

WESTERN GEO-ENGINEERS

CALIF. CONTRACTOR #513857 REGISTERED GEOLOGISTS 1386 EAST BEAMER STREET WOODLAND CA 95776-6003 (530) 668-5300, FAX (530) 662-0273 Wege@mother.com

April 23, 1998

Mr. John Rutherford Desert Petroleum Inc. P.O. Box 1601 Oxnard, California 93032 (805) 644-6784 FAX (805) 654-0720

RE: February 1998 Quarterly Groundwater Sampling Report for Former Desert Petroleum Station #796, 2844 Mountain Boulevard, Oakland, California.

Dear Mr. Rutherford:

As you requested Western Geo-Engineers (WEGE) has performed the quarterly monitoring/sampling of this site. The following report represents WEGE's February 1998 Quarterly Groundwater.

INTRODUCTION

A WEGE sample technician monitored and sampled the four existing groundwater monitoring wells on February 25, 1998. During this site visit, free product was found in RS-1.

LOCATION

The site is an operating "Compare Price Gas Station" that retails regular unleaded, super-unleaded gasoline and diesel. The site is located East of Highway 13 at 2844 Mountain Blvd., Oakland, California, west of Joaquin Miller Park.

GROUNDWATER SAMPLING

Table 1 is a summary of groundwater monitoring of this site since May 1990. The most recent sampling/monitoring, February 25, 1998 found 0.01 feet of free product in monitor well RS-1. RS-2 continues to contain high levels of Methyl tertiary Butyl Ether (MTBE), 330 mg/L, which was confirmed using EPA Method 8260. RS-3 and RS-4 contain minor amounts of dissolved gasoline range hydrocarbons, see Appendix A for Laboratory report and Table 1 with Charts showing historic TPHg and MTBE levels for the wells.

GROUNDWATER GRADIENT "FLOW DIRECTION"

Figure 4 depicts groundwater elevations as measured on February 25, 1998. This figure show a gradient flow predominantly to the southeast with flow also occurring to the northwest, due to a groundwater high located at RS-1.

To evaluate the lateral extent of free product beneath the site a workplan was developed and approved (December 10, 1996) to perform a soil probe survey (SPS). The SPS was conducted on January 17, 1997 with findings submitted February 27, 1997 as part of the Interim Remedial Workplan.

MTBE

The charts presented with Table 1 show that MTBE was present in the groundwater since June 1995. The ratio as compared to gasoline concentrations in groundwater indicate that a leak was occurring at that time with substantial increases in September 1996, May 1997 and November 1997. Concern of the increasing MTBE prompted a site visit on August 6, 1997. A WEGE geologist interviewed the site owner, Mr. Sharahn Shenazi, concerning what may be the cause of elevated MTBE found during quarterly sampling. Mr. Shenazi felt that the MTBE was introduced to the groundwater during washing down of the station. The wash water would drain to the water meter box which is depressed in the station asphalt down slope of the pump islands, see Figure 3. Mr. Shenazi stated that he has had no inventory losses and that the product lines are double contained and the leak detectors indicate everything is fine. The three existing tanks are single walled steel and have been recently lined. During testing of the tanks prior to lining one tank (diesel tank) showed a pressure increase but then tested fine, see September 1997 Quarterly Report.

The water meter box was inspected. The bottom of the box was not sealed and open to the subsurface, no odors were present and field screening with a MiniRae PID showed only 0.5 ppmv existed in the soils beneath the water meter. A soil sample was obtained at approximately one foot beneath the station surface and approximately six inches below the water meter and chain of custody delivered to North State Environmental Analytical Laboratory (NSE). NSE analyzed the soil sample for Total Petroleum Hydrocarbons as gasoline (TPHg), Benzene, Toluene, Ethylbenzene, Xylenes (BTEX) and MTBE. The laboratory results showed 1.9 mg/Kg of TPHg, trace amounts of BTEX and MTBE below laboratory lower detection limits.

DISCUSSION

Free phase floating product exists at RS-1 and on August 6, 1997 at Soil Probe Hole M7. MTBE shown a dramatic increase in concentration at RS-2 in September 1996, which coincides with the first measurable presence of free phase floating product in RS-1. The stations washing practices drains the wash water to the water meter box. The soil sample obtained beneath the water meter box was below laboratory lower detection limits for MTBE. This certainly suggest that the MTBE influence was not caused by the "wash down" procedures. An interview with the station owner indicated that the existing three underground storage tanks are single walled steel and have recently

been lined. The product dispensing piping is double walled and leak detectors have not indicated any leaks.

Based on the laboratory analysis results Western Geo-Engineers feels that a new release has occurred or is occurring at this site and is the source for gasoline with MTBE being introduced into the shallow groundwater.

RECOMMENDATIONS

- 1. All tank and line tightness tests should be review from early 1995 to the present.
- 2. Review of tanks lining test procedures and comments.
- 3. Conduct a line tightness test.
- 4. Check continuity and integrity of vapor return lines and system.
- 5. Check integrity of overspill system.
- 6. Review inventory records from January 1995 to the present.
- 7. Relieve Desert Petroleum Inc. of involvement as a responsible party based on the following:
 - Desert Petroleum Inc. does not own or operate the site and has no control on how the site is operated and managed
 - Desert Petroleum Inc. has actively investigated and remediated this site since May 1990, with reasonable contaminant decline until mid 1994, see Tables 1 with associated graphs. This decline, projected, would have allowed site closure by mid 1996.
 - Desert Petroleum Inc. has performed source removal on four different occasions:
 - a. July 1989 excavated and removed gasoline-tainted soils from west and southwest of the UST's.
 - b. April 1994 removed the waste oil UST and limited over-excavation and removal of oil and gasoline tainted soils.
 - c. Performed vapor extraction and groundwater treatment using the RSI S.A.V.E.
 - d. October December 1996 interim free product removal at RS-1 removing 30.4 gallons of gasoline and 1077 gallons of gasoline tainted groundwater.

TIME FRAME

May 1998

Monitoring and sampling groundwater from wells RS-1, RS-2, RS-3 and RS-4.

HEALTH AND SAFETY

This site is being treated as a class D site, normal common sense is to be used.

SAMPLE METHODS

A WEGE technician working directly under California Registered Geologist #3037 using approved methods gauged, purged and sampled the monitor wells on September 2, 1997, see Appendix B.

SAMPLE PRESERVATION.

Each sample was placed into two, certified clean, glass, 40 ml VOAs with laboratory installed HCl preservative. The samples were then labeled and place on ice and Chain of Custody delivered to North State Environmental laboratories.

ANALYTICAL METHODS AND DHS LABORATORY SELECTED.

WEGE contracted North State Environmental (NSE), (ELAP Certificate No. 1753), P.O. Box 5624, South San South San Francisco, CA. 94083 (415) 588-2838, to perform the analysis of the groundwater samples.

NSE analyzed the samples for Total Petroleum Hydrocarbons as gasoline (TPHg) w/ BTEX distinction utilizing EPA Methods 8020 (GCFID) with 3050 extraction method as described on page 17, Table 2 of the TRI-REGIONAL BOARD STAFF RECOMMENDATIONS FOR PRELIMINARY EVALUATION AND INVESTIGATION OF UNDERGROUND TANK SITES, 10 AUGUST 1990.

NSE noted that Methyl tertiary-Butyl Ether (MTBE) was evident in all samples. MTBE was confirmed for samples RS-2 RS-3 and RS-4 by EPA method 8260, see Table 1 and Appendix B. The detection limits in water are: TPH-G, 50 ug/L; Benzene, Toluene, Ethylbenzene and MTBE, 0.5 ug/L; Xylenes, 2 ug/L.

RINSEATES AND PURGED GROUNDWATER STORAGE/TREATMENT.

All rinseates and purged water produced from the groundwater sampling and weekly purging of the wells is transferred into 55 gallon DOT H17 drums for later removal (April 2, 1998), by Evergreen Services to be recycled, see Appendix C.

LIMITATIONS

The information presented in this report is based on the following:

- 1. The observations and data collected by field personnel.
- 2. The results of laboratory analyses performed by a state certified analytical laboratory.
- 3. Our understanding of the regulations of Alameda County, the City of Oakland and the State of California.
- 4. References reviewed for this report.

Changes in groundwater conditions can occur due to variations in rainfall, temperature, local and regional water use, and local construction practices. In addition, variations in the soil and groundwater conditions could exist beyond the points explored in this investigation.

State Certified Laboratory analytical results are included in this report. This laboratory follows EPA and State of California approved procedures; however, WEGE is not responsible for errors in these laboratory results.

The services performed by Western Geo-Engineers, a corporation under California Registered Geologist #3037 and/or Contractors License #513857, have been conducted in a manner consistent with the level of care and skill ordinarily exercised by members of our profession currently practicing under similar conditions in the State of California, the City of Oakland and Alameda County. Our work and/or supervision of remediation and/or abatement operations, active or preliminary at this site is no way meant to imply that we are owners or operators of this site. Please note that the known contamination of soil and/or groundwater must be reported to the appropriate agencies in a timely manner. No other warranty expressed or implied is made.

Sincerely yours,

George L. Converse

cc:

Project Manager/Geologist-WEGE

JACK E.
NAPPER
No. 3037

Jack E. Napper

Calif. Reg. Geologist

Mr. Scott Seary, Alameda County Health (510) 567-6774

Mr. Leroy Griffin, City of Oakland

TABLE 1
SUMMARY OF GROUNDWATER MONITORING
DP796
2844 MOUNTAIN BOULEVARD, OAKLAND, CALIFORNIA 94602

LL	DATE				FREE	GROUND	ТРН			ETHYL-			SAMPLE
	•	ŧ i	TO TOP	TOP	PRODUCT	WATER	GASOLINE	BENZENE	TOLUENE	BENZENE	XYLENES	MTBE	BY
			FLUID	WATER	THICKNESS	ELEVATION	mg/L	ug/L	ug/L	ug/L	ug/L	mg/L	
-1	MAY-90	689.25	7.2	7.2	0.00	682.05	2.7	370	420	40	320		RSI
	MAY-91	689.25	8.35	8.35	0.00	680.9	1.3	580	130	62	240		RSI
	OCT91	689.17	10.22	10.22	0.00	678.95	1.1	140	100	45	210		RSI
	JAN92	689.17	8.06	8.06	0.00	681.11	1.7	9.9	31	9.7	170		RSI
	JAN93	689.17	5.3	5.3	0.00	683.87	3.7	650	9.2	51	170	-	RSI
	AUG93	689.17	8.56	8.56	0.00	680.61	0.9	14	0.6	2.1	8		RSI
	NOV - 93	689.17	8.44	8.44	0.00	680.73	1.4	9.6	ND	0.9	5		RSI
	Jan-94	689,17	6.88	6.88	0.00	682.29	4.2	95	3.1	58	130		RSI
1	May-94	675.63	7.87	7.87	0.00	667.76	7.5	270	11	37	96		RSI
	Aug-94	675.63	16.28	16.28	0.00	659.35	0.13	12	0.5	2.6	5		RSI
	Nov-94	675.63	8.02	8.02	0.00	667.61	0.27	4.7	0.7	0.6	15		RSI
	Feb-95	675.63	6.51	6.51	0.00	669.12	12	81	2.3	1	12		RSI
	Jun-95	675.63	7.34	7.34	0.00	668.29	37	460	ND	ND	ND	63	RSI
	Nov-95	675.63	8.71	8.71	0.00	666.92	ND	660	16	140	330	31	RSI
	Feb- 96	675.63	6.95	6.95	0.00	668.68	66	110	ND	12	21	84	RSI
	09/18/96	675.63	8.44	8.52	0.08	667.17	ONE INCH	FREE PRODU	CT				WEGE
	12/11/96	675.63	6.42	6.62	0.20	669.17	79	4000	37000	8000	45000	220	WEGE*
	02/21/97	675.63	6.88	6.92	0.04	668.74	1/2 INCH 1	FLOATING P	RODUCT				WEGE
	05/28/97	675.63	7.88	7.96	0.08	667.73	156	9400	51000	7000	45000	112	WEGE*
	09/02/97	675.63	8.34	8.38	0.04	667.28	1/2 INCH 1	FLOATING P	RODUCT				WEGE*
	11/24/97	675.63	6.98	7	0.02	668.65	1/4 INCH	FLOATING P	RODUCT				WEGE*
ו	02/25/98	675.63	3.51	3.52	0.01	672.12	1/8 INCH	FLOATING P	RODUCT			· · · · · · · · ·	WEGE'

DP796 - RS1

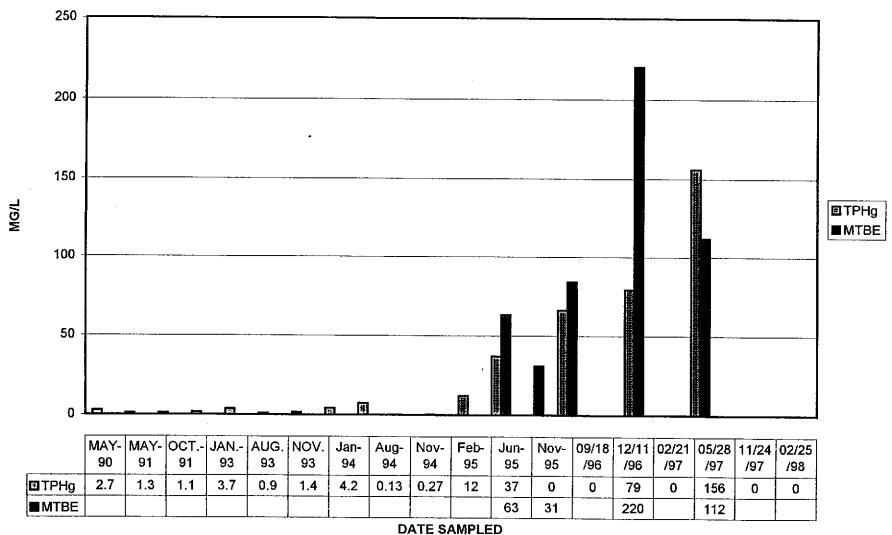
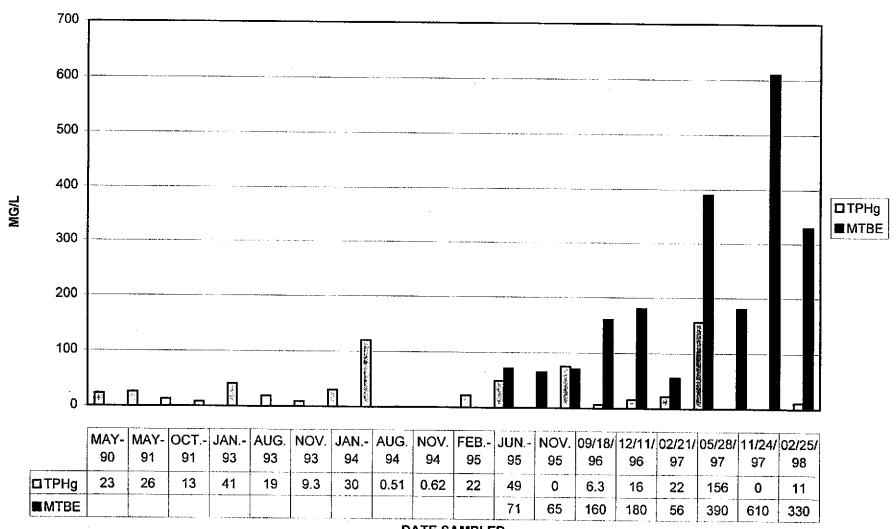


TABLE 1
SUMMARY OF GROUNDWATER MONITORING
DP796
2844 MOUNTAIN BOULEVARD, OAKLAND, CALIFORNIA 94602

WELL	DATE	CASING ELEVATION	DEPTH TO TOP FLUID	тор	FREE PRODUCT THICKNESS	GROUND WATER ELEVATION	TPH GASOLINE mg/L	BENZENE ug/L	TOLUENE ug/L	ETHYL- BENZENE ug/L	XYLENES ug/L	MTBE mg/L	SAMPLED BY
RS-2	MAY~90	689	7,06	7.06	0.00	681.94		7000					
	MAY-91	689	7.14	7.14	0.00		23	7200	4800	300	3300		RSI
	OCT91	688.89	8.84	8.84		681.86	26	14000	1800	750	2900		RSI
	JAN92	688,89	7.34	7.34	0.00	680.05	13	4300	910	300	2300		RSI
	JAN - 93				0.00	681.55	8.3	1800	920	140	1700		RSI
	AUG 93	688.89	4.1	4.1	0.00	684.79	41	7000	210	1200	4200		RSI
		688.89	7.32	7.32	0.00	681.57	19	5300	62	810	1600		RSI
	NOV 93	688.89	7.34	7.34	0.00	681.55	9.3	2400	3.9	46	800		RSI
	JAN 94	688.89	5.52	5.52	0.00	683.37	30	4900	ND	880	2600	_	RSI
	MAY-94	675.25	6.4	6.4	0.00	668.85	120	3300	330	ND	2200		RSI
	AUG 94	675.25	22.11	22.11	0.00	653.14	0.51	7.3	3.8	3.5	32		RSI
	NOV 94	675.25	9.82	9.82	0.00	665.43	0.62	6.6	3.9	1.1	47		RSI
	FEB95	675.25	4.81	4.81	0.00	670.44	22	228	80	2	463		RSI
	JUN95	675.25	5.8	5.8	0.00	669.45	49	1300	160	200	1600	71	RSI
	NOV95	675.25	7.64	7.64	0.00	667.61	ND	670	25	150	360	65	RSI
	FEB96	675.25	4.69	4.69	0.00	670.56	75	1400	170	59	460	71	RSI
	09/18/96	675.25	7.34	7.34	0.00	667.91	6.3	2000	48	350	570	160	WEGE
	12/11/96	675.25	5.08	5.08	0.00	670.17	16	2000	840	200	3200	180	WEGE
	02/21/97	675.25	5.42	5.42	0.00	669.83	22	2100	1300	600	5100	56	WEGE*
	05/28/97	675.25	6.4	6.4	0.00	668.85	156	4200	89	1000	6900	390	WEGE*
	09/02/97	675.25	6.93	6.93	0.00	668.32	ND	1300	25	360	1400	180	WEGE*
	11/24/97	675.25	5.93	5.93	0.00	669.32	ND	600	ND	ND	ND	610*	WEGE*
	02/25/98	675.25	4.59	4.59	0.00	670.66	11	1100	<50	320	2400	330*	WEGE*

DP796 - RS2



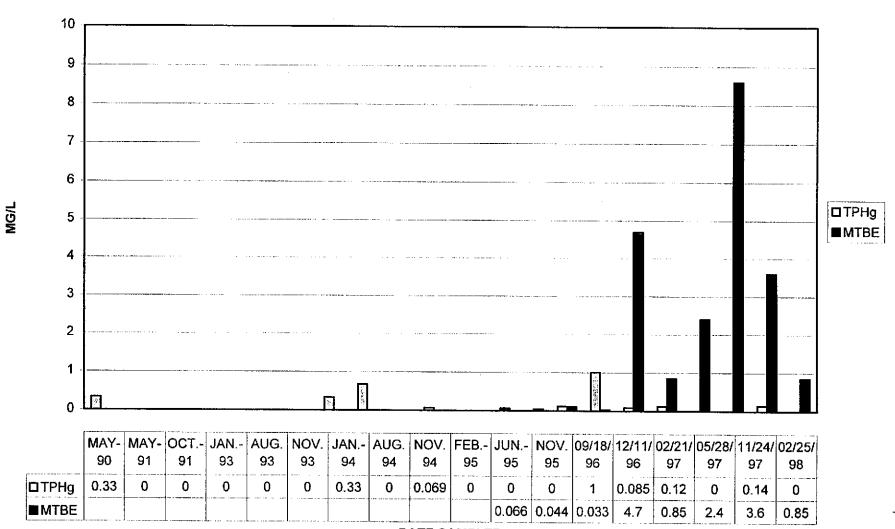
DATE SAMPLED

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TABLE 1 SUMMARY OF GROUNDWATER MONITORING DP796 2844 MOUNTAIN BOULEVARD, OAKLAND, CALIFORNIA 94602

WELL	DATE	CASING ELEVATION	то тор	тор	FREE PRODUCT	GROUND WATER	TPH GASOLINE	BENZENE	TOLUENE	ethyl- Benzene	XYLENES	MTBE	SAMPLED BY
			FLOID	WATER	THICKNESS	ELEVATION	mg/L	ug/L	ug/L	ug/L	ug/L	mg/L	
RS-3	MAY-90	670	6	б	0.00	664.00	0.33	2	i	1	150		RSI
	MAY-91	670	6.76	6.76	0.00	663.24	ND	0.4	ND	0.8	8		RSI
	OCT91	670	8.98	8.98	0.00	661.02	ND	ND	ND	ND	ND		RSI
	JAN92	670	6.81	6.81	0.00	663.19	ND	2.2	7.2	0.6	4	····	RSI
	JAN93	670		4.05	0.00	665.95	ND	ND	ND	. ND	ND	·····	RSI
	AUG 93	670		7.19	0.00	662.81	ND	30	6	2.4	5	- "	RSI
	NOV93	670	7.12	7.12	0.00	662.88	ND	4.8	0.4	0.6	2		RSI
	JAN94	670	5.42	5,42	0.00	664,58	0.33	25	3.2	3.9	12		RSI
	MAY-94	676.2	5.78	5.78	0.00	670.42	0.67	34	4	28	70		RSI
	AUG 94	676.2	5.86	5.86	0.00	670.34	ND	ND	ND	ND	ND		RSI
	NOV 94	676.2	5.08	5.08	0.00	671.12	0.069	2.5	3.1	1	4		RSI
	FEB 95	676.2	4.51	4.51	0.00	671.69	ND	0.3	0.4	ND	1		RSI
	JUN95	676.2	5.29	5.29	0.00	670.91	ND	ND	ND	ND	ND	0.066	RSI
	NOV95	676.2	7.1	7.1	0.00	669.10	ND	ND	ND	ND	ND	0.044	RSI
	FEB 96	676.2	4.48	4.48	0.00	671.72	0.12	ND	ND	ND	ND	0.11	RSI
	09/18/96	676.2	6.92	6.92	0.00	669.28	1	13	8.6	10	17	0.033	WEGE
	12/11/96	676.2	4.9	4.9	0.00	671.30	0.085	20	2	<0.5	14	4.7	WEGE
	02/21/97	676.2	4.94	4.94	0,00	671.26	0.12	5	2	2	6	0.85	WEGE*
	05/28/97	676.2	7.92	7.92	0.00	668.28	ND	6	ND	ND	ND	2.4	WEGE
	09/02/97	676.2	6.6	6.6	0.00	669.60	ND	0.9	ND	ND	ND	8.6	WEGE*
	11/24/97	676.2	5.89	5.89	0.00	670.31	0.14	13	2	1	12	3.6	WEGE*
	02/25/98	676.2	4.29	4.29	0.00	671.91	ND	ND	ND	ND	4	0.85*	WEGE*

DP796 - RS3



DATE SAMPLED

TABLE 1 SUMMARY OF GROUNDWATER MONITORING DP796 2844 MOUNTAIN BOULEVARD, OAKLAND, CALIFORNIA 94602

WELL	DATE	CASING ELEVATION	DEPTH TO TOP FLUID	DEPTH TO TOP WATER	FREE PRODUCT THICKNESS	GROUND WATER ELEVATION	TPH GASOLINE mg/L	BENZENE ug/L	TOLUENE ug/L	ETHYL- BENZENE ug/L	XYLENES ug/L	MTBE mg/L	SAMPLED BY
RS-4	MAY-90	689.06	8.34	8.34	0.00	680.72	0.44						· · · · · · · · · · · · · · · · · · ·
1	MAY-91	689.06	9.5	9.5	0.00	679.56		9	11	9	49		RSI
	OCT91	689.1	10.82	10.82	0.00	678.28	0.83	8	4	3	5		RSI
	JAN 92	689.1	9.31	9.31	0.00	679.79	0.63	280 34	120	24	170		RSI
	JAN93	689.1	6.89	6.89	0.00	682,21	0.62	34	8.3	2.1	21		RSI
İ	AUG 93	689.1	9,68	9.68	0.00	679.42		0.9	0.7	5.8	13		RSI
ļ.	NOV 93	689.1	9.83	9.83	0.00	679.27	ND	ND	ND	ND ND	0		RSI
	JAN 94	689.1	8.17	8.17	0.00	680.93	ND	1.7	ND	0.81	ND 2		RSI
	MAY-94	675.38	8.69	8.69	0.00	666.69	ND	ND	ND	ND	1		RSI RSI
	AUG 94	675.38	9.04	9.04	0.00	666.34	0.42	6.5	4.1	1.9	40		RSI
	NOV94	675.38	8	8	0,00	667.38	0.13	4.1	0.7	1.7	8		RSI
	FEB95	675.38	7.93	7.93	0.00	667.45	ND	6	1.2	3.5	13	 -	RSI
	JUN95	675.38	8.61	8.61	0.00	666.77	ND	ND	ND	ND	ND	0.069	RSI
	NOV 95	675.38	10.43	10.43	0.00	664.95	ND	ND	ND	ND	ND	0.047	RSI
	FEB96	675.38	7.44	7.44	0.00	667.94	0.96	ND	ND	0.6	ND	0.08	RSI
	09/18/96	675.38	9.58	9.58	0.00	665.80	<0.05	<0.5	<0.5	<0.5	<2	0.2	WEGE
	12/11/96	675.38	7.5	7.5	0.00	667.88	0.075	<0.5	0.6	<0.5	<2	0.104	WEGE
	02/21/97	675.38	8.26	8.26	0.00	667.12	ND	1	1	ND	1	0.19	WEGE*
	05/28/97	675.38	8.92	8.92	0.00	666.46	ND	6	ND	ND	ND	0.11	WEGE
	09/02/97	675.38	9.39	9.39	0.00	665.99	0.1	3	ND	ND	ND	0.039	WEGE*
	11/24/97	675.38	8.22	8.22	0.00	667.16	0.041	<0.5	2	<0.5	<2	0.21	WEGE*
	02/25/98	675.38	7.19	7.19	0.00	668.19	ND	3	ND	ND	ND	5.6*	WEGE*
WATER													
METER													
BOX							mg/Kg	mg/Kg	mg/Kg	mg/Kg	mg/Kg	mg/Kg	
L	08/06/97	SOIL AT ONE	FOOT DEPT	TH BELOW ST	JR F ACE		1900	0.45	0.6	6.5	9.9	ND	WEGE

MTBE Methyl t-Butyl Ether

TPH Total Petroleum Hydrocarbons

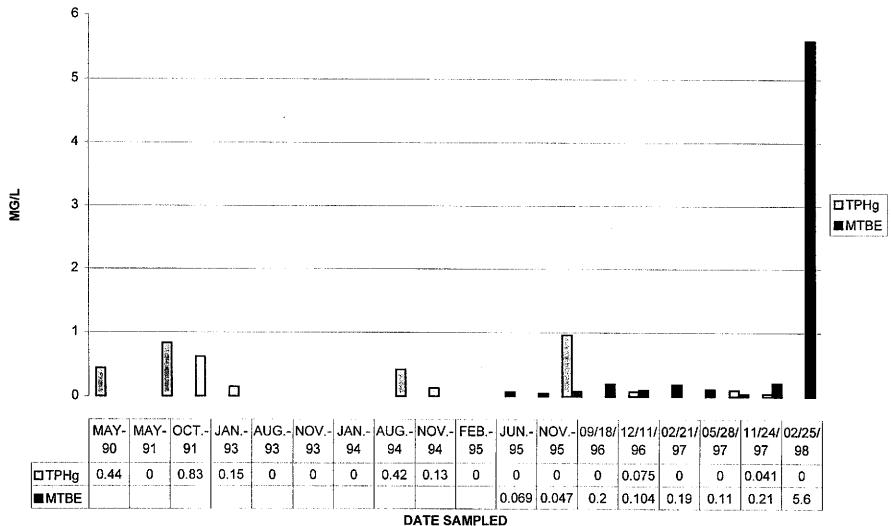
mg/L Milligrams per liter (ppm)

ND or < Below laboratory detection limits

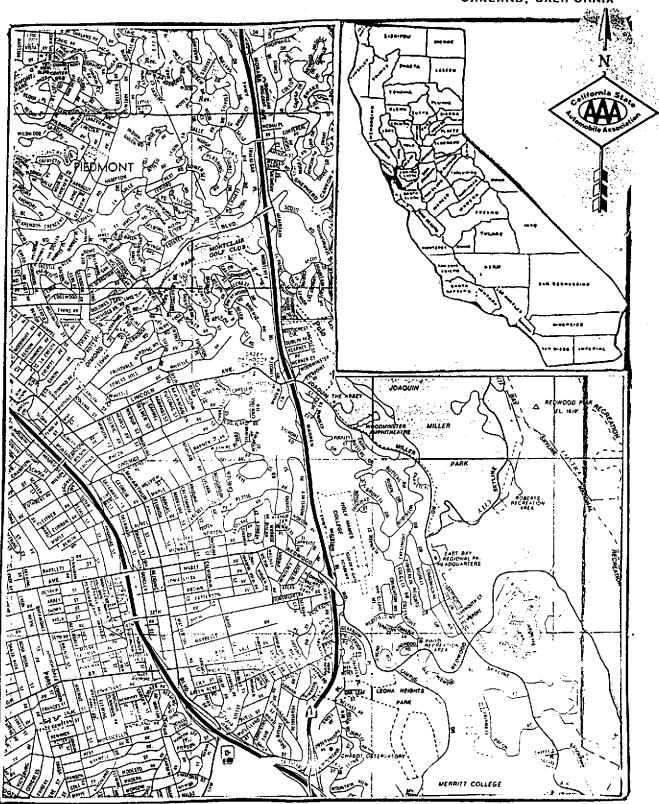
ug/L Micrograms per liter (ppb)

^{*} MTBE confirmed by GC/MS 8260 method.

DP796 - RS4



FORMER DESERT PETROLEUM #796 2844 MOUNTAIN BOULEVARD OAKLAND, CALIFORNIA

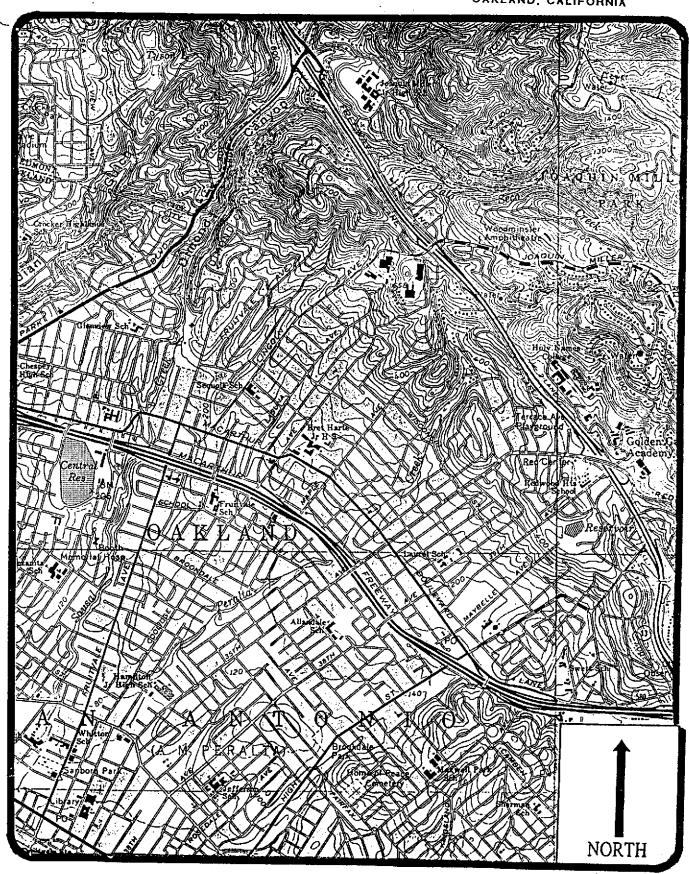


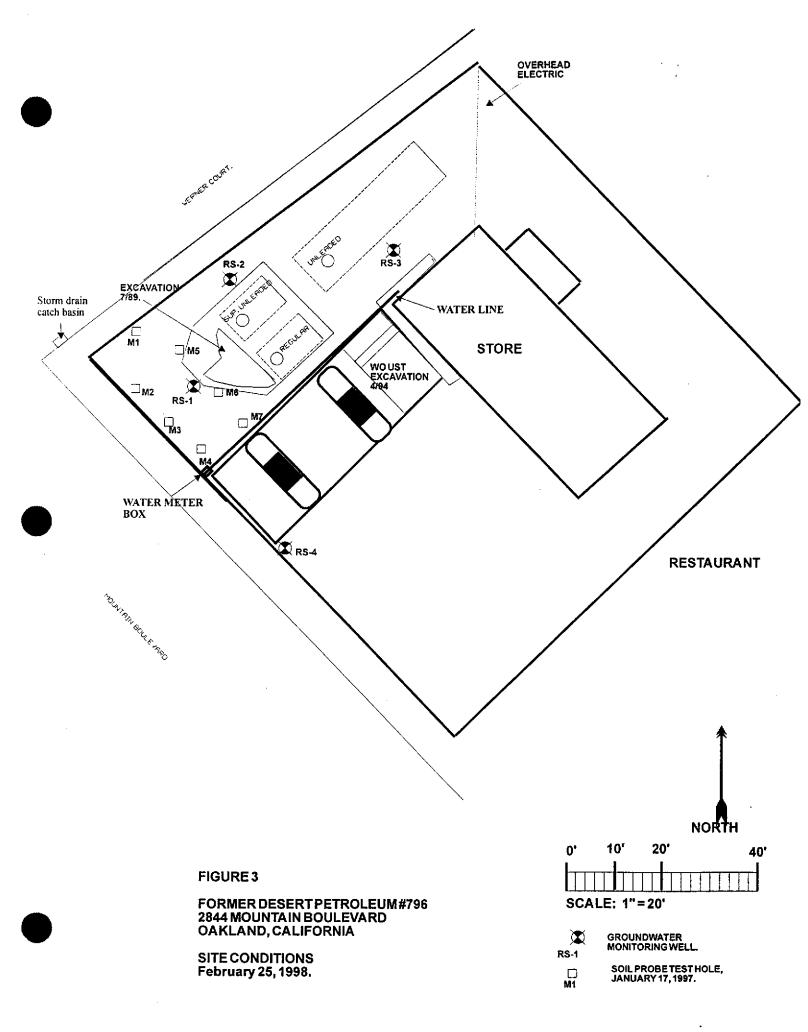
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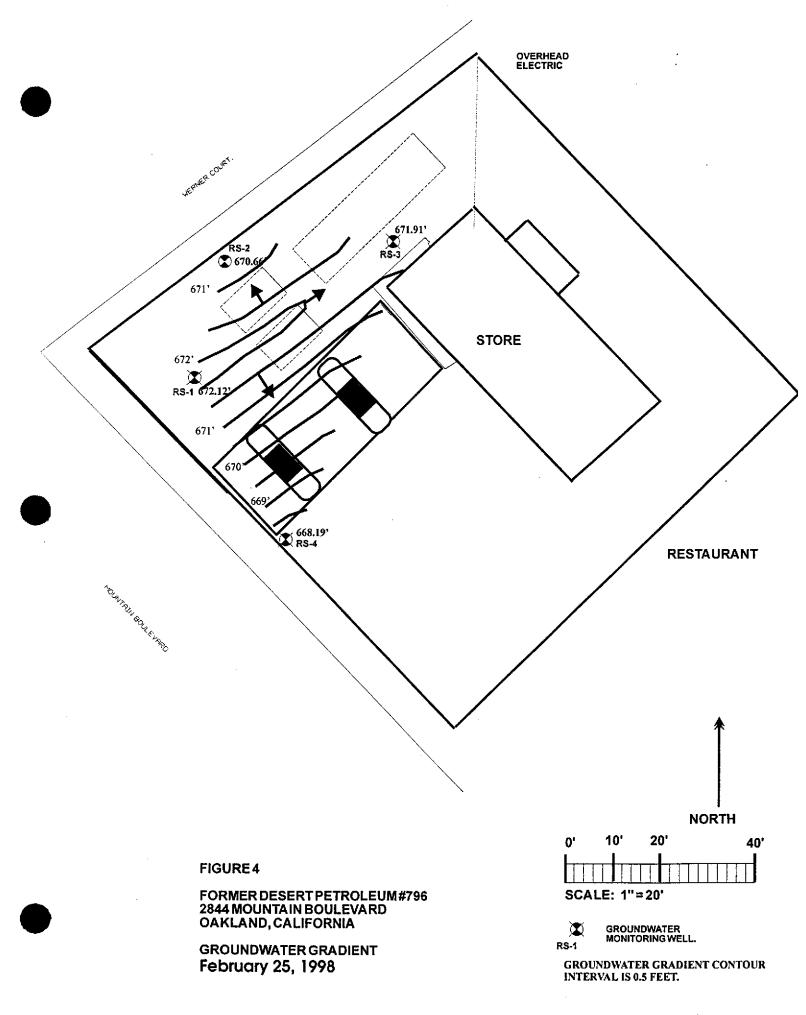
FIGURE 1

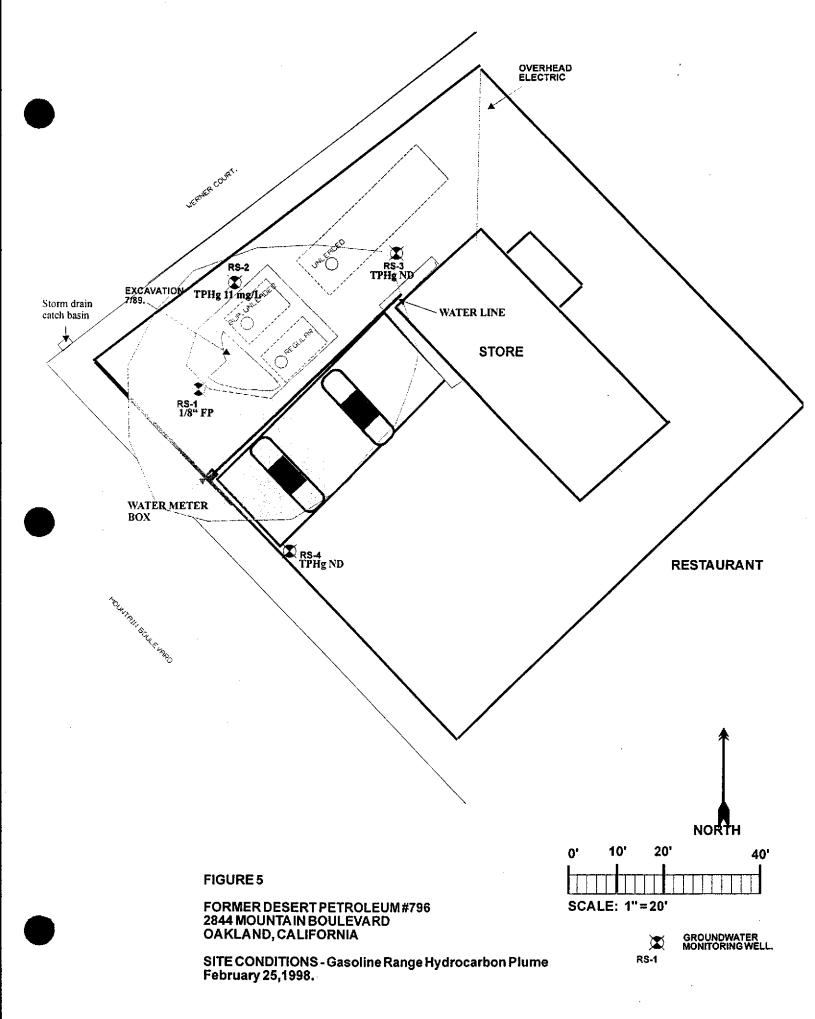
Location (AAA Map)

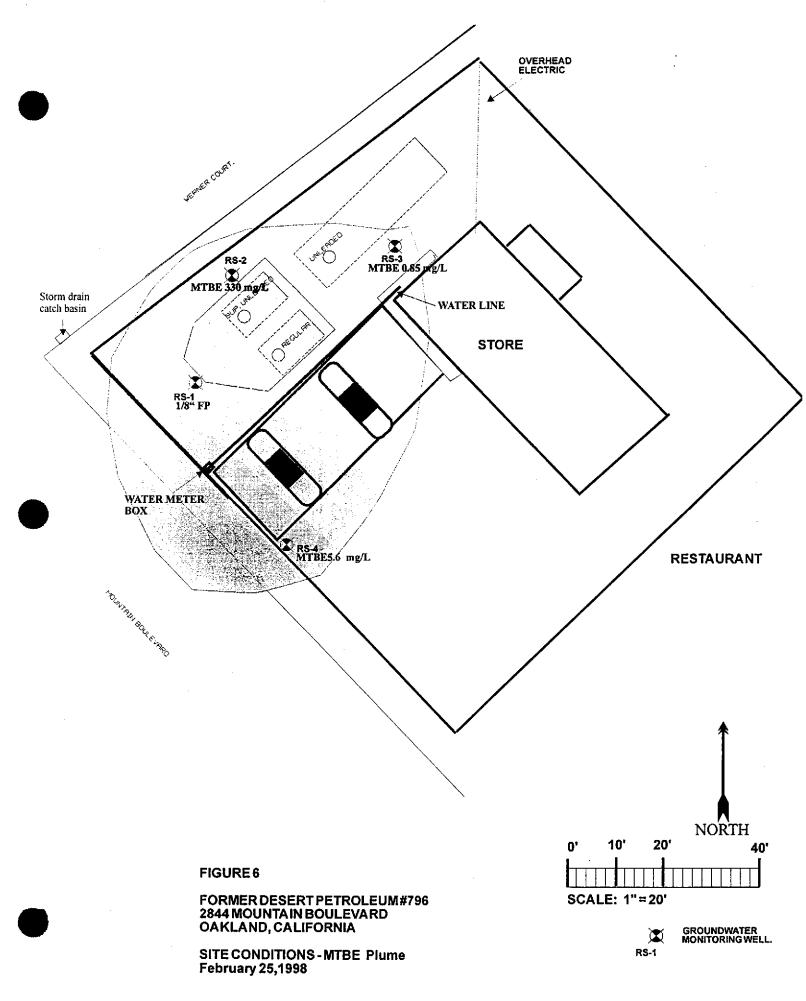
FORMER DESERT PETROLEUM *796 2844 MOUNTAIN BOULEVARD OAKLAND, CALIFORNIA













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North State Environmental Analytical Laboratory

98-204
Chain of Custody / Request for Analysis

Phone: (415) 588-9652 Fax: (415) 588-1950 Lab Job No.: _____ Page / of / Client: Western Geo Engineer's

Mailing Address: 1386 E. Beamer ST. Report to: Same as Phone: **Turnaround Time** Billing to: Fax: 99me 95 Woodland C.A. 95776 PO# / Billing Reference: Date: 2-25-58 Sampler: M Project / Site Address: DP 796 Analysis 2844 Mountain Blud. Requested Sample ID Sample Container Sampling Pres. Comments/Hazards No. / Type Date / Time Type 11,0 2/V095 HCL 2.25-98/ 1:03 RS-2 Confirm All MIBENITH 8260 RS-3 12:40 RS-4 1:28 Relinquished by: Matt Penich Date: 126/28 Time: 10:15 AM Received by: 5/h/ Lab Comments Relinquished by: Date: Time: Received by: Relinquished by: Date: Time: Received by:



CERTIFICATE OF ANALYSIS

Lab Number:

98-204

Client:

Western Geo-Engineers

Project:

DP 796 / 2844 Mountain Blvd.

Date Reported: 03/09/98

Gasoline, BTEX and MTBE by Methods 8015M and 8020

Analyte N	Method	Result	Unit	Date Sampled	Date Analyzed
Sample: 98-204	4-01 Clien	t ID: RS-2		02/25/98	WATER
asoline	8015M	11000	ug/L		03/06/98
Benzene	8020	1100	ug/L		
Ethylbenzene	8020	320	ug/L		
MTBE	8020	*330000	ug/L		
Toluene	8020	ND<50	ug/L		
Xylenes	8020	2400	ug/L		
Sample: 98-204	4-02 Clien	t ID: RS-3		02/25/98	WATER
Gasoline	8015M	ND			03/06/98
Benzene	8020	ND			
Ethylbenzene	8020	ND			
MTBE	8020	*850	ug/L		
Toluene	8020	ND			
Xylenes	8020	4	ug/L		
Sample: 98-204	4-03 Clien	t ID: RS-4		02/25/98	WATER
Gasoline	8015M	ND			03/06/98
Benzene	8020	3	ug/L		
Ethylbenzene	8020	ND			
MTBE	8020	* 5600	ug/L		
Toluene	8020	ND			
X ylenes	8020	ND			

^{*}Confirmed by GC/MS method 8260.

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Page



CERTIFICATE OF ANALYSIS

Quality Control/Quality Assurance

Lab Number:

98-204

Client:

Western Geo-Engineers

Project:

DP 796 / 2844 Mountain Blvd.

Date Reported: 03/09/98

Gasoline, BTEX and MTBE by Methods 8015M and 8020

Analyte	Method	Reporting Limit	Unit	Blank	MS/MSD Recovery	RPD
asoline	8015M	50	ug/L	ND	103	2
Benzene	8020	0.5	ug/L	ND	95	5
Ethylbenzene	8020	0.5	ug/L	ND	102	4
Toluene	8020	0.5	ug/L	ND	106	4
Xylenes	8020	1.0	ug/L	ND	104	2
MTBE	8020	0.5	ug/L	ND	103	2

ELAP Certificate NO:1753

Reviewed and Approved

John A. Murphy, Laboratory Director

Page 2 of 2



North State Environmental Analytical Laboratory Phone: (415) 588-9652 Fax: (415) 588-1950

	98-204
Chain of Custody / Re	
Lab Job No.:	_ Page <u>/</u> _ of <u>/</u> _

Client: Western G	co Engil	reer's	Report	t to:	9me	95		Phone	:				Turnaround Time	
Mailing Address: /38	36 E. Be	mer ST.	Billing	to:	ggme	a <		Fax:						
		A. 95776	·			7 - 2		PO# /	Billing F	Reference	e:		2-25-98	
		4		<	_							Sampler: M		
Project / Site Address:	DP 79	6			Analys	sis /	4	1.		•/			1	
		gain Blue	√ .	Analysis /. Requested Pres. Sampling Date / Time										
Sample ID	Sample Type	Container No. / Type	Pres.		npling / Time		1						/ Comments/Hazards	
RS-2	1120	2/1095	HCL	2-25-18	1:03	V	/						Confirm All	
RS-3	1			1	12:40	1	\						MTBEWITH 8260	
RS-4			1	l	1:28	V	V							
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Relinguished by:			0	ate:	Time:		Recei	ved by:		•				

LAWRENCE TANK TESTING, INC.

PO BOX 407, DOWNIEVILLE, CALIFORNIA 95936 PHONE 916-289-3109 - FAX 916-289-3322

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PUMP		ble Bailer		
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SITE DP 79	6 DATE	2.25.98	TIME	12:29
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FINAL VOLU			gal	
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SAMPLE CO		2 1095		
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North State Environmental Analytical Laboratory Phone: (415) 588-9652 Fax: (415) 588-1950

Chain of Custody / Request for Analysis Lab Job No.: _____ Page / of /

Client: Western Geo Engineer's		Repor	Report to: Samo 95					Phone:				Turnaround Time		
Mailing Address: 1386 E. Beamer 51.		Billing	Billing to: 95				Fax:							
Woodland CA. 95776							PO# / Billing Reference:				Date: 2.27.38			
											Sampler: 137			
Project / Site Address:	DP 79	6	ř		Analys	is /	\$/	1	/				1	
2844 Mountain Blud		Analysis Requested Pres. Sampling Date / Time			8// / / /									
Sample ID	Sample Type	Container No. / Type	Pres.		npling / Time	13							/Comments/Hazards	
RS-2	1170	2/2095	<i>iiC</i> t	3 25-18,	1:03	V	V						Confirm All	
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Generator's Phone 5. Transporter Compar	(916) 668-	5300 6	US EPA ID Number	7. Tra	nsporter l	Phone		
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8. Designated Facility	Name and Site Address	9.	US EPA ID Number	10. Fa	cility's Ph	one	*	
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Evergreen Oil, In		, *						
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