	251069
Ethylbenzene	ND	0.5	1		04/15/00 1:41	D_R	251069
Methyl tert-butyl ether	ND	2	1		04/15/00 1:41	D_R	251069
Toluene	ND	0.5	1		04/15/00 1:41	D_R	251069
m,p-Xylene	ND	0.5	1		04/15/00 1:41	D_R	251069
o-Xylene	ND	0.5	1		04/15/00 1:41	D_R	251069
Xylenes, Total	ND	0.5	1		04/15/00 1:41	D_R	251069
Surr: 1,4-Difluorobenzene	98.1	% 72-137	1		04/15/00 1:41	D_R	251069
Surr: 4-Bromofluorobenzene	97.5	% 48-156	1		04/15/00 1:41	D_R	251069

Sonia West

West, Sonia
 Project Manager

Qualifiers: ND/U - Not Detected at the Reporting Limit >MCL - Result Over Maximum Contamination Limit(MCL)
 B - Analyte detected in the associated Method Blank D - Surrogate Recovery Unreportable due to Dilution
 * - Surrogate Recovery Outside Advisable QC Limits
 J - Estimated Value between MDL and PQL

Quality Control Documentation



Quality Control Report
 EXXON Company U.S.A.
 2229

Analysis: Purgeable Aromatics
 Method: SW8021B

WorkOrder: 00040145
 Lab Batch ID: R12468

Method Blank

Samples in Analytical Batch:

RunID: HP_S_000414A-251056 Units: ug/L
 Analysis Date: 04/14/2000 15:08 Analyst: D_R

Lab Sample ID	Client Sample ID
00040145-01A	MW-6B
00040145-02A	MW-6E
00040145-03A	MW-6H
00040145-05A	RW-3A
00040145-06A	TB

Analyte	Result	Rep Limit
Benzene	ND	0.50
Ethylbenzene	ND	0.50
Methyl tert-butyl ether	ND	2.0
Toluene	ND	0.50
m,p-Xylene	ND	0.50
o-Xylene	ND	0.50
Xylenes, Total	ND	0.50
Surr: 1,4-Difluorobenzene	103.9	72-137
Surr: 4-Bromofluorobenzene	101.2	48-156

Laboratory Control Sample (LCS)

RunID: HP_S_000414A-251057 Units: ug/L
 Analysis Date: 04/14/2000 15:45 Analyst: D_R

Analyte	Spike Added	Result	Percent Recovery	Lower Limit	Upper Limit
Benzene	50	53	105	61	119
Ethylbenzene	50	53	106	70	118
Methyl tert-butyl ether	50	53	106	72	128
Toluene	50	53	106	65	125
m,p-Xylene	100	110	107	72	116
o-Xylene	50	53	106	72	117
Xylenes, Total	150	163	109	72	117

Matrix Spike (MS) / Matrix Spike Duplicate (MSD)

Sample Spiked: 00040160-02
 RunID: HP_S_000414A-251058 Units: ug/L
 Analysis Date: 04/14/2000 16:54 Analyst: D_R

Analyte	Sample Result	MS Spike Added	MS Result	MS % Recovery	MSD Spike Added	MSD Result	MSD % Recovery	RPD	RPD Limit	Low Limit	High Limit
Benzene	ND	20	24	120	20	24	122	1.46	21	32	164
Ethylbenzene	ND	20	23	113	20	23	117	3.16	19	52	142
Methyl tert-butyl ether	1700	20	1600	-385*	20	1700	-230*	50.4*	20	39	150
Toluene	ND	20	23	115	20	24	120	4.06	20	38	159

Qualifiers: ND/U - Not Detected at the Reporting Limit * - Recovery Outside Advisable QC Limits
 B - Analyte detected in the associated Method Blank D - Recovery Unreportable due to Dilution
 J - Estimated value between MDL and PQL



Quality Control Report

EXXON Company U.S.A.

2229

Analysis: Purgeable Aromatics
 Method: SW8021B

WorkOrder: 00040145
 Lab Batch ID: R12468

Matrix Spike (MS) / Matrix Spike Duplicate (MSD)

Sample Spiked: 00040160-02
 RunID: HP_S_000414A-251058 Units: ug/L
 Analysis Date: 04/14/2000 16:54 Analyst: D_R

Analyte	Sample Result	MS Spike Added	MS Result	MS % Recovery	MSD Spike Added	MSD Result	MSD % Recovery	RPD	RPD Limit	Low Limit	High Limit
m, p-Xylene	ND	40	46	115	40	47	119	3.26	17	53	144
o-Xylene	ND	20	24	118	20	25	123	4.76	18	53	143
Xylenes, Total	ND	60	70	117	60	72	120	2.82	18	53	144

Qualifiers: ND/U - Not Detected at the Reporting Limit * - Recovery Outside Advisable QC Limits
 B - Analyte detected in the associated Method Blank D - Recovery Unreportable due to Dilution
 J - Estimated value between MDL and PQL



Quality Control Report

EXXON Company U.S.A.

2229

Analysis: Gasoline Range Organics
 Method: CA_GRO

WorkOrder: 00040145
 Lab Batch ID: R12481

Method Blank

Samples in Analytical Batch:

RunID: HP_S_000414B-251196 Units: mg/L
 Analysis Date: 04/14/2000 15:08 Analyst: D_R

Lab Sample ID	Client Sample ID
00040145-01A	MW-6B
00040145-02A	MW-6E
00040145-03A	MW-6H
00040145-05A	RW-3A
00040145-06A	TB

Analyte	Result	Rep Limit
Gasoline Range Organics	ND	0.050
Surr: 1,4-Difluorobenzene	92.9	62-144
Surr: 4-Bromofluorobenzene	101.2	44-153

Laboratory Control Sample (LCS)

RunID: HP_S_000414B-251197 Units: mg/L
 Analysis Date: 04/14/2000 16:15 Analyst: D_R

Analyte	Spike Added	Result	Percent Recovery	Lower Limit	Upper Limit
Gasoline Range Organics	1	0.97	97	64	131

Matrix Spike (MS) / Matrix Spike Duplicate (MSD)

Sample Spiked: 00040160-03
 RunID: HP_S_000414B-251198 Units: mg/L
 Analysis Date: 04/14/2000 17:55 Analyst: D_R

Analyte	Sample Result	MS Spike Added	MS Result	MS % Recovery	MSD Spike Added	MSD Result	MSD % Recovery	RPD	RPD Limit	Low Limit	High Limit
Gasoline Range Organics	0.49	0.9	1	62.2	0.9	1.1	62.6	0.552	36	36	160

Qualifiers: ND/U - Not Detected at the Reporting Limit * - Recovery Outside Advisable QC Limits
 B - Analyte detected in the associated Method Blank D - Recovery Unreportable due to Dilution
 J - Estimated value between MDL and PQL



Quality Control Report
EXXON Company U.S.A.
2229

Analysis: Purgeable Aromatics
Method: SW8021B

WorkOrder: 00040145
Lab Batch ID: R12538

Method Blank

Samples in Analytical Batch:

RunID: HP_S_000417A-252333 Units: ug/L
Analysis Date: 04/17/2000 12:18 Analyst: D_R

Lab Sample ID	Client Sample ID
00040145-03A	MW-6H
00040145-04A	RW-2

Analyte	Result	Rep Limit
Benzene	ND	0.50
Ethylbenzene	ND	0.50
Methyl tert-butyl ether	ND	2.0
Toluene	ND	0.50
m,p-Xylene	ND	0.50
o-Xylene	ND	0.50
Xylenes, Total	ND	0.50
Surr: 1,4-Difluorobenzene	101.5	72-137
Surr: 4-Bromofluorobenzene	101.7	48-156

Laboratory Control Sample (LCS)

RunID: HP_S_000417A-252332 Units: ug/L
Analysis Date: 04/17/2000 11:17 Analyst: D_R

Analyte	Spike Added	Result	Percent Recovery	Lower Limit	Upper Limit
Benzene	50	49	98	61	119
Ethylbenzene	50	50	100	70	118
Methyl tert-butyl ether	50	47	94	72	128
Toluene	50	50	99	65	125
m,p-Xylene	100	100	102	72	116
o-Xylene	50	51	101	72	117
Xylenes, Total	150	151	101	72	117

Matrix Spike (MS) / Matrix Spike Duplicate (MSD)

Sample Spiked: 00040419-01
RunID: HP_S_000417A-252610 Units: ug/L
Analysis Date: 04/17/2000 21:19 Analyst: D_R

Analyte	Sample Result	MS Spike Added	MS Result	MS % Recovery	MSD Spike Added	MSD Result	MSD % Recovery	RPD	RPD Limit	Low Limit	High Limit
Benzene	ND	20	22	107	20	21	107	0.702	21	32	164
Ethylbenzene	ND	20	20	100	20	20	98.9	1.60	19	52	142
Methyl tert-butyl ether	260	20	260	-1.10*	20	270	26.7*	217*	20	39	150
Toluene	ND	20	21	105	20	21	103	1.89	20	38	159

Qualifiers: ND/U - Not Detected at the Reporting Limit * - Recovery Outside Advisable QC Limits
B - Analyte detected in the associated Method Blank D - Recovery Unreportable due to Dilution
J - Estimated value between MDL and PQL



Quality Control Report

EXXON Company U.S.A.

2229

Analysis: Purgeable Aromatics
 Method: SW8021B

WorkOrder: 00040145
 Lab Batch ID: R12538

Matrix Spike (MS) / Matrix Spike Duplicate (MSD)

Sample Spiked: 00040419-01
 RunID: HP_S_000417A-252610 Units: ug/L
 Analysis Date: 04/17/2000 21:19 Analyst: D_R

Analyte	Sample Result	MS Spike Added	MS Result	MS % Recovery	MSD Spike Added	MSD Result	MSD % Recovery	RPD	RPD Limit	Low Limit	High Limit
1,2-Dichlorobenzene	ND	40	41	102	40	40	101	1.90	17	53	144
1,4-Dichlorobenzene	ND	20	22	110	20	22	110	0.133	18	53	143
Aromatics, Total	ND	60	63	105	60	62	103	1.60	18	53	144

Qualifiers: ND/U - Not Detected at the Reporting Limit * - Recovery Outside Advisable QC Limits
 B - Analyte detected in the associated Method Blank D - Recovery Unreportable due to Dilution
 J - Estimated value between MDL and PQL



Quality Control Report

EXXON Company U.S.A.

2229

Analysis: Gasoline Range Organics
 Method: CA_GRO

WorkOrder: 00040145
 Lab Batch ID: R12540

Method Blank

Samples in Analytical Batch:

RunID: HP_S_000417B-252369 Units: mg/L
 Analysis Date: 04/17/2000 12:18 Analyst: D_R

Lab Sample ID Client Sample ID
 00040145-04A RW-2

Analyte	Result	Rep Limit
Gasoline Range Organics	ND	0.050
Surr: 1,4-Difluorobenzene	93.8	62-144
Surr: 4-Bromofluorobenzene	100.6	44-153

Laboratory Control Sample (LCS)

RunID: HP_S_000417B-252368 Units: mg/L
 Analysis Date: 04/17/2000 11:47 Analyst: D_R

Analyte	Spike Added	Result	Percent Recovery	Lower Limit	Upper Limit
Gasoline Range Organics	1	0.89	89	64	131

Matrix Spike (MS) / Matrix Spike Duplicate (MSD)

Sample Spiked: 00040419-02
 RunID: HP_S_000417B-252643 Units: mg/L
 Analysis Date: 04/17/2000 22:22 Analyst: D_R

Analyte	Sample Result	MS Spike Added	MS Result	MS % Recovery	MSD Spike Added	MSD Result	MSD % Recovery	RPD	RPD Limit	Low Limit	High Limit
Gasoline Range Organics	ND	0.9	0.6	66.7	0.9	0.59	65.7	1.49	36	36	160

Qualifiers: ND/U - Not Detected at the Reporting Limit * - Recovery Outside Advisable QC Limits
 B - Analyte detected in the associated Method Blank D - Recovery Unreportable due to Dilution
 J - Estimated value between MDL and PQL

*Chain of Custody
And
Sample Receipt Checklist*

Exxon Engineer: Gene Ortega Phone: (925) 246-8747
 Consultant Co. Name: ERI Contact: Jim Chappel
 Address: 73 Digital Dr, Suite 100 Phone: (415) 382-4323
Novato, CA 94949 Fax: (415) 382-1856

RAS #: 7-0235 Facility/State ID # (TN Only): _____

AFE # (Terminal Only): _____ Consultant Project #: 2229

Location: 2225 Telegraph Ave. (City): Oakland (State): CA
 EE C & M SDT

Consultant Work Release #: 19900939 BTS# 000403-21

Sampled By: Blaine Tech Services, Inc./ Brian Freitas

ANALYSIS REQUEST:
(CHECK APPROPRIATE BOX)

OTHER

NO. OF CONTAINERS

CONTAINER SIZE

- BTEX 8020 WITH MTBE 602
- PURGEABLE HALOCARBON 8010 601
- TPHMR 418.1
- O & G IR 413.1 GRAV. 413.2
- TPH / GC 8015 GRO 8015 DRO
- VOL 8240 624
- SEMI-VOL 8270 625
- PNAPAH 8100 8310 8270
- PCB / PEST 8080 PCB ONLY
- TCLP FULLO VOA SEMI-VOA PESTO HERBO
- METALS, TOTAL METALS, TCLP
- LEAD, TOTAL 239.1 7421 LEAD, TCLP
- TOX/TOH
- REACTIVITY CORROSION IGNITABILITY

SAMPLE I.D.	DATE	TIME	COMP.	GRAB	MATRIX			OTHER	PRESERVATIVE	NO. OF CONTAINERS	CONTAINER SIZE	ANALYSIS REQUEST (CHECK APPROPRIATE BOX)														STATE		
					H ₂ O	SOIL	AIR					BTEX 8020	PURGEABLE HALOCARBON 8010	TPHMR 418.1	O & G IR 413.1	TPH / GC 8015 GRO	VOL 8240	SEMI-VOL 8270	PNAPAH 8100	PCB / PEST 8080	TCLP FULLO VOA	METALS, TOTAL	LEAD, TOTAL 239.1	TOX/TOH	REACTIVITY			
MW-6B	4/3	10:05			X				HCL	3	20	X																CA
MW-6E	4/3	10:38			X					3	1	X																
MW-6H	4/3	11:20			X					3	1	X																
RW-2	4/3	11:00			X					3	1	X																
RW-3A	4/3	10:20			X					3	1	X																
TB	4/3	-			X					2	1	X																

TAT
 24 HR. _____ * 72 HR. _____ *
 48 HR. _____ * 96 HR. _____ *
 Standard * Contact US Prior
 Other _____ to Sending Sample

EXXON UST
 CONTRACT NO.
 S02317M01

SPECIAL DETECTION LIMITS (Specify)

SPECIAL REPORTING REQUIREMENTS (Specify)

REMARKS:

LAB USE ONLY

LOT #

Storage Location

QA/QC Level
 Standard CLP Other

FAX FAX C-O-C W / REPORT

WORK ORDER #: 00040145

LAB WORK RELEASE #:

CUSTODY RECORD

Relinquished By Sampler: [Signature]

Date: 4/5/00 Time: 12:10

Received By:

Relinquished By Sampler:

Date: _____ Time: _____

Received By: [Signature] 4/5/00

Relinquished By Sampler:

Date: _____ Time: _____

Received By Laboratory: 05 30 10/05

Way Bill #: 815424039002 Cooler Temp: 4



HOUSTON LABORATORY
8686 INTERCHANGE DRIVE
HOUSTON, TEXAS 77054
(713) 660-0901

Sample Receipt Checklist

Workorder: 00040145
Date and Time Received: 4/6/00 10:00:00 AM
Temperature: 4

Received by: Stelly, D'Anna
Carrier name: FedEx

-
- | | | | |
|---------------------------------------------------------|-----------------------------------------|-----------------------------|-------------------------------------------------|
| Shipping container/cooler in good condition? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | Not Present <input type="checkbox"/> |
| Custody seals intact on shipping container/cooler? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | Not Present <input type="checkbox"/> |
| Custody seals intact on sample bottles? | Yes <input type="checkbox"/> | No <input type="checkbox"/> | Not Present <input checked="" type="checkbox"/> |
| Chain of custody present? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| Chain of custody signed when relinquished and received? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| Chain of custody agrees with sample labels? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| Samples in proper container/bottle? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| Sample containers intact? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| Sufficient sample volume for indicated test? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| All samples received within holding time? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| Container/Temp Blank temperature in compliance? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
| Water - VOA vials have zero headspace? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | Not Present <input type="checkbox"/> |
| Water - pH acceptable upon receipt? | Yes <input checked="" type="checkbox"/> | No <input type="checkbox"/> | |
-