

73 Digital Drive
Novato, CA 94949
Phone: (415) 382-7400
Fax: (415) 382-7415

LETTER REPORT
QUARTERLY GROUNDWATER MONITORING
First Quarter 1994

Exxon Station 7-0236
6630 East 14th Street
Oakland, California

170079.01

March 31, 94

73 Digital Drive
Novato, CA 94949
Phone: (415) 382-7400
Fax: (415) 382-7415

March 31, 1994

Ms. Marla Guensler
Exxon Company, U.S.A.
P.O. Box 4032
2300 Clayton Road
Concord, California 94524

Subject: Quarterly Groundwater Monitoring, First Quarter 1994
Exxon Station 7-0236
6630 East 14th Street
Oakland, California

Ms. Guensler:

At the request of Exxon Company, U.S.A (Exxon), RESNA Industries Inc. (RESNA) performed the first quarter 1994 groundwater monitoring event at the subject site (Plate 1, Site Vicinity Map). The objectives of groundwater monitoring are to evaluate: groundwater elevations, gradient and flow direction; the presence and thickness of any sheen or liquid phase hydrocarbons; and the distribution of dissolved hydrocarbons in groundwater.

GROUNDWATER MONITORING AND SAMPLING

On February 4, 1994, RESNA measured depth to water in monitoring wells MW-1 through MW-7, and collected groundwater samples from wells MW-1 through MW-7 for laboratory analysis. Groundwater samples from all wells were subjectively analyzed for the presence of liquid phase hydrocarbons. No measurable liquid phase hydrocarbons were observed in the monitoring wells. RESNA's groundwater sampling protocol is in Appendix A, Groundwater Sampling Protocol.

Based on February 4, 1994 depth to water measurements, groundwater elevations in the wells at the site have increased an average of approximately 2.1 feet since last quarter. The groundwater appears to flow southwestward with a hydraulic gradient of 0.033 (Plate 2, Groundwater Gradient and Chemical Concentrations). The flow direction beneath the site is consistent with last quarter. Historical and recent monitoring data are summarized in Table 1, Cumulative Groundwater Monitoring and Sampling Data.

LABORATORY ANALYSES AND RESULTS

Groundwater samples were submitted to Pace Incorporated Laboratories (California State Certification Number 1282) in Novato, California, under chain of custody protocol. The samples were analyzed for benzene, toluene, ethylbenzene, total xylenes, total petroleum hydrocarbons as gasoline (TPHg), and total petroleum hydrocarbons as diesel (TPHd) using the methods listed in the notes in Table 1. The laboratory analysis reports and chain of custody records are in Appendix B, Laboratory Analysis Reports and Chain of Custody Records.

Results of laboratory analysis of groundwater samples are summarized in Table 1. Selected analytical results are summarized below if the concentrations detected are greater than the method detection limit (MDL) for TPHg or TPHd; the California Department of Health (DHS) maximum contaminant levels (MCLs) for benzene, ethylbenzene, or total xylenes; or the DHS drinking water action level (DWAL) for toluene, as listed in table 1.

- A sheen developed in well MW-2 during purging, however, analytical results for TPHg and TPHd of a groundwater sample collected from the well were below saturation levels.
- Concentrations of TPHg were greater than the MDL in wells MW-2 and MW-3.
- Concentrations of TPHd were greater than the MDL in wells MW-2, MW-3, MW-5, and MW-6.
- Concentrations of benzene were greater than the MCL in well MW-2.

LIMITATIONS

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

Please call with any questions or comments regarding this report, please call (415) 382-7400.

Sincerely,
RESNA Industries Inc.



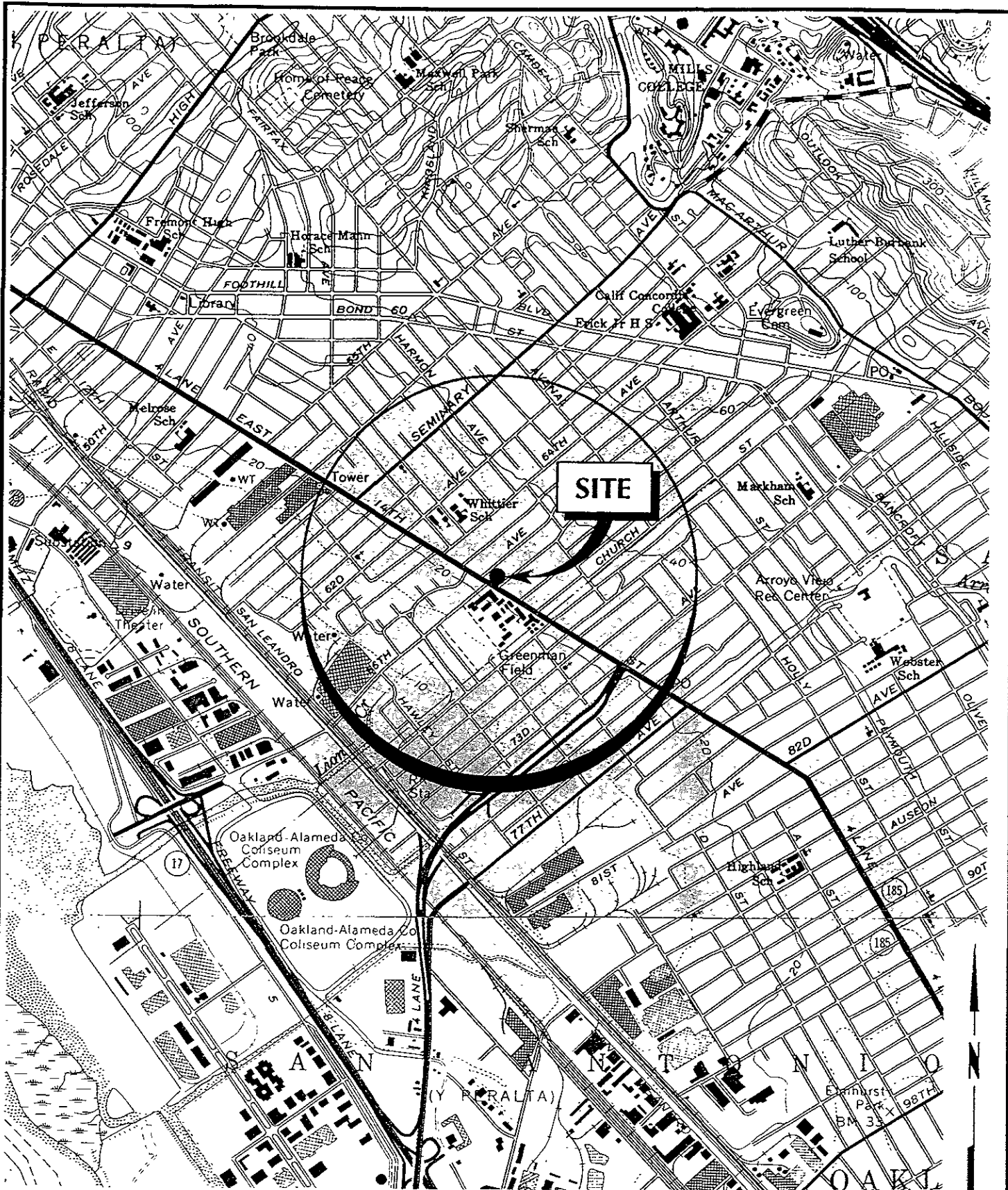
Mark P. Frye
Environmental Scientist



Michael L. Siembieda, RG 4007
Geoscience Manager



Attachments	Plate 1:	Site Vicinity Map
	Plate 2:	Groundwater Gradient and Chemical Concentrations (February 4, 1994)
	Table 1:	Cumulative Groundwater Monitoring And Sampling Data
	Appendix A:	Groundwater Sampling Protocol
	Appendix B:	Laboratory Analysis Reports and Chain of Custody Records



Source USGS Topographic Map, 7.5 minute series, Oakland East, Calif and San Leandro, Calif quadrangles 1980

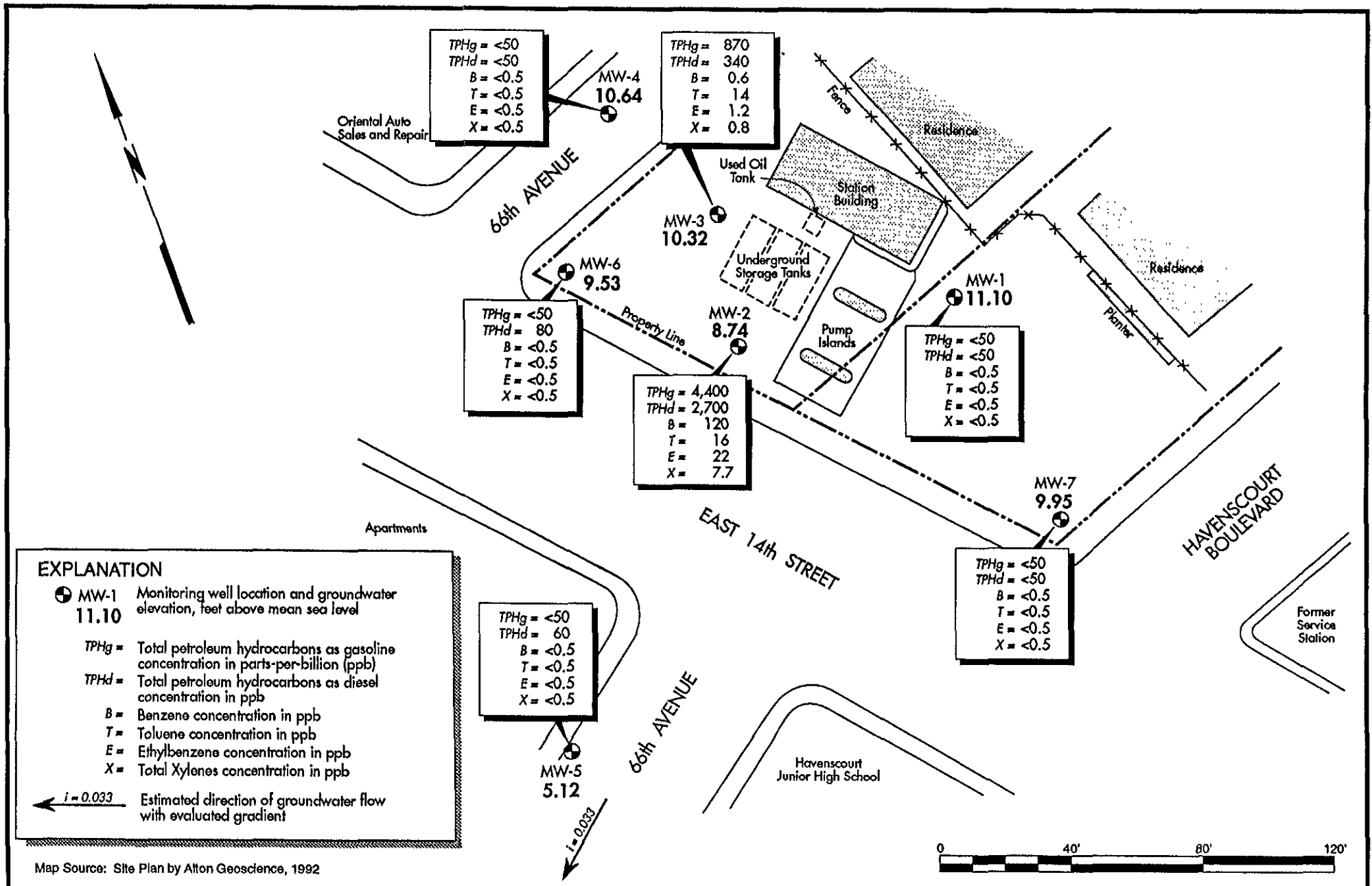
SITE VICINITY MAP
 Exxon Service Station No. 7-0236
 6630 East 14th Street
 Oakland, California

PLATE
1

PROJECT NO. 170079.01

1/94





Map Source: Site Plan by Alton Geoscience, 1992

GROUNDWATER GRADIENT and CHEMICAL CONCENTRATIONS

February 4, 1994

Exxon Service Station No. 7-0236
6630 East 14th Street
Oakland, California

PLATE

2

RESNA

PROJECT NO. 170079.01

2/94

TABLE 1
CUMULATIVE GROUNDWATER MONITORING DATA
Exxon Station 7-0236
6630 East 14th
Oakland, California
(Page 1 of 3)

Well ID# (TOC)	Sampling Date	SUBJ <----->	DTW feet	Elev. <----->	TPHd <----->	TPHg <----->	B parts per billion	T parts per billion	E parts per billion	X parts per billion
MW-1 (20.20)	03/15/91	NR	7.44	12.76	--	<50	<0.3	0.5	0.3	1.3
	01/15/92 (H,T)	NR	10.60	9.60	<300	<50	<0.5	0.7	<0.5	0.9
	03/23/92 (H,T)	NR	6.38	13.82	<50	<50	<0.5	<0.5	<0.5	<0.5
	04/06/92	NR	7.55	12.65	--	--	--	--	--	--
	07/08/92 (H,T)	NR	9.85	10.35	<50	<50	<0.5	<0.5	<0.5	<0.5
	10/13/92 (H,T)	NR	12.95	7.25	<50	<50	<0.5	<0.5	<0.5	<0.5
	03/09/93	NP	7.38	12.82	<50	<50	<0.5	<0.5	<0.5	<0.5
	06/04/93	NP	8.55	11.65	<50	<50	<0.5	<0.5	<0.5	<0.5
	09/02/93	NP	10.85	9.35	<50	<50	<0.5	<0.5	<0.5	<0.5
	11/16/93	NP	12.43	7.77	<50	<50	<0.5	<0.5	<0.5	<0.5
	02/04/94	NP	9.10	11.10	<50	<50	<0.5	<0.5	<0.5	<0.5
MW-2 (19.15)	03/15/91 (H,T)	NR	9.05	10.10	120	1,700	190	2.6	12	64
	01/15/92 (H,T)	NR	11.60	7.55	1,000	6,800	81	<10	320	170
	03/23/92 (H,T)	NR	9.42	9.73	3,000	7,100	740	30	810	490
	04/06/92	NR	9.09	10.06	--	--	--	--	--	--
	07/08/92	NR	10.08	9.07	2,100	7,000	250	14	300	160
	10/13/92	NR	12.06	7.09	1,900	3,200	97	2.6	97	53
	03/09/93	sheen	9.71	9.44	--	--	--	--	--	--
	06/04/93	sheen	9.40	9.75	--	--	--	--	--	--
	09/02/93 (M)	sheen	10.46	8.69	3,700	11,000	210	18	260	59
	11/16/93 (M*)	NP	11.44	7.71	3,300	8,500	75	27	51	32
02/04/94	NP	10.41	8.74	2,700	4,400	120	16	22	7.7	
MW-3 (19.59)	03/15/91 (H,T)	NR	7.84	11.75	160	3,100	2.2	1.9	100	84
	01/15/92 (H,T)	NR	10.30	9.29	<300	250	0.7	6.8	1.5	1.5
	03/23/92 (H,T)	NR	6.84	12.75	440	640	<0.5	12	25	6.5
	04/06/92	NR	7.84	11.75	--	--	--	--	--	--
	07/08/92 (H,T)	NR	8.63	10.96	960	2,900	<0.5	2.6	12	63.7
	10/13/92 (H)	NR	12.10	7.49	400	1,100	5.5	<0.5	4.6	1.1
	03/09/93	sheen	9.05	10.54	--	--	--	--	--	--
	06/04/93	sheen	8.43	11.16	--	--	--	--	--	--
	09/02/93	NP	10.22	9.37	690	840	2.7	3.6	5.4	2.9
	11/16/93	NP	11.44	8.15	310	650	<0.5	11	7.7	2.4
	02/04/94	NP	9.27	10.32	340	870	0.6	14	1.2	0.8

See notes on page 3 of 3

TABLE 1
CUMULATIVE GROUNDWATER MONITORING DATA
Exxon Station 7-0236
6630 East 14th
Oakland, California
(Page 2 of 3)

Well ID# (TOC)	Sampling Date	SUBJ ←-----	DTW feet	Elev. ----->	TPHd ←-----	TPHg -----	B T E X parts per billion ----->			
							B	T	E	X
MW-4 (19.46)	04/06/92	NR	7.76	11.70	<50	<50	<0.5	<0.5	<0.5	<0.5
	07/08/92	NR	9.56	9.90	<50	<50	<0.5	<0.5	<0.5	<0.5
	10/13/92	NR	12.09	7.37	<80	<50	<0.5	<0.5	<0.5	<0.5
	03/09/93	NP	7.53	11.93	<50	<50	<0.5	<0.5	<0.5	<0.5
	06/04/93	NP	8.50	10.96	<50	<50	<0.5	<0.5	<0.5	<0.5
	09/02/93	NP	10.30	9.16	<50	<50	<0.5	<0.5	<0.5	0.5
	11/16/93 *	---	---	---	---	---	---	---	---	---
	02/04/94	NP	8.82	10.64	<50	<50	<0.5	<0.5	<0.5	<0.5
MW-5 (16.95)	04/06/92	NR	10.66	6.29	<50	<50	<0.5	<0.5	<0.5	<0.5
	07/08/92 *	---	---	---	---	---	---	---	---	---
	10/13/92	NR	15.02	1.93	<50	69	<0.5	<0.5	<0.5	<0.5
	03/09/93	NP	10.27	6.68	<50	<50	<0.5	<0.5	<0.5	<0.5
	06/04/93	NP	11.35	5.60	<50	<50	<0.5	<0.5	<0.5	<0.5
	09/02/93	NP	13.15	3.80	<50	<50	<0.5	<0.5	<0.5	<0.5
	11/16/93	NP	14.35	2.60	<50	<50	<0.5	<0.5	<0.5	<0.5
	02/04/94	NP	11.83	5.12	60	<50	<0.5	<0.5	<0.5	<0.5
MW-6 (18.79)	04/06/92 (H)	NR	8.29	10.50	<50	<50	<0.5	<0.5	<0.5	<0.5
	07/08/92 (H,T)	NR	9.22	9.57	<50	<50	<0.5	<0.5	<0.5	<0.5
	10/13/92	NR	11.51	7.28	<50	<50	<0.5	<0.5	<0.5	<0.5
	03/09/93	NP	8.26	10.53	<50	<50	<0.5	<0.5	<0.5	<0.5
	06/04/93	NP	8.90	9.89	<50	<50	<0.5	<0.5	<0.5	<0.5
	09/02/93	NP	9.92	8.87	60	<50	<0.5	<0.5	<0.5	<0.5
	11/16/93	NP	10.65	8.14	<50	<50	<0.5	<0.5	<0.5	<0.5
	02/04/94	NP	9.26	9.53	80	<50	<0.5	<0.5	<0.5	<0.5
MW-7 (19.23)	04/06/92	NR	8.34	10.89	<50	<50	<0.5	<0.5	<0.5	<0.5
	07/08/92	NR	10.30	8.93	<50	<50	<0.5	<0.5	<0.5	<0.5
	10/13/92	NR	12.91	6.32	94	670	0.8	<0.5	<0.5	2.5
	03/09/93 *	---	---	---	---	---	---	---	---	---
	06/04/93	NP	8.68	10.55	<50	<50	<0.5	<0.5	<0.5	<0.5
	09/02/93	NP	10.80	8.43	<50	<50	<0.5	<0.5	<0.5	<0.5
	11/16/93	NP	12.38	6.85	<50	<50	<0.5	<0.5	<0.5	<0.5
	02/04/94	NP	9.28	9.95	<50	<50	<0.5	<0.5	<0.5	<0.5

See notes on page 3 of 3

**TABLE 1
CUMULATIVE GROUNDWATER MONITORING DATA**

Exxon Service Station No. 7-0236

6630 East 14th

Oakland, California

(Page 3 of 3)

Well ID# (TOC)	Sampling Date	SUBJ < -----	DTW feet	Elev. > -----	TPHd < -----	TPHg -----	B parts per billion	T -----	E -----	X > -----
Maximum Contaminate Levels (MCLs) DHS					---	---	1.0	---	680	1,750
Drinking Water Action Level (DWAL) DHS					---	---	---	100	---	---

Notes:

- TOC = Elevation of top of well casing; related to mean sea level (MSL)
- SUBJ = Results of subjective evaluation, liquid phase hydrocarbon thickness (PT) in feet
- NP = Liquid phase hydrocarbons not present in well
- sheen = Liquid phase hydrocarbons present as a sheen
- NR = not recorded
- DTW = Depth to water
- Elev. = Elevation of groundwater; relative to MSL
Elev. = TOC - (DTW + (PT * 0.8))
- TPHg = Total petroleum hydrocarbons as gasoline analyzed using modified EPA method 5030/8015
- BTEX = Benzene, toluene, ethylbenzene, total xylene isomers analyzed using modified EPA method 5030/8020
- < = Less than the laboratory detection limit
- DHS = Department of Health Services, State of California, October 1990
- = Not sampled / Not measured
- * = Well not accessible : well obstructed / wellhead cover damaged / well paved over
- H = EPA Method 8010 compounds not detected at or above their respective laboratory detection limits
Exceptions: MW-2, 03/15/91, Methylene chloride detected at 1 ppb
MW-3, 03/15/91, Methylene chloride detected at 21 ppb
- M = Methyl tert-butyl ether detected at approximately 2,500 ppb
- M* = A compound suspected to be Methyl tert-butyl ether was present
- T = Total Oil and Grease (TOG) using EPA Method 5520 not detected at or above the laboratory detection limit of 5,000 ppb.

APPENDIX A
GROUNDWATER SAMPLING PROTOCOL

GROUNDWATERSAMPLINGPROTOCOL

The static water level and liquid phase hydrocarbons level, if present, in each well that contained water and/or liquid phase hydrocarbons are measured with a ORS Interface Probe Model No. 106801, which is accurate to the nearest 0.01 foot. To calculate groundwater elevations and evaluate groundwater gradient, depth to water (DTW) levels are subtracted from wellhead elevations and corrected for product thickness, when necessary, by multiplying product thickness (PT) by a correction factor 0.8 and subtracting from the DTW level (Adjusted DTW = DTW-[PT x 0.8])

Water samples collected for subjective evaluation are collected by gently lowering approximately half the length of a clean Teflon[®] bailer past the air-water interface (if possible) and collecting a sample from near the surface of the water in the well. The samples were checked for measurable separate phase hydrocarbon product or sheen. Any liquid phase hydrocarbons is removed from the well.

Before water samples are collected from the groundwater monitoring wells, the wells are purged until stabilization of the temperature, pH, and conductivity are obtained. Approximately three to four well casing volumes are purged before those characteristics stabilized. Water samples from the wells that do not obtain stability of the temperature, pH, and conductivity are considered to be "grab samples". The quantity of water purged from each well is calculated as follows:

1 well casing volume = $\pi r^2 h(7.48)$ where:

- r = radius of the well casing in feet.
- h = column of water in the well in feet (depth to bottom - depth to water)
- 7.48 = conversion constant from cubic feet to gallons

gallons of water purged/gallons in 1 well casing volume = well casing volumes removed.

After purging, each well was allowed to recharge to at least 80% of the initial water level. Water samples from wells that do not recover to at least 80% (due to slow recharging of the well) between purging and sampling are considered to be "grab samples". Water samples were collected with a Teflon bailer which had been cleaned with Alconox[®] and deionized water, and were carefully poured into 40-milliliter (ml) glass vials, which are filled so as to produce a positive meniscus. Each vial is preserved with hydrochloric acid, sealed with a cap containing a Teflon[®] septum, and subsequently examined for air bubbles to avoid headspace which would allow volatilization to occur. The samples are promptly transported in iced storage in a thermally-insulated ice chest, accompanied by a Chain of Custody Record, to a California-certified laboratory.

APPENDIX B

**LABORATORY ANALYSIS REPORTS
AND CHAIN OF CUSTODY RECORDS**

REPORT OF LABORATORY ANALYSIS

February 11, 1994

Mr. Mark Frye
RESNA
73 Digital Dr.
Novato, CA 94949

RE: PACE Project No. 440204.511
Client Reference: Exxon 7-0236 (EE)

Dear Mr. Frye:

Enclosed is the report of laboratory analyses for samples received February 04, 1994.

Footnotes are given at the end of the report.

If you have any questions concerning this report, please feel free to contact us.

Sincerely,

Carol Reid
for Stephanie Matzo
Project Manager

Enclosures



REPORT OF LABORATORY ANALYSIS

RESNA
 73 Digital Dr.
 Novato, CA 94949

February 11, 1994
 PACE Project Number: 440204511

Attn: Mr. Mark Frye

Client Reference: Exxon 7-0236 (EE)

PACE Sample Number: 70 0240743
 Date Collected: 02/04/94
 Date Received: 02/04/94

<u>Parameter</u>	<u>Units</u>	<u>MDL</u>	<u>MW-5</u>	<u>DATE ANALYZED</u>
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ORGANIC ANALYSIS

PURGEABLE FUELS AND AROMATICS

TOTAL FUEL HYDROCARBONS, (LIGHT):			-	02/08/94
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND	02/08/94
PURGEABLE AROMATICS (BTXE BY EPA 8020M):			-	02/08/94
Benzene	ug/L	0.5	ND	02/08/94
Toluene	ug/L	0.5	ND	02/08/94
Ethylbenzene	ug/L	0.5	ND	02/08/94
Xylenes, Total	ug/L	0.5	ND	02/08/94

EXTRACTABLE FUELS EPA 3510/8015

Extractable Fuels, as Diesel	mg/L	0.05	0.06	02/09/94
Date Extracted			02/08/94	

Mr. Mark Frye
 Page 2

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PACE Sample Number: 70 0240751
 Date Collected: 02/04/94
 Date Received: 02/04/94
 Client Sample ID: MW-4

<u>Parameter</u>	<u>Units</u>	<u>MDL</u>	<u>DATE ANALYZED</u>
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ORGANIC ANALYSIS

PURGEABLE FUELS AND AROMATICS

TOTAL FUEL HYDROCARBONS, (LIGHT):			-	02/08/94
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND	02/08/94
PURGEABLE AROMATICS (BTXE BY EPA 8020M):			-	02/08/94
Benzene	ug/L	0.5	ND	02/08/94
Toluene	ug/L	0.5	ND	02/08/94
Ethylbenzene	ug/L	0.5	ND	02/08/94

Xylenes, Total	ug/L	0.5	ND	02/08/94
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EXTRACTABLE FUELS EPA 3510/8015

Extractable Fuels, as Diesel	mg/L	0.05	ND	02/09/94
Date Extracted			02/08/94	

Mr. Mark Frye
 Page 3

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PACE Sample Number: 70 0240760
 Date Collected: 02/04/94
 Date Received: 02/04/94
 Client Sample ID: MW-6

<u>Parameter</u>	<u>Units</u>	<u>MDL</u>		<u>DATE ANALYZED</u>
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ORGANIC ANALYSIS

PURGEABLE FUELS AND AROMATICS

TOTAL FUEL HYDROCARBONS, (LIGHT):			-	02/10/94
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND	02/10/94
PURGEABLE AROMATICS (BTXE BY EPA 8020M):			-	02/10/94
Benzene	ug/L	0.5	ND	02/10/94
Toluene	ug/L	0.5	ND	02/10/94
Ethylbenzene	ug/L	0.5	ND	02/10/94
Xylenes, Total	ug/L	0.5	ND	02/10/94

EXTRACTABLE FUELS EPA 3510/8015

Extractable Fuels, as Diesel	mg/L	0.05	0.08	02/09/94
Date Extracted			02/08/94	

Mr. Mark Frye
 Page 4

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PACE Sample Number: 70 0240778
 Date Collected: 02/04/94
 Date Received: 02/04/94
 Client Sample ID: MW-7
 Parameter

Units MDL DATE ANALYZED

ORGANIC ANALYSIS

PURGEABLE FUELS AND AROMATICS

TOTAL FUEL HYDROCARBONS, (LIGHT):			-	02/10/94
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND	02/10/94
PURGEABLE AROMATICS (BTXE BY EPA 8020M):			-	02/10/94
Benzene	ug/L	0.5	ND	02/10/94
Toluene	ug/L	0.5	ND	02/10/94
Ethylbenzene	ug/L	0.5	ND	02/10/94
Xylenes, Total	ug/L	0.5	ND	02/10/94

EXTRACTABLE FUELS EPA 3510/8015

Extractable Fuels, as Diesel	mg/L	0.05	ND	02/09/94
Date Extracted			02/08/94	

Mr. Mark Frye
 Page 5

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PACE Sample Number: 70 0240786
 Date Collected: 02/04/94
 Date Received: 02/04/94
 Client Sample ID: MW-1

<u>Parameter</u>	<u>Units</u>	<u>MDL</u>		<u>DATE ANALYZED</u>
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ORGANIC ANALYSIS

PURGEABLE FUELS AND AROMATICS

TOTAL FUEL HYDROCARBONS, (LIGHT):			-	02/10/94
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND	02/10/94
PURGEABLE AROMATICS (BTXE BY EPA 8020M):			-	02/10/94
Benzene	ug/L	0.5	ND	02/10/94
Toluene	ug/L	0.5	ND	02/10/94
Ethylbenzene	ug/L	0.5	ND	02/10/94
Xylenes, Total	ug/L	0.5	ND	02/10/94

EXTRACTABLE FUELS EPA 3510/8015

Extractable Fuels, as Diesel	mg/L	0.05	ND	02/09/94
Date Extracted			02/08/94	

Mr. Mark Frye
 Page 6

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PACE Sample Number: 70 0240794
 Date Collected: 02/04/94
 Date Received: 02/04/94
 Client Sample ID: MW-2

<u>Parameter</u>	<u>Units</u>	<u>MDL</u>	<u>DATE ANALYZED</u>
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ORGANIC ANALYSIS

PURGEABLE FUELS AND AROMATICS

TOTAL FUEL HYDROCARBONS, (LIGHT):				02/10/94
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	250	4400	02/10/94
PURGEABLE AROMATICS (BTXE BY EPA 8020M):				02/10/94
Benzene	ug/L	2.5	120	02/10/94
Toluene	ug/L	2.5	16	02/10/94
Ethylbenzene	ug/L	2.5	22	02/10/94

Xylenes, Total	ug/L	2.5	7.7	02/10/94
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EXTRACTABLE FUELS EPA 3510/8015

Extractable Fuels, as Diesel	mg/L	0.05	2.7	02/09/94
Date Extracted			02/08/94	

Mr. Mark Frye
 Page 7

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PACE Sample Number: 70 0240808
 Date Collected: 02/04/94
 Date Received: 02/04/94
 Client Sample ID: MW-3

<u>Parameter</u>	<u>Units</u>	<u>MDL</u>	<u>DATE ANALYZED</u>
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ORGANIC ANALYSIS


PURGEABLE FUELS AND AROMATICS

TOTAL FUEL HYDROCARBONS, (LIGHT):				
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	870	02/10/94
PURGEABLE AROMATICS (BTXE BY EPA 8020M):				
Benzene	ug/L	0.5	0.6	02/10/94
Toluene	ug/L	0.5	14	02/10/94
Ethylbenzene	ug/L	0.5	1.2	02/10/94
Xylenes, Total	ug/L	0.5	0.8	02/10/94

EXTRACTABLE FUELS EPA 3510/8015

Extractable Fuels, as Diesel	mg/L	0.05	0.34	02/09/94
Date Extracted			02/08/94	

These data have been reviewed and are approved for release.


 Darrell C. Cain
 Regional Director

Mr. Mark Frye
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FOOTNOTES
for pages 1 through 7

February 11, 1994
PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

MDL Method Detection Limit
ND Not detected at or above the MDL.

Mr. Mark Frye
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QUALITY CONTROL DATA

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

EXTRACTABLE FUELS EPA 3510/8015

Batch: 70 28215

Samples: 70 0240743, 70 0240751, 70 0240760, 70 0240778, 70 0240786
 70 0240794, 70 0240808

METHOD BLANK:

Parameter	Units	MDL	Method Blank
Extractable Fuels, as Diesel	mg/L	0.05	ND

LABORATORY CONTROL SAMPLE AND CONTROL SAMPLE DUPLICATE:

Parameter	Units	MDL	Reference Value	Recv	Dupl Recv	RPD
Extractable Fuels, as Diesel	mg/L	0.05	1.00	70%	68%	2%

Mr. Mark Frye
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QUALITY CONTROL DATA

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PURGEABLE FUELS AND AROMATICS

Batch: 70 28141

Samples: 70 0240760, 70 0240778, 70 0240786, 70 0240794

METHOD BLANK:

Parameter	Units	MDL	Method Blank
TOTAL FUEL HYDROCARBONS, (LIGHT):			-
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND
PURGEABLE AROMATICS (BTXE BY EPA 8020M)			-
Benzene	ug/L	0.5	ND
Toluene	ug/L	0.5	ND
Ethylbenzene	ug/L	0.5	ND
Xylenes, Total	ug/L	0.5	ND

SPIKE AND SPIKE DUPLICATE:

Parameter	Units	MDL	700238439	Spike	Spike Recv	Spike Dupl Recv	RPD
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND	1000	97%	94%	3%
Benzene	ug/L	0.5	ND	100	96%	97%	1%
Toluene	ug/L	0.5	ND	100	96%	97%	1%
Ethylbenzene	ug/L	0.5	ND	100	100%	100%	0%
Xylenes, Total	ug/L	0.5	ND	300	98%	98%	0%

LABORATORY CONTROL SAMPLE AND CONTROL SAMPLE DUPLICATE:

Parameter	Units	MDL	Reference Value	Recv	Dupl Recv	RPD
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	1000	78%	77%	1%
Benzene	ug/L	0.5	100	93%	100%	7%
Toluene	ug/L	0.5	100	98%	96%	2%
Ethylbenzene	ug/L	0.5	100	95%	99%	4%
Xylenes, Total	ug/L	0.5	300	94%	98%	4%

Mr. Mark Frye
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QUALITY CONTROL DATA

February 11, 1994
 PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

PURGEABLE FUELS AND AROMATICS

Batch: 70 28156
 Samples: 70 0240743, 70 0240751

METHOD BLANK:

Parameter	Units	MDL	Method Blank
TOTAL FUEL HYDROCARBONS, (LIGHT):			-
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	ND
PURGEABLE AROMATICS (BTXE BY EPA 8020M)			-
Benzene	ug/L	0.5	ND
Toluene	ug/L	0.5	ND
Ethylbenzene	ug/L	0.5	ND
Xylenes, Total	ug/L	0.5	ND

LABORATORY CONTROL SAMPLE AND CONTROL SAMPLE DUPLICATE:

Parameter	Units	MDL	Reference Value	Recv	Dupl Recv	RPD
Purgeable Fuels, as Gasoline (EPA 8015M)	ug/L	50	1000	99%	100%	1%
Benzene	ug/L	0.5	40	103%	101%	1%
Toluene	ug/L	0.5	40	100%	99%	1%
Ethylbenzene	ug/L	0.5	40	102%	96%	6%
Xylenes, Total	ug/L	0.5	120	103%	98%	4%

Mr. Mark Frye
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FOOTNOTES
for pages 9 through 11

February 11, 1994
PACE Project Number: 440204511

Client Reference: Exxon 7-0236 (EE)

MDL Method Detection Limit
ND Not detected at or above the MDL.
RPD Relative Percent Difference



EXXON COMPANY, U.S.A.

P.O. Box 4415, Houston, TX 77210-4415

CHAIN OF CUSTODY

440204.511

Novato, CA, 11 Digital Drive, 94949
(415) 883-6100

Huntington Beach, CA, 5702 Bolsa Avenue, 92649
(714) 892-2565



Page 1 of 1

Consultant's Name: RESNA Address: 73 DIGITAL DR. Site Location: OAKLAND

Project #: _____ Consultant Project #: 170079.01 Consultant Work Release #: 09300640

Project Contact: MARK FINE Phone #: 382-7400 Fax #: _____ Laboratory Work Release #: _____

EXXON Contact: MARIA GUENSER EE C&M Phone #: _____ Fax #: _____ EXXON RAS #: 7-0236

Sampled by (print): STEPHEN LEACH Sampler's Signature: [Signature]

Shipment Method: HAND DELIVER Air Bill #: _____ Shipment Date: _____

TAT: 24 hr 48 hr 72 hr Standard (5 day) ANALYSIS REQUIRED

Sample Description	Collection Date/Time	Matrix Soil/Water	Prsv	# of Cont	PACE Sample #	TPH/GAS/BTEX EPA 801.5/8020	TPH/Diesel EPA 8015	TRPH EPA 418.1	ANALYSIS REQUIRED										Sample Condition as Received		COMMENTS		
									Temp °C	Cooler #	Inbound Seal Yes No	Outbound Seal Yes No											
MW-5	2/4/11:35	WATER	HCL	4	24074.3	X	X																1 LITER 3 VOA'S
MW-4	2/4/12:50			4	24075.1	X	X																NO PSES
MW-6	2/4/2:05			4	24076.0	X	X																
MW-7	2/4/3:10			4	24077.8	X	X																
MW-1	2/4/3:50			4	24078.6	X	X																
MW-2	2/4/4:38			4	24079.4	X	X																
MW-3	2/4/5:20			4	24080.8	X	X																

Relinquished by/Affiliation: [Signature] Date: 2/4/94 Time: 5:50 Accepted by/Affiliation: Steve McIsaac PACE Date: 2/4/94 Time: 5:50 Additional Comments: 1015, C/3