GROUNDWATER TECHNOLOGY, INC.

4057 Port Chicago Highway, Concord, CA 94520 (415) 671-2387
FAX: (415) 685-9148

August 15, 1994

Project No. 02010 4233

Mr. Brett Hunter
Chevron U.S.A. Products Company
2410 Camino Ramon
San Ramon, CA 94583-0804

SUBJECT: *Quarterly Monitoring and Sampling Activities*
Chevron Service Station No. 9-1924
4904 Southfront Road
Livermore, California

Dear Mr. Hunter:

Groundwater Technology, Inc. presents the quarterly groundwater monitoring and sampling data collected on July 21 and 22, 1994. Seventeen of eighteen groundwater monitoring wells were gauged to determine depth to groundwater (DTW) and to check for the presence of separate-phase petroleum hydrocarbons. Monitoring well MW-18 has been paved over and was not monitored or sampled. Separate-phase hydrocarbons were not detected in the monitoring wells. A potentiometric surface map and a summary of groundwater monitoring data are presented in attachments 1 and 2, respectively. The July 21, 1994 potentiometric surface map includes the data collected the same day by Kaprealian Engineering, Inc. for the Unocal station northwest of the Chevron site. After measuring DTW, the monitoring wells were purged and sampled. Groundwater monitoring and sample collection protocol and field data sheets are presented in attachment 3. The groundwater samples were analyzed for benzene, toluene, ethylbenzene, xylenes and total petroleum hydrocarbons-as-gasoline. As requsted, additional samples were taken this quarter only for Lead. Laboratory reports and chain-of-custody records are included in attachment 4. Dissolved benzene and total petroleum hydrocarbons-as-gasoline concentration maps are also provided in attachment 1. Monitoring well purge water was transported by Groundwater Technology to the Chevron Terminal in Richmond, California, for recycling.

Groundwater Technology, Inc. is pleased to assist Chevron on this project. If you have any questions or comments please call our Concord office at (510) 671-2387.

Sincerely,
Groundwater Technology, Inc.
Written/Submitted by,

Kenneth P. Johnson
Project Manager

PR

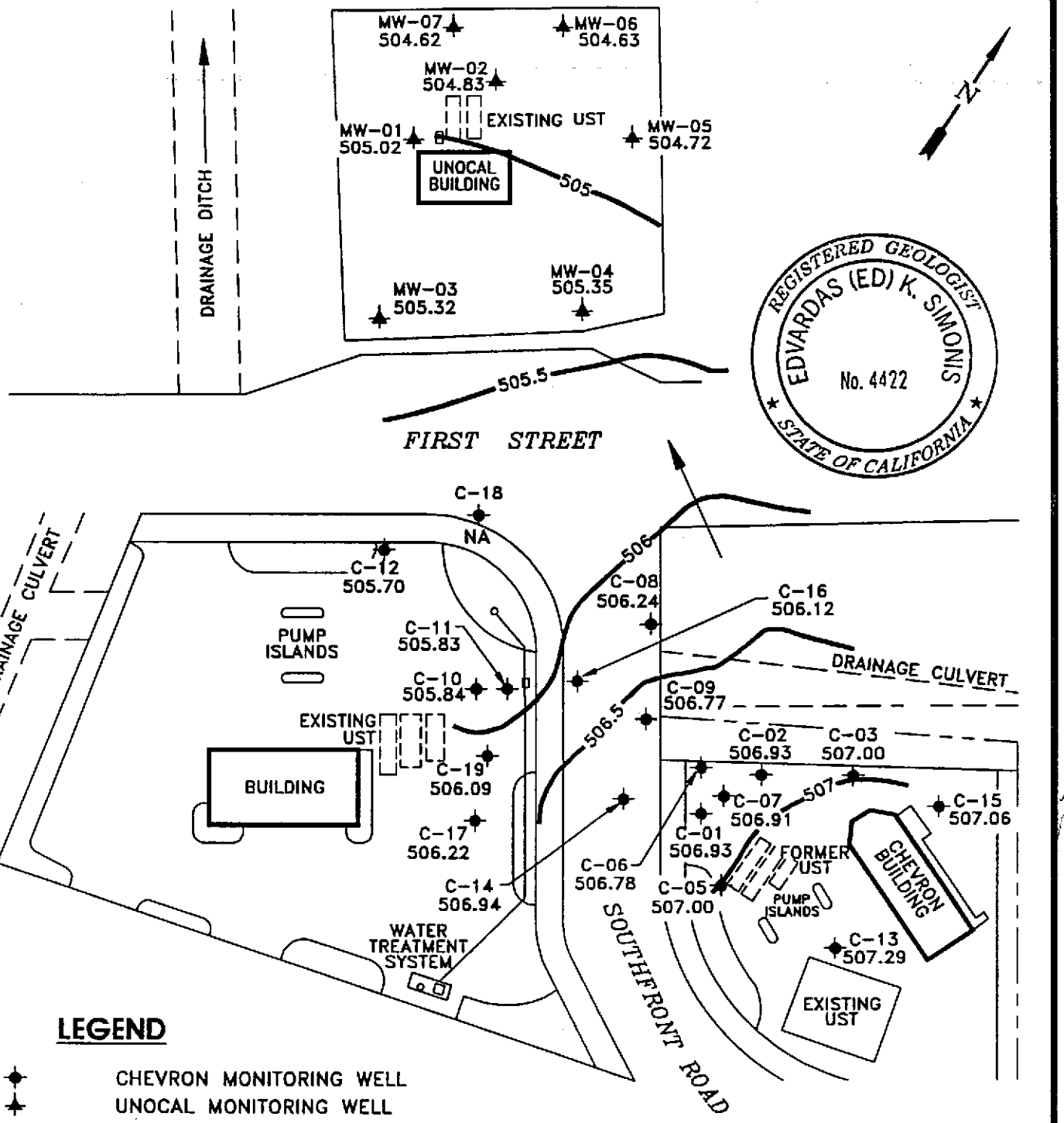
Attachment 1 Figure
Attachment 2 Table
Attachment 3 Protocol and Field Data Sheets
Attachment 4 Laboratory Report

For:
Wendell W. Lattz
Vice President, General Manager
West Region

QM&SR

ATTACHMENT 1

Figure



LEGEND

- CHEVRON MONITORING WELL
- UNOCAL MONITORING WELL
- NA — NOT AVAILABLE
- X.XX — POTENTIOMETRIC SURFACE ELEVATION (FT)
- POTENTIOMETRIC SURFACE CONTOUR
- GROUNDWATER FLOW DIRECTION

NOTE:
1. CONTOURS REPRESENT APPROXIMATE ELEVATIONS ABOVE MEAN SEA LEVEL.

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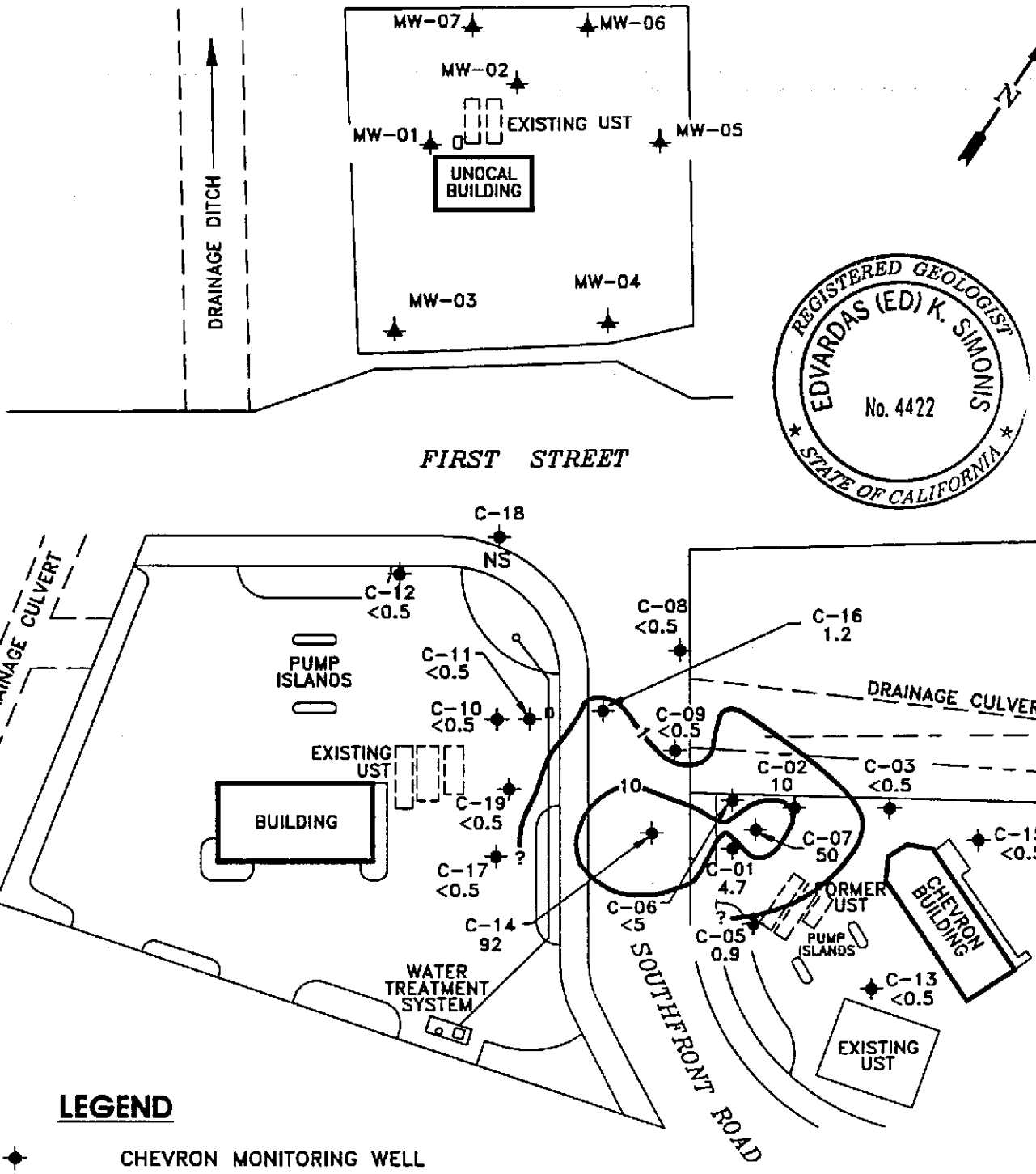
0 FEET 80
SCALE

POTENTIOMETRIC SURFACE MAP (7/21/94)

CLIENT: CHEVRON U.S.A. PRODUCTS CO. SERVICE STATION NO. 9-1924	FILE: 4233PSM	PROJECT NO.: 02010-4233	PM: KS	PE/RG: CKS
LOCATION: 4904 SOUTHFRONT ROAD LIVERMORE, CALIFORNIA	REV.	DES.: SS / DET.: SS / DATE: 8/17/94	FIGURE: 1	



LEGEND

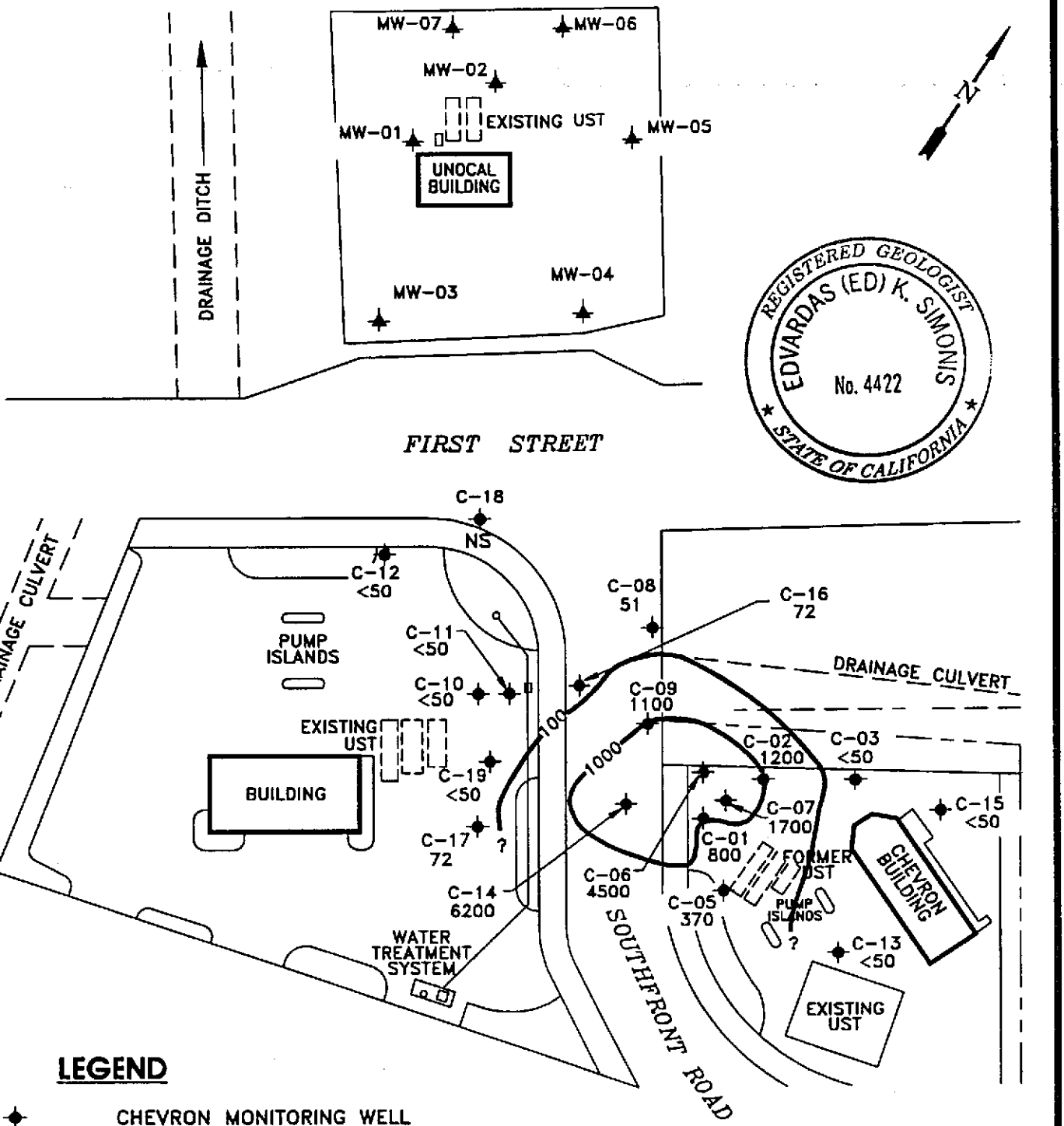
✦	CHEVRON MONITORING WELL
✦	UNOCAL MONITORING WELL
NS	NOT SAMPLED
X.XX	DISSOLVED BENZENE CONCENTRATION (ug/l)
⌒	DISSOLVED BENZENE CONCENTRATION CONTOUR

GROUNDWATER TECHNOLOGY

0 FEET 80
SCALE

DISSOLVED BENZENE CONCENTRATION MAP (7/22/94)

CLIENT: CHEVRON U.S.A. PRODUCTS CO. SERVICE STATION NO. 9-1924	FILE: 4233BEN	PROJECT NO.: 02010-4233		PM: KT	PE/RG: EKS
LOCATION: 4904 SOUTHFRONT ROAD LIVERMORE, CALIFORNIA	REV.			FIGURE: 2	
	DES.: SS	DET.: SS	DATE: 8/17/94		



LEGEND

✦	CHEVRON MONITORING WELL
✦	UNOCAL MONITORING WELL
NS	NOT SAMPLED
X.XX	TPH-AS-GASOLINE CONCENTRATION (ug/l)
	TPH-AS-GASOLINE CONCENTRATION CONTOUR

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0 FEET 80
SCALE

TPH-AS-GASOLINE CONCENTRATION MAP (7/22/94)

CLIENT: CHEVRON U.S.A. PRODUCTS CO. SERVICE STATION NO. 9-1924	FILE: 4233TPHG		PROJECT NO.: 02010-4233	PM: 15	PE/RG: EK
	REV.			FIGURE: 3	
LOCATION: 4904 SOUTHFRONT ROAD LIVERMORE, CALIFORNIA	DES.: SS	DET.: SS	DATE: 8/17/94		

ATTACHMENT 2

Table

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-1	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	11.75	0.00	508.64
520.39	03/15/88	770	87	610	2,100	27,000	-	-	-	-	-	-	-	-	13.50	0.00	506.89
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.65	0.00	506.74
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.72	0.00	505.67
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.50	0.00	506.89
	10/13/88	220	11	62	130	3,200	-	-	-	-	-	-	-	-	12.89	0.00	507.50
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	12.89	0.00	507.50
	01/12/89	820	43	490	260	4,000	-	-	-	-	-	-	-	-	-	-	-
	04/10/89	100	ND	70	50	4,000	ND	ND	-	-	-	-	-	-	13.65	0.00	506.74
	04/10/89	100	ND	60	50	4,000	-	ND	-	-	-	-	-	-	13.65	0.00	506.74
	06/26/89	97	20	60	50	600	ND	3	-	-	-	-	-	-	13.94	0.00	506.45
	06/26/89	86	15	44	35	570	-	1.7	-	-	-	-	-	-	13.94	0.00	506.45
	10/13/89	64	ND	51	48	1,600	ND	ND	5	-	-	-	-	-	13.92	0.00	506.47
	01/03/90	36	0.68	30	30	1,100	-	1	-	-	-	-	-	-	13.80	0.00	506.59
	05/08/90	37	9.2	40	32	1,300	-	1.2	-	ND	-	ND	-	-	13.91	0.00	506.48
	09/29/90	19	1.2	32	31	350	-	ND	ND	0.7	1.4	ND	-	-	13.93	0.00	506.46
	01/03/91	12	ND	17	14	400	-	ND	ND	ND	ND	ND	ND	-	13.85	0.00	506.54
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	13.51	0.00	506.88
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.10	0.00	506.29
	04/06/92	12	0.8	31	31	1,000	-	ND	ND	ND	ND	ND	ND	-	13.06	0.00	507.33
	07/28/92	47	110	96	260	4,200	-	-	-	-	-	-	-	-	13.93	0.00	506.46
	10/16/92	11	ND	32.0	55.0	1,800	-	-	-	-	-	-	-	-	14.45	0.00	505.94
	01/14/93*	24	ND	98	62	2,000	-	-	-	-	-	-	-	-	11.23	0.00	509.16
	03/26/93	21	12	120	100	4,400	-	-	-	-	-	-	-	-	10.94	0.00	509.45
	04/22/93	26	44	580	330	18,000	-	-	-	-	-	-	-	-	16.25	SHEEN	504.14
	07/20,21/93	73	11	470	470	7,100**	-	-	-	-	-	-	-	-	15.29	0.00	505.10
	10/20/93	19	26	260	190	880**	-	-	-	-	-	-	-	-	13.50	0.00	506.89
	01/20/94	13	10	130	60	2,900	-	-	-	-	-	-	-	-	13.26	0.00	507.13
	04/21/94	8.8	7.8	82	34	1,400	-	-	-	-	-	-	-	-	13.46	0.00	506.93
	07/21,22/94	4.7	2.7	34	13	800	-	-	-	-	-	-	-	ND	13.46	0.00	506.93

GROUNDWATER TECHNOLOGY ®

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-2	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	11.98	0.00	508.78
520.76	03/15/88	3,900	1,900	1,200	1,200	22,000	-	-	-	-	-	-	-	-	13.77	0.00	506.99
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.03	0.00	506.73
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.12	0.00	505.64
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.86	0.00	506.90
	10/13/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.11	0.00	506.65
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	12.83	0.00	507.93
	01/12/89	25	3	83	59	1,000	-	-	-	-	-	-	-	-	-	-	-
	04/10/89	2.5	ND	15	12	600	ND	ND	-	-	-	-	-	-	14.04	0.00	506.72
	04/10/89	ND	ND	11	11	ND	-	ND	-	-	-	-	-	-	14.04	0.00	506.72
	06/26/89	5.3	8	18	14	640	ND	ND	-	-	-	-	-	-	14.34	0.00	506.42
	06/26/89	3.7	0.6	13	8.2	750	-	2	-	-	-	-	-	-	14.34	0.00	506.42
	10/13/89	ND	ND	17	10	630	-	ND	-	-	-	-	-	-	13.92	0.00	506.84
	01/03/90	3	ND	19	17	880	-	1	-	-	-	-	-	-	14.11	0.00	506.65
	05/08/90	1.3	2.7	8.4	11	340	-	1.1	-	ND	-	ND	-	-	14.28	0.00	506.48
	09/29/90	ND	ND	4.6	1.8	74	-	ND	ND	1.7	0.5	ND	-	-	14.25	0.00	506.51
	01/03/91	270	ND	79	93	2,000	-	ND	ND	ND	ND	ND	ND	-	14.15	0.00	506.61
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	13.86	0.00	506.90
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.50	0.00	506.26
	04/06/92	ND	ND	54.0	6.1	1,200	-	ND	ND	ND	ND	ND	ND	-	13.47	0.00	507.29
	07/28/92	5.2	2.9	26	16	1,000	-	-	-	-	-	-	-	-	14.35	0.00	506.41
	10/16/92	ND	2.2	20	10	2,000	-	-	-	-	-	-	-	-	14.84	0.00	505.92
	01/14/93*	49	50	31	29	1,800	-	-	-	-	-	-	-	-	11.22	0.00	509.54
	03/26/93	15	12	14	6	820**	-	-	-	-	-	-	-	-	10.77	0.00	509.99
	04/22/93	12	12	28	29	2,000	-	-	-	-	-	-	-	-	12.93	0.00	507.83
	07/20,21/93	28	8	4	4	1,100**	-	-	-	-	-	-	-	-	16.02	0.00	504.74
	10/20/93	140	18	22	27	1,600**	-	-	-	-	-	-	-	-	13.84	0.00	506.92
	01/20/94	36	3	7	3	760	-	-	-	-	-	-	-	-	13.60	0.00	507.16
	04/21/94	23	2.8	6.8	6.8	430	-	-	-	-	-	-	-	-	14.10	0.00	506.66
	07/21,22/94	10	2.8	5.2	53	1,200	-	-	-	-	-	-	-	ND	13.83	0.00	506.93

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Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-3	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	12.24	0.00	509.07
521.31	03/15/88	86	8	30	36.0	2,100	-	-	-	-	-	-	-	-	14.21	0.00	507.10
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.43	0.00	506.88
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.53	0.00	505.78
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.22	0.00	507.09
	10/13/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.10	0.00	507.21
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	12.70	0.00	508.61
	04/10/89	2.1	ND	4.4	2.6	200	ND	1.4	-	-	-	-	-	-	14.36	0.00	506.95
	06/26/89	1.1	0.7	4.9	1.6	260	ND	1.5	-	-	-	-	-	-	14.74	0.00	506.57
	10/13/89	ND	ND	ND	ND	ND	-	ND	-	-	-	-	-	-	14.70	0.00	506.61
	01/03/90	ND	ND	0.9	1.4	ND	-	0.7	-	-	-	-	-	-	14.42	0.00	506.89
	05/08/90	ND	ND	ND	ND	ND	-	0.7	-	ND	-	ND	-	-	14.65	0.00	506.66
	09/27/90	ND	1.0	ND	ND	71	-	ND	ND	1.1	1.6	ND	-	-	14.67	0.00	506.64
	01/03/91	ND	ND	ND	ND	57	-	ND	ND	ND	ND	ND	ND	-	14.58	0.00	506.73
	04/12/91	ND	ND	1.6	ND	98	-	ND	ND	ND	ND	ND	ND	-	14.23	0.00	507.08
	09/04/91	ND	ND	ND	ND	64	-	ND	ND	ND	ND	ND	ND	-	14.88	0.00	506.43
	04/06/92	ND	ND	0.8	ND	88	-	ND	ND	ND	ND	ND	ND	-	13.83	0.00	507.48
	07/28/92	ND	ND	0.5	1.1	80	-	-	-	-	-	-	-	-	14.80	0.00	506.51
	10/16/92	ND	ND	6.6	11	1,400	-	-	-	-	-	-	-	-	15.23	0.00	506.08
	01/14/93*	ND	ND	ND	1.3	100	-	-	-	-	-	-	-	-	11.45	0.00	509.86
	03/26/93	0.7	1	ND	ND	74	-	-	-	-	-	-	-	-	11.27	0.00	510.04
	04/22/93	ND	ND	ND	ND	ND***	-	-	-	-	-	-	-	-	12.61	0.00	508.70
	07/20,21/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	16.17	0.00	505.14
	10/20/93	ND	1	ND	0.8	ND	-	-	-	-	-	-	-	-	14.23	0.00	507.08
	01/20/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.01	0.00	507.30
	04/21/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.33	0.00	506.98
	07/21,22/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	ND	14.31	0.00	507.00

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Table
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4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-5	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	12.00	0.00	508.82
520.82	03/15/88	82	7	77	95	1,600	-	-	-	-	-	-	-	-	13.75	0.00	507.07
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.92	0.00	506.90
	07/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.72	0.00	507.10
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.72	0.00	507.10
	10/13/88	ND	ND	ND	ND	2,500	-	-	-	-	-	-	-	-	13.84	0.00	506.98
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	13.41	0.00	507.41
	01/12/89	42	3	44	52	ND	-	-	-	-	-	-	-	-	-	0.00	520.82
	04/10/89	2.6	ND	6.2	5.5	180	ND	1.4	-	-	-	-	-	-	13.88	-	-
	06/26/89	7.6	0.8	40	56	420	ND	1.5	-	-	-	-	-	-	14.14	0.00	506.68
	10/13/89	ND	ND	10	ND	620	ND	ND	-	-	-	-	-	-	14.15	0.00	506.67
	01/03/90	0.7	ND	8	6	ND	-	ND	-	-	-	-	-	-	14.10	0.00	506.72
	05/08/90	0.6	0.8	11	7.2	140	-	0.8	-	ND	-	ND	-	-	14.00	0.00	506.82
	09/27/90	ND	3.2	5.2	6.4	360	-	ND	ND	0.7	ND	ND	-	-	14.00	0.00	506.82
	01/03/91	ND	ND	ND	3	90	-	ND	ND	ND	ND	ND	ND	-	14.00	0.00	506.82
	04/12/91	12	ND	19	7	270	-	0.5	ND	ND	ND	ND	ND	-	13.71	0.00	507.11
	09/04/91	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	14.30	0.00	506.52
	04/06/92	12	ND	40	ND	670	-	ND	ND	ND	ND	ND	ND	-	13.29	0.00	507.53
	07/28/92	15	ND	1.8	0.5	130	-	-	-	-	-	-	-	-	14.13	0.00	506.69
	10/16/92	ND	ND	ND	1.2	ND	-	-	-	-	-	-	-	-	14.68	0.00	506.14
	01/14/93*	13	ND	110	10	2,300	-	-	-	-	-	-	-	-	11.87	0.00	508.95
	03/26/93	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	04/22/93	220	18	120	65	2,300**	-	-	-	-	-	-	-	-	12.12	0.00	508.70
	07/20,21/93	18	5	8	14	970**	-	-	-	-	-	-	-	-	16.04	0.00	504.78
	10/20/93	7	5	3	15	2,200	-	-	-	-	-	-	-	-	14.10	0.00	506.72
	01/20/94	2	1	11	0.6	440	-	-	-	-	-	-	-	-	13.60	0.00	507.22
	04/21/94	2.7	2.6	21	1.5	490	-	-	-	-	-	-	-	-	13.81	0.00	507.01
	07/21,22/94	0.9	ND	6.5	1.0	370	-	-	-	-	-	-	-	ND	13.82	0.00	507.00

GROUNDWATER TECHNOLOGY ®

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-6	03/26/86	-	-	-	-	-	-	-	-	-	-	-	-	-	11.12	0.00	508.50
519.62	03/15/88	870	4,600	1,500	8,200	46,000	-	-	-	-	-	-	-	-	12.93	0.00	506.69
	05/10/88	1,400	10,000	3,000	19,000	86,000	-	-	-	-	-	-	-	-	13.03	0.00	506.59
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.11	0.00	505.51
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	12.95	0.00	506.67
	10/13/88	300	600	260	1,600	5,300	-	-	-	-	-	-	-	-	13.14	0.00	506.48
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	12.14	0.00	507.48
	01/12/89	260	110	270	720	5,000	-	-	-	-	-	-	-	-	-	-	-
	04/12/89	90	190	190	680	5,000	4.0	ND	-	-	-	-	-	-	12.98	0.00	506.64
	06/26/89	77	250	140	610	3,600	ND	ND	-	-	-	-	-	-	13.39	0.00	506.23
	10/13/89	32	81	100	530	3,500	ND	ND	-	-	-	-	-	-	13.40	0.00	506.22
	01/03/90	20	97	65	410	3,200	-	1	-	-	-	-	-	-	13.18	0.00	506.44
	05/08/90	17	140	ND	400	1,800	-	1.6	-	ND	-	ND	-	-	13.39	0.00	506.23
	09/29/90	58	210	260	2,100	8,000	-	1.0	ND	ND	2.4	1.6	-	-	13.32	0.00	506.30
	01/03/91	4	79	59	380	2,300	-	0.5	ND	ND	ND	ND	ND	-	13.19	0.00	506.43
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	12.91	0.00	506.71
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	13.56	0.00	506.06
	04/06/92	ND	120	740	3,400	44,000	-	ND	ND	ND	ND	ND	ND	-	12.48	0.00	507.14
	07/28/92	220	1,100	3,000	13,000	120,000	-	-	-	-	-	-	-	-	13.47	0.00	506.15
	10/16/92	ND	830	3,300	9,600	570,000	-	-	-	-	-	-	-	-	13.95	0.00	505.67
	01/14/93*	ND	25	460	980	19,000	-	-	-	-	-	-	-	-	10.39	0.00	509.23
	03/26/93	30	90	290	1,100	11,000**	-	-	-	-	-	-	-	-	9.83	0.00	509.79
	04/22/93	29	170	640	2,400	20,000	-	-	-	-	-	-	-	-	11.32	0.00	508.30
	07/20,21/93	130	490	1,000	4,900	32,000**	-	-	-	-	-	-	-	-	14.92	TRACE	504.70
	10/20/93	290	790	2,500	7,600	77,000**	-	-	-	-	-	-	-	-	12.91	0.00	506.71
	01/20/94	10	86	510	29	22,000	-	-	-	-	-	-	-	-	12.68	TRACE	506.94
	04/21/94	17	42	160	210	6500	-	-	-	-	-	-	-	-	12.88	0.00	506.74
	07/21,22/94	ND	7.1	130	130	4,500	-	-	-	-	-	-	-	ND	12.84	TRACE	506.78

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-7	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	11.67	0.00	508.63
520.30	03/15/88	98	690	120	120	8,000	-	-	-	-	-	-	-	-	13.48	0.00	506.82
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.60	0.00	506.70
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.68	0.00	505.62
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.43	0.00	506.87
	10/13/88	4,400	220	1,000	3,000	16,000	-	-	-	-	-	-	-	-	13.61	0.00	506.69
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	12.66	0.00	507.64
	01/12/89	950	47	670	640	8,000	-	-	-	-	-	-	-	-	-	-	-
	04/12/89	1,100	30	760	370	6,000	ND	ND	-	-	-	-	-	-	13.60	0.00	506.70
	06/26/89	1,300	50	600	340	6,000	ND	ND	-	-	-	-	-	-	13.88	0.00	506.42
	10/13/89	1,300	ND	160	150	3,900	-	ND	-	-	-	-	-	-	13.81	0.00	506.49
	01/03/90	1,200	13	180	200	5,600	-	1	-	-	-	-	-	-	13.71	0.00	506.59
	05/08/90	1,100	15	110	140	3,500	-	1.7	-	ND	-	ND	-	-	13.85	0.00	506.45
	09/29/90	580	ND	46	68	2,400	-	0.7	ND	ND	ND	ND	ND	-	13.80	0.00	506.50
	01/03/91	300	2	110	120	2,500	-	0.7	ND	ND	ND	ND	ND	-	13.71	0.00	506.59
	04/12/91	190	1	81	87	2,300	-	0.6	ND	ND	ND	ND	ND	-	13.46	0.00	506.84
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.09	0.00	506.21
	10/07/91	170	1.9	97	59	4,700	-	ND	ND	24	ND	ND	ND	-	-	-	-
	04/06/92	95	0.8	110	100	2,400	-	ND	ND	ND	ND	ND	ND	-	13.02	0.00	507.28
	07/28/92	120	3.4	110	110	2,000	-	-	-	-	-	-	-	-	13.76	0.00	506.54
	10/16/92	130	4.2	68	74	2,700	-	-	-	-	-	-	-	-	14.42	0.00	505.88
	01/14/93*	160	33	380	210	7,800	-	-	-	-	-	-	-	-	10.98	0.00	509.32
	03/26/93	39	9	28	15	1,400	-	-	-	-	-	-	-	-	10.61	0.00	509.69
	04/22/93	130	18	43	36	3,800	-	-	-	-	-	-	-	-	11.84	0.00	508.46
	07/20,21/93	35	18	61	87	1,900	-	-	-	-	-	-	-	-	15.36	SHEEN	504.94
	10/20/93	72	26	250	160	5,500	-	-	-	-	-	-	-	-	13.41	0.00	506.89
	01/20/94	12	12	150	69	3,600	-	-	-	-	-	-	-	-	13.19	SHEEN	507.11
	04/21/94	62	11	170	68	2,100	-	-	-	-	-	-	-	-	13.33	0.00	506.97
	07/21,22/94	50	4.4	110	22	1,700	-	-	-	-	-	-	-	ND	13.39	0.00	506.91

GROUNDWATER TECHNOLOGY ®

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-8	03/28/86	--	--	--	--	--	--	--	--	--	--	--	--	--	11.78	0.00	507.96
519.74	03/15/88	360	25	10	ND	7,500	--	--	--	--	--	--	--	--	13.63	0.00	506.11
	05/10/88	--	--	--	--	--	--	--	--	--	--	--	--	--	13.74	0.00	506.00
	06/10/88	--	--	--	--	--	--	--	--	--	--	--	--	--	14.89	0.00	504.85
	07/25/88	--	--	--	--	--	--	--	--	--	--	--	--	--	13.65	0.00	506.09
	10/13/88	6	5.3	ND	ND	ND	--	--	--	--	--	--	--	--	13.78	0.00	505.96
	01/01/89	--	--	--	--	--	--	--	--	--	--	--	--	--	12.68	0.00	507.06
	01/12/89	37	4	1	5	ND	--	--	--	--	--	--	--	--	--	--	--
	04/12/89	13	ND	ND	ND	3,000	12.0	5	--	--	--	--	--	--	13.77	0.00	505.97
	06/26/89	14	6	ND	6	780	ND	4	--	--	--	--	--	--	14.03	0.00	505.71
	10/13/89	ND	ND	ND	ND	ND	ND	ND	--	--	--	--	--	--	14.06	0.00	505.68
	01/03/90	ND	ND	1	1	910	--	1.5	--	--	--	--	--	--	13.74	0.00	506.00
	05/07/90	3.9	6	0.5	3.4	620	--	1.9	--	ND	--	ND	--	--	14.10	0.00	505.64
	09/29/90	ND	1.4	ND	ND	77	--	ND	ND	0.6	ND	ND	--	--	13.97	0.00	505.77
	01/03/91	2	2	ND	2	67	--	ND	ND	0.7	ND	ND	ND	--	13.81	0.00	505.93
	04/12/91	4	ND	ND	ND	180	--	0.6	ND	ND	ND	ND	ND	--	13.60	0.00	506.14
	09/04/91	1.8	4.7	0.8	4.8	140	--	ND	ND	ND	ND	ND	ND	--	14.14	0.00	505.60
	04/06/92	ND	ND	ND	ND	150	--	ND	ND	ND	ND	ND	ND	--	13.12	0.00	506.62
	07/28/92	ND	ND	ND	0.8	90	--	--	--	--	--	--	--	--	14.10	0.00	505.64
	10/16/92	ND	ND	ND	ND	51	--	--	--	--	--	--	--	--	14.57	0.00	505.17
	01/14/93*	ND	1.6	1.0	3.5	120	--	--	--	--	--	--	--	--	10.95	0.00	508.79
	03/26/93	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
	04/22/93	ND	0.6	0.6	0.8	68**	--	--	--	--	--	--	--	--	12.07	0.00	507.67
	07/20,21/93	ND	ND	ND	ND	ND	--	--	--	--	--	--	--	--	15.70	0.00	504.04
	10/20/93	ND	ND	ND	ND	ND	--	--	--	--	--	--	--	--	13.51	0.00	506.23
	01/20/94	ND	ND	ND	ND	ND	--	--	--	--	--	--	--	--	13.51	0.00	506.23
	04/21/94	ND	ND	ND	ND	ND	--	--	--	--	--	--	--	--	13.68	0.00	506.06
	07/21,22/94	ND	ND	ND	ND	51	--	--	--	--	--	--	--	ND	13.50	0.00	506.24

GROUNDWATER TECHNOLOGY ®

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-9	03/28/86	--	--	--	--	--	--	--	--	--	--	--	--	--	11.24	0.00	508.28
519.52	03/15/88	540	560	580	3,900	29,000	--	--	--	--	--	--	--	--	12.92	0.00	506.60
	05/10/88	--	--	--	--	--	--	--	--	--	--	--	--	--	13.12	0.00	506.40
	06/10/88	--	--	--	--	--	--	--	--	--	--	--	--	--	14.16	0.00	505.36
	07/25/88	--	--	--	--	--	--	--	--	--	--	--	--	--	13.00	0.00	506.52
	10/13/88	57	8	20	150	2,200	--	--	--	--	--	--	--	--	13.13	0.00	506.39
	01/01/89	--	--	--	--	--	--	--	--	--	--	--	--	--	12.19	0.00	507.33
	01/12/89	39	12	51	46	2,000	--	--	--	--	--	--	--	--	--	--	--
	04/12/89	16	20	55	240	6,000	ND	2.1	--	--	--	--	--	--	13.11	0.00	506.41
	04/11/89	14	25	45	290	6,000	--	ND	--	--	--	--	--	--	13.11	0.00	506.41
	06/26/89	37	63	140	690	3,900	ND	ND	--	--	--	--	--	--	13.40	0.00	506.12
	10/13/89	7	ND	26	50	1,300	ND	ND	--	--	--	--	--	--	13.46	0.00	506.06
	01/03/90	ND	0.7	202	37	1,500	--	1.5	--	--	--	--	--	--	13.30	0.00	506.22
	05/07/90	21	33	89	500	7,100	--	1.9	--	ND	--	ND	--	--	13.48	0.00	506.04
	09/29/90	21	3.9	31	110	1,000	--	1.0	ND	0.7	1.8	1.0	--	--	13.39	0.00	506.13
519.72	01/03/91	ND	ND	32	140	3,200	--	0.8	ND	ND	ND	ND	ND	--	13.28	0.00	506.44
	04/12/91	--	--	--	--	--	--	--	--	--	--	--	--	--	13.00	0.00	506.72
	09/04/91	--	--	--	--	--	--	--	--	--	--	--	--	--	13.61	0.00	506.11
	04/06/92	ND	ND	33	130	2,800	--	ND	ND	ND	ND	ND	ND	--	12.54	0.00	507.18
	07/28/92	6.5	2.4	17	37	1,000	--	--	--	--	--	--	--	--	13.45	0.00	506.27
	10/16/92	ND	730	960	2,000	190,000	--	--	--	--	--	--	--	--	13.98	0.00	505.74
	01/14/93*	ND	ND	27	77	2,200	--	--	--	--	--	--	--	--	10.44	0.00	509.28
	03/26/93	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
	04/22/93	60	40	68	98	7,300	--	--	--	--	--	--	--	--	11.43	0.00	508.29
	07/20,21/93	160	130	450	1,100	30,000**	--	--	--	--	--	--	--	--	15.20	0.00	504.52
	10/20/93	22	200	440	930	36,000	--	--	--	--	--	--	--	--	12.96	0.00	506.76
	01/20/94	55	57	27	210	12,000	--	--	--	--	--	--	--	--	12.84	0.00	506.88
	04/21/94	11	12	23	19	2,200	--	--	--	--	--	--	--	--	13.14	0.00	506.58
	07/21,22/94	ND	4.0	14	10	1,100	--	--	--	--	--	--	--	13	12.95	0.00	506.77

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-10	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
520.41	03/15/88	7	ND	ND	ND	90	-	-	-	-	-	-	-	-	14.86	0.00	505.55
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.90	0.00	505.51
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.94	0.00	504.47
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.85	0.00	505.56
	10/13/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.90	0.00	505.51
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	14.83	0.00	505.58
	01/12/89	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	-	-	-
	04/11/89	4.8	ND	ND	ND	ND	ND	6.1	-	-	-	-	-	-	14.90	0.00	505.51
	06/26/89	0.7	ND	ND	1.5	ND	4.0	ND	-	-	-	-	-	-	15.12	0.00	505.29
	10/13/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	15.11	0.00	505.30
	01/03/90	ND	ND	ND	ND	ND	-	3	-	-	-	-	-	-	15.01	0.00	505.40
	05/07/90	ND	ND	ND	ND	ND	-	ND	-	ND	-	ND	-	-	15.53	0.00	504.88
	09/27/90	ND	ND	ND	ND	ND	-	ND	ND	1.2	ND	ND	-	-	15.20	0.00	505.21
	01/03/91	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	15.06	0.00	505.35
	04/12/91	18	ND	2.9	2.7	110	-	1	ND	ND	ND	ND	ND	-	14.86	0.00	505.55
	09/04/91	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	15.22	0.00	505.19
	04/06/92	ND	ND	ND	ND	57	-	1.1	ND	ND	ND	ND	ND	-	14.21	0.00	506.20
	07/28/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.78	0.00	505.63
	10/16/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.51	0.00	504.90
	01/14/93*	4.7	ND	2.3	1.6	88	-	-	-	-	-	-	-	-	13.44	0.00	506.97
	03/26/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	12.55	0.00	507.86
	04/22/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	13.74	0.00	506.67
	07/20,21/93	ND	ND	ND	ND	100	-	-	-	-	-	-	-	-	16.49	0.00	503.92
	10/20/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.64	0.00	505.77
	01/20/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.39	0.00	506.02
	04/21/94	0.8	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.62	0.00	505.79
	07/21,22/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	ND	14.57	0.00	505.84

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-11 520.04	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	13.82	0.00	506.22
	03/15/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.49	0.00	505.55
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.31	0.00	505.73
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.47	0.00	504.57
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.60	0.00	506.44
	10/14/88	240	33	4.7	67	2	-	-	-	-	-	-	-	-	14.53	0.00	505.51
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	14.10	0.00	505.94
	01/12/89	ND	0.8	ND	ND	ND	-	-	-	-	-	-	-	-	-	-	-
	04/12/89	4.3	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	14.36	0.00	505.68
	06/26/89	2	ND	ND	ND	ND	4.0	ND	-	-	-	-	-	-	14.58	0.00	505.46
	10/13/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	14.71	0.00	505.33
	01/03/90	ND	ND	ND	0.7	ND	-	ND	-	-	-	-	-	-	14.61	0.00	505.43
	05/08/90	12	11	0.9	22	110	-	ND	-	ND	-	ND	-	-	15.53	0.00	504.51
	09/28/90	2.0	1.4	ND	3.3	ND	-	ND	ND	1.2	ND	ND	-	-	15.51	0.00	504.53
	01/03/91	2	ND	ND	2	ND	-	ND	ND	ND	ND	ND	1	-	14.63	0.00	505.41
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.30	0.00	505.74
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.84	0.00	505.20
	04/06/92	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	13.56	0.00	506.48
	07/28/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.39	0.00	505.65
	10/16/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.79	0.00	504.25
	01/14/93*	ND	1.3	0.7	6	94	-	-	-	-	-	-	-	-	12.14	0.00	507.90
	03/26/93	2	ND	0.6	1	130	-	-	-	-	-	-	-	-	11.81	0.00	508.23
	04/22/93	0.8	ND	ND	ND	ND	-	-	-	-	-	-	-	-	12.94	0.00	507.10
	07/20,21/93	3	1	ND	1	1,200	-	-	-	-	-	-	-	-	16.48	0.00	503.56
	10/20/93	2	ND	ND	ND	ND**	-	-	-	-	-	-	-	-	14.46	0.00	505.58
	01/20/94	5	0.6	3	4	140	-	-	-	-	-	-	-	-	14.12	0.00	505.92
	04/21/94	1.7	0.6	1.2	1.6	86	-	-	-	-	-	-	-	-	14.24	0.00	505.80
	07/21,22/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	7	14.21	0.00	505.83

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-12 519.82	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	13.61	0.00	506.21
	03/15/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.55	0.00	505.27
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.57	0.00	505.25
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.63	0.00	504.19
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.51	0.00	505.31
	10/13/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.60	0.00	505.22
	01/12/89	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.62	0.00	505.20
	04/11/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	14.61	0.00	505.21
	06/26/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	14.75	0.00	505.07
	10/13/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	14.77	0.00	505.05
	01/03/90	ND	ND	ND	0.6	ND	-	ND	-	-	-	-	-	-	14.85	0.00	504.97
	05/07/90	ND	ND	ND	ND	ND	-	ND	-	ND	-	ND	-	-	14.75	0.00	505.07
	09/27/90	ND	ND	ND	ND	ND	-	ND	ND	1.2	ND	ND	-	-	14.61	0.00	505.21
	01/03/91	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	14.70	0.00	505.12
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.52	0.00	505.30
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.83	0.00	504.99
	04/06/92	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	13.81	0.00	506.01
	07/28/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.32	0.00	505.50
	10/16/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.12	0.00	504.70
	01/14/93*	ND	ND	ND	1.7	65	-	-	-	-	-	-	-	-	13.23	0.00	506.59
	03/26/93	0.9	ND	ND	ND	ND	-	-	-	-	-	-	-	-	12.20	0.00	507.62
	04/22/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	13.21	0.00	506.61
	07/20,21/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	16.71	0.00	503.11
	10/20/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.19	0.00	505.63
	01/20/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.05	0.00	505.77
	04/21/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.06	0.00	505.76
	07/21,22/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	ND	14.12	0.00	505.70

GROUNDWATER TECHNOLOGY ®

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-13	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	12.95	0.00	509.29
522.24	03/15/88	2	ND	9	3	250	-	-	-	-	-	-	-	-	14.82	0.00	507.42
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.03	0.00	507.21
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	16.10	0.00	506.14
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.73	0.00	507.51
	10/13/88	1.9	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.91	0.00	507.33
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	14.10	0.00	508.14
	01/12/89	ND	0.6	4	ND	ND	-	-	-	-	-	-	-	-	-	-	-
	04/10/89	ND	ND	8	ND	ND	ND	ND	-	-	-	-	-	-	14.99	0.00	507.25
	06/26/89	0.3	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	15.16	0.00	507.08
	10/13/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	15.23	0.00	507.01
	01/03/90	ND	ND	0.5	0.6	ND	-	ND	-	-	-	-	-	-	15.15	0.00	507.09
	05/08/90	ND	ND	ND	ND	ND	-	ND	-	ND	-	ND	-	-	15.02	0.00	507.22
	09/27/90	ND	0.6	ND	ND	ND	-	ND	ND	1.7	ND	ND	-	-	15.11	0.00	507.13
	01/03/91	ND	ND	ND	0.6	ND	-	ND	ND	ND	ND	ND	ND	-	15.08	0.00	507.16
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.77	0.00	507.47
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	15.43	0.00	506.81
	04/06/92	ND	ND	ND	ND	66	-	ND	ND	ND	ND	ND	ND	-	14.43	0.00	507.81
	07/28/92	8.2	ND	ND	1.1	60	-	-	-	-	-	-	-	-	15.37	0.00	506.87
	10/16/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.87	0.00	506.37
	01/14/93*	ND	ND	ND	1.3	100	-	-	-	-	-	-	-	-	12.83	0.00	509.41
	03/26/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	12.59	0.00	509.65
	04/22/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	13.16	0.00	509.08
	07/20,21/93	4	13	2	7	99	-	-	-	-	-	-	-	-	16.52	0.00	505.72
	10/20/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.13	0.00	507.11
	01/20/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.65	0.00	507.59
	04/21/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.88	0.00	507.36
	07/21,22/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	ND	14.95	0.00	507.29

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-14	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
520.08	03/15/88	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	05/10/88	13,000	29,000	2,700	18	120,000	-	-	-	-	-	-	-	-	13.39	0.00	506.69
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.65	0.00	505.43
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.47	0.00	506.61
	10/13/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	13.58	0.00	506.50
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	13.00	0.00	507.08
	01/12/89	ND	ND	ND	ND	NS	-	-	-	-	-	-	-	-	-	-	-
	04/12/89	ND	ND	ND	ND	NS	ND	ND	-	-	-	-	-	-	13.47	0.00	506.61
	06/26/89	14,000	25,000	3,400	26,000	140,000	-	30	-	-	-	-	-	-	13.80	0.00	506.28
	10/13/89	12,000	16,000	1,600	13,000	86,000	-	-	-	-	-	-	-	-	13.62	0.00	506.46
	01/03/90	9,500	16,000	1,800	13,000	120,000	-	25	3	-	-	-	-	-	13.91	0.00	506.17
	01/04/90	3,900	8,100	1,200	7,700	76,000	-	18	1	-	-	-	-	-	13.91	0.00	506.17
	05/08/90	7,500	17,000	1,400	14,000	62,000	-	13	-	ND	-	ND	-	-	13.89	0.00	506.19
	09/27/90	-	-	-	-	-	-	-	-	-	-	-	-	-	13.78	0.00	506.30
	01/03/91	-	-	-	-	-	-	-	-	-	-	-	-	-	13.72	0.00	506.36
	04/12/91	750	3,800	720	9,200	60,000	-	ND	ND	ND	ND	ND	ND	-	12.97	0.00	507.11
	09/04/91	2,800	11,000	1,300	13,000	110,000	-	-	-	-	-	-	-	-	13.84	0.00	506.24
	04/06/92	190	1,800	440	5,100	41,000	-	ND	ND	ND	ND	ND	ND	-	12.44	0.00	507.64
	07/28/92	2,300	9,700	1,800	15,000	130,000	-	-	-	-	-	-	-	-	13.70	0.00	506.38
	10/16/92	-	-	-	-	-	-	-	-	-	-	-	-	-	14.38	0.00	505.70
	01/14/93*	220	790	220	2,700	27,000	-	-	-	-	-	-	-	-	8.80	0.00	511.28
	03/26/93	330	1,600	460	4,000	23,000**	-	-	-	-	-	-	-	-	9.12	0.00	510.96
	04/22/93	840	2,300	130	3,500	17,000	-	-	-	-	-	-	-	-	12.10	SHEEN	507.98
TRAFFIC	07/20,21/93	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
#	10/20/93	-	-	-	-	-	-	-	-	-	-	-	-	-	14.31	0.00	505.77
	01/20/94	130	790	270	2,400	22,000	-	-	-	-	-	-	-	-	12.14	0.00	507.94
	04/21/94	68	330	72	960	9,400	-	-	-	-	-	-	-	-	11.93	0.00	508.15
	07/21,22/94	92	180	30	530	6,200	-	-	-	-	-	-	-	330	13.14	0.00	506.94

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-15	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	13.14	0.00	509.27
522.41	03/15/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.13	0.00	507.28
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.40	0.00	507.01
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	16.49	0.00	505.92
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.17	0.00	507.24
	10/13/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.33	0.00	507.08
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	13.70	0.00	508.71
	01/12/89	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	-	-	-
	04/12/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	15.34	0.00	507.07
	06/26/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	15.72	0.00	506.69
	10/13/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	15.96	0.00	506.45
	01/03/90	ND	ND	ND	ND	ND	-	ND	-	-	-	-	-	-	15.42	0.00	506.99
	05/08/90	ND	ND	ND	ND	ND	-	ND	-	ND	-	ND	-	-	15.62	0.00	506.79
	09/27/90	ND	ND	ND	ND	ND	-	ND	ND	2.9	ND	ND	-	-	15.59	0.00	506.82
	01/03/91	ND	ND	ND	0.6	ND	-	ND	ND	ND	ND	ND	ND	-	15.50	0.00	506.91
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	15.21	0.00	507.20
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	15.90	0.00	506.51
	04/06/92	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	14.88	0.00	507.53
	07/28/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.82	0.00	506.59
	10/16/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	16.25	0.00	506.16
	01/14/93*	ND	1.9	0.8	5.1	61	-	-	-	-	-	-	-	-	12.48	0.00	509.93
	03/26/93	ND	ND	ND	1	ND	-	-	-	-	-	-	-	-	12.67	0.00	509.74
	04/22/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	13.60	0.00	508.81
	07/20,21/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	16.87	0.00	505.54
	10/20/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.24	0.00	507.17
	01/20/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.01	0.00	507.40
	04/21/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	15.22	0.00	507.19
	07/21,22/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	ND	15.35	0.00	507.06

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-16 519.68	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	03/15/88	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	05/10/88	1,000	73	140	180	4,500	-	-	-	-	-	-	-	-	13.78	0.00	505.90
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.88	0.00	504.80
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.69	0.00	505.99
	10/13/88	16	5.5	ND	16	1,600	-	-	-	-	-	-	-	-	13.80	0.00	505.88
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	13.45	0.00	506.23
	01/12/89	360	11	78	51	1,000	-	-	-	-	-	-	-	-	-	-	-
	04/11/89	130	4	21	19	15,800	ND	8	-	-	-	-	-	-	13.78	0.00	505.90
	06/26/89	170	8	37	43	1,300	ND	ND	-	-	-	-	-	-	14.02	0.00	505.66
	10/13/89	20	ND	7	ND	1,000	ND	ND	-	-	-	-	-	-	14.01	0.00	505.67
	01/03/90	150	3	41	24	1,300	-	5	-	-	-	-	-	-	13.97	0.00	505.71
	05/07/90	49	4.4	29	13	480	-	4.5	-	ND	-	ND	-	-	14.45	0.00	505.23
	09/29/90	18	2.1	11	8.0	360	-	1.8	ND	ND	ND	ND	-	-	14.32	0.00	505.36
	01/03/91	12	ND	6	6	230	-	2	ND	0.8	ND	ND	ND	-	13.96	0.00	505.72
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	13.74	0.00	505.94
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	14.22	0.00	505.46
	04/06/92	30	ND	14	12.0	360	-	1.0	ND	ND	ND	ND	ND	-	13.18	0.00	506.50
	07/28/92	31	ND	6.8	16	210	-	-	-	-	-	-	-	-	13.93	0.00	505.75
	10/16/92	11	ND	5.1	3.4	140	-	-	-	-	-	-	-	-	14.92	0.00	504.76
	01/14/93*	24	ND	36	21	740	-	-	-	-	-	-	-	-	11.81	0.00	507.87
	03/26/93	22	2	16	10	730	-	-	-	-	-	-	-	-	11.36	0.00	508.32
	04/22/93	46	ND	24	6	850	-	-	-	-	-	-	-	-	12.30	0.00	507.38
TRAFFIC	07/20,21/93	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	10/20/93	18	2	16	17	290**	-	-	-	-	-	-	-	-	14.00	0.00	505.68
	01/20/94	10	1	12	9	360	-	-	-	-	-	-	-	-	13.48	0.00	506.20
	04/21/94	15	ND	13	11	220	-	-	-	-	-	-	-	-	13.92	0.00	505.76
	07/21,22/94	1.2	ND	ND	1.0	72	-	-	-	-	-	-	-	8	13.56	0.00	506.12

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-17 520.82	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	13.48	0.00	507.34
	03/15/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.76	0.00	506.06
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.77	0.00	506.05
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.84	0.00	504.98
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.63	0.00	506.19
	10/13/88	18	900	760	5,500	270,000	-	-	-	-	-	-	-	-	14.83	0.00	505.99
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	14.78	0.00	506.04
	01/12/89	ND	490	2,100	6,700	190,000	-	-	-	-	-	-	-	-	-	-	-
	04/11/89	30	150	320	1,000	27,000	6.0	ND	-	-	-	-	-	-	14.83	0.00	505.99
	06/26/89	50	390	660	2,000	20,000	ND	ND	-	-	-	-	-	-	15.03	0.00	505.79
	06/26/89	40	420	740	2,200	27,000	-	ND	-	-	-	-	-	-	15.03	0.00	505.79
	10/13/89	ND	48	230	480	17,000	ND	ND	-	-	-	-	-	-	15.02	0.00	505.80
	01/03/90	ND	29	120	210	14,000	-	ND	-	-	-	-	-	-	15.10	0.00	505.72
	05/08/90	25	130	210	470	9,500	-	ND	-	ND	-	ND	-	-	15.12	0.00	505.70
	09/29/90	ND	ND	ND	ND	ND	-	ND	ND	ND	1.9	ND	-	-	14.99	0.00	505.83
	09/29/90	ND	3.4	ND	ND	ND	-	ND	ND	1.8	1.9	ND	-	-	14.99	0.00	505.83
	01/03/91	ND	28	56	140	3,700	-	ND	ND	1.8	1.9	ND	ND	-	14.92	0.00	505.90
	01/03/91	ND	10	59	150	8,600	-	ND	ND	ND	ND	ND	ND	-	14.92	0.00	505.90
	04/12/91	ND	5	47	120	8,600	-	ND	ND	ND	ND	ND	ND	-	14.71	0.00	506.11
	04/12/91	ND	11	48	120	4,400	-	ND	ND	ND	ND	ND	ND	-	14.71	0.00	506.11
	09/04/91	ND	27	49	79	5,800	-	ND	ND	ND	ND	ND	ND	-	15.17	0.00	505.65
	09/04/91	ND	21	36	61	4,100	-	ND	ND	ND	ND	ND	ND	-	15.17	0.00	505.65
	04/06/92	ND	5.8	27	29	2,300	-	ND	ND	ND	ND	ND	ND	-	14.14	0.00	506.68
	07/28/92	99	180	170	430	11,000	-	-	-	-	-	-	-	-	15.18	0.00	505.64
	10/16/92	ND	4,800	3,900	6,600	1,200,000	-	-	-	-	-	-	-	-	15.76	0.00	505.06
	01/14/93*	9.3	9.1	23	34	3,500	-	-	-	-	-	-	-	-	13.44	0.00	507.38
	03/26/93	ND	19	20	35	3,700**	-	-	-	-	-	-	-	-	12.46	0.00	508.36
	04/22/93	16	68	44	97	8,900	-	-	-	-	-	-	-	-	13.30	0.00	507.52
	07/20,21/93	5	35	33	62	4,200	-	-	-	-	-	-	-	-	17.21	0.00	503.61
	10/20/93	5	12	43	64	4,500	-	-	-	-	-	-	-	-	15.09	0.00	505.73
	01/20/94	4	42	24	73	1,900	-	-	-	-	-	-	-	-	14.47	0.00	506.35
	04/21/94	5.0	20	23	42	1,100	-	-	-	-	-	-	-	-	14.95	0.00	505.87
	07/21,22/94	ND	ND	ND	0.9	72	-	-	-	-	-	-	-	ND	14.60	0.00	506.22

GROUNDWATER TECHNOLOGY ®

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-18	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
518.96	03/15/88	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	05/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	14.89	0.00	504.07
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	13.79	0.00	505.17
	10/13/88	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	13.86	0.00	505.10
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	13.94	0.00	505.02
	01/12/89	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	-	0.00	518.96
	04/11/89	ND	ND	ND	ND	ND	ND	3.6	-	-	-	-	-	-	14.86	0.00	504.10
	06/26/89	ND	ND	ND	ND	ND	ND	3.1	-	-	-	-	-	-	14.02	0.00	504.94
	10/13/89	ND	ND	ND	ND	ND	ND	ND	-	-	-	-	-	-	15.06	0.00	503.90
	01/03/90	ND	ND	ND	ND	ND	-	1	-	-	-	-	-	-	14.07	0.00	504.89
	05/07/90	ND	ND	ND	ND	ND	-	ND	-	ND	-	ND	-	-	14.01	0.00	504.95
	09/27/90	ND	ND	ND	ND	ND	-	ND	ND	0.6	ND	ND	-	-	13.91	0.00	505.05
	01/03/91	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	13.98	0.00	504.98
	04/12/91	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	13.83	0.00	505.13
	09/04/91	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	14.20	0.00	504.76
	04/06/92	ND	ND	ND	ND	ND	-	ND	ND	ND	ND	ND	ND	-	13.07	0.00	505.89
	07/28/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	13.55	0.00	505.41
	10/16/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.38	0.00	504.58
	01/14/93*	ND	ND	ND	1.8	56	-	-	-	-	-	-	-	-	12.46	0.00	506.50
	03/26/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	11.46	0.00	507.50
	04/22/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	12.58	0.00	506.38
	07/20,21/93	ND	0.5	ND	ND	92	-	-	-	-	-	-	-	-	15.64	0.00	503.32
PAVED OVER?	10/20/93	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	01/20/94	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	04/21/94	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

GROUNDWATER TECHNOLOGY

Table
HISTORICAL GROUNDWATER ANALYTICAL RESULTS AND MONITORING DATA

CHEVRON SERVICE STATION #9-1924
4904 SOUTHFRONT ROAD, LIVERMORE, CALIFORNIA

WELL ID/ ELEVATION (TOC)	DATE	BENZENE (ppb)	TOLUENE (ppb)	ETHYL-BENZENE (ppb)	XYLENES (ppb)	TPH-G (ppb)	TOG (ppb)	1,2-DCA (ppb)	OTHER (ppb)	MC (ppb)	1,1,1-TCA (ppb)	1,1-DCA (ppb)	PCE (ppb)	TOTAL LEAD (ppb)	DTW (feet)	SPT (feet)	WTE (feet)
C-19	03/28/86	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
520.99	03/15/88	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	05/10/88	1,400	360	350	1,300	18	-	-	-	-	-	-	-	-	15.23	0.00	505.76
	06/10/88	-	-	-	-	-	-	-	-	-	-	-	-	-	16.58	0.00	504.41
	07/25/88	-	-	-	-	-	-	-	-	-	-	-	-	-	15.19	0.00	505.80
	10/13/88	8.3	4.7	4.4	ND	ND	-	-	-	-	-	-	-	-	15.27	0.00	505.72
	01/01/89	-	-	-	-	-	-	-	-	-	-	-	-	-	15.20	0.00	505.79
	01/12/89	5	4	ND	ND	ND	-	-	-	-	-	-	-	-	-	-	-
	04/11/89	1.8	ND	ND	ND	ND	ND	13	-	-	-	-	-	-	15.24	0.00	505.75
	04/11/89	1.2	ND	0.6	0.6	500	-	14	-	-	-	-	-	-	15.24	0.00	505.75
	06/26/89	2.5	ND	ND	ND	500	ND	26	-	-	-	-	-	-	15.44	0.00	505.55
	10/13/89	ND	ND	ND	ND	540	ND	13	13	-	-	-	-	-	15.47	0.00	505.52
	01/03/90	1.2	0.7	1.3	0.9	ND	-	11	-	-	-	-	-	-	15.45	0.00	505.54
	05/07/90	ND	ND	ND	ND	ND	-	4.6	-	ND	-	ND	-	-	15.68	0.00	505.31
	09/28/90	ND	ND	ND	ND	ND	-	ND	ND	1.2	ND	ND	-	-	15.52	0.00	505.47
	01/03/91	ND	ND	ND	ND	66	-	1	ND	ND	ND	ND	0.9	-	15.56	0.00	505.43
	04/12/91	-	-	-	-	-	-	-	-	-	-	-	-	-	15.20	0.00	505.79
	09/04/91	-	-	-	-	-	-	-	-	-	-	-	-	-	15.60	0.00	505.39
	04/06/92	0.7	ND	1.0	ND	110	-	1.9	ND	ND	ND	ND	ND	-	14.58	0.00	506.41
	07/28/92	1.4	ND	1.0	4.2	ND	-	-	-	-	-	-	-	-	15.26	0.00	505.73
	10/16/92	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	16.00	0.00	504.99
	01/14/93*	1.1	ND	0.9	0.9	100	-	-	-	-	-	-	-	-	13.69	0.00	507.30
	03/26/93	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	12.96	0.00	508.03
	04/22/93	0.6	1	1	1	250**	-	-	-	-	-	-	-	-	14.18	0.00	506.81
	07/20,21/93	ND	ND	0.8	2	390**	-	-	-	-	-	-	-	-	16.58	0.00	504.41
	10/20/93	ND	ND	ND	ND	ND**	-	-	-	-	-	-	-	-	15.23	0.00	505.76
	01/20/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	-	14.84	0.00	506.15
	04/21/94	ND	ND	1.0	ND	60	-	-	-	-	-	-	-	-	15.26	0.00	505.73
	07/21,22/94	ND	ND	ND	ND	ND	-	-	-	-	-	-	-	ND	14.90	0.00	506.09

Explanation

Elevations are expressed as feet above mean sea level.
TOC = Top of casing
WTE = Water table elevation (well elevation - (DTW-(SPT x 0.8))
DTW = Depth to water
SPT = Separate-phase hydrocarbon thickness
TPH-G = Total Petroleum Hydrocarbons as Gasoline (ppb)
TOG = Total Oil & Grease (EPA Method 503D & 503E)
* = Rinsate sample contaminated; resampled 03/26/93
** = Uncategorized compound not included in gasoline hydrocarbon total
*** = Hydrocarbon pattern uncharacteristic of fresh gasoline
# = Not enough water to purge and sample

PCE = Tetrachloroethene
1,2-DCA = 1,2-Dichloroethane
MC = Methylene Chloride
TCA = 1,1,1-Trichloroethane
1,1-DCA = 1,1-Dichloroethane
ND = Not detected at or above the minimum quantitation limit (MQL)
-- = Not sampled, not monitored, inaccessible
OTHER = 5 ppb Carbon Disulfide detected in C-1 on 10/13/89
3 ppb Vinyl Chloride detected in C-14 on 1/3/90
1 ppb Vinly Chloride detected in C-14 on 1/4/90
13 ppb Carbon Disulfide detected in C-19 on 10/13/89

GARTAB1.WK1

GROUNDWATER TECHNOLOGY

ATTACHMENT 3

Groundwater Monitoring and Sample Collection Protocol
and
Field Data Sheets

GROUNDWATER TECHNOLOGY GROUNDWATER MONITORING AND SAMPLE COLLECTION PROTOCOL

Groundwater Monitoring

Groundwater monitoring is accomplished using a INTERFACE PROBE™ Well Monitoring System. The INTERFACE PROBE™ Well Monitoring System is a hand held, battery operated device for measuring the depth to separate-phase hydrocarbons and depth to water. The INTERFACE PROBE™ Well Monitoring System consists of a dual-sensing probe which utilizes an optical liquid sensor and electrical conductivity to distinguish between water and petroleum products.

Monitoring is accomplished by measuring from the surveyed top of well casing or grade to groundwater and separate-phase hydrocarbons if present. The static water elevation is then calculated for each well and a potentiometric surface map is constructed. If separate-phase hydrocarbons are detected the water elevation is adjusted by the following calculation:

(Product thickness) x (0.8) + (Water elevation) = Corrected water elevation

Groundwater monitoring wells are monitored in order of wells with lowest concentrations of volatile organic compounds to wells with the highest concentrations, based upon historical concentrations. If separate-phase hydrocarbons are encountered in a well, the product is visually inspected to confirm and note color, amount, and viscosity. Monitoring equipment is washed with laboratory grade detergent and rinsed with distilled or deionized water before monitoring each well.

Groundwater Sampling

Before groundwater samples are collected, sufficient water is purged from each well to ensure representative formation water is entering the well. Wells are purged and sampled in the same order as monitoring, from wells with the lowest concentrations of volatile organic compounds to wells with the highest concentrations. Wells are purged using either a polyvinyl chloride (PVC) bailer fitted with a check valve or with a stainless steel submersible Grundfos pump. The purge equipment is decontaminated before use in each well by washing with laboratory grade detergent and tripled rinsing with deionized or distilled water. A minimum of 3 well-casing volumes of water are removed from each well while pH, electrical conductivity, and temperature are recorded to verify that "fresh" formation water is being sampled and the parameters have stabilized. If the well is low yielding, it may be purged dry and sampled before 3 casing volumes are purged. The wells are then allowed to recharge to approximately 80 percent of the initial water level before a sample is collected.

Groundwater samples are collected from each well using a new, prepackaged disposable bailer and string. The water sample is decanted from the bailer into laboratory-provided containers (appropriate for the analyses required) so that there is no headspace in the containers. Samples collected for benzene, toluene, ethylbenzene, xylene, and total petroleum hydrocarbons (TPH)-as-gasoline analyses are collected in 40-milliliter vials fitted with Teflon® septum lids. Samples are preserved with hydrochloric acid (HCL) to a pH of less than 2. Dissolved metals samples are filtered through a 0.45-micron paper filter in the field and preserved as required before submitting to the laboratory for analyses. All samples are labeled immediately upon collection and logged on the chain-of-custody record. Sample label and chain-of-custody recorded information includes the project name and number, sample identification, date and time of collection, analyses requested, and the sampler's name. Sample bottles are placed in plastic bags (to protect the bottles and labels) and on ice (frozen water) in an insulated cooler and are shipped under chain-of-custody protocol to the laboratory.

The chain-of-custody record documents who has possession of the samples until the analyses is performed. Other pertinent information is also noted for the laboratory use on the chain-of-custody record.

Trip blanks (TBLBs) are used for each project as a quality assurance/quality control measure. The TBLBs are prepared by the laboratory and are placed in the insulated cooler and accompany the field samples throughout the sampling event.

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St.., Livermore

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Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-12

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: 5 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp X C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
11:02	21.3	0.89	6.57	0	Cloudy	
11:03	21.4	1.25	6.61	2	↓	
11:04	21.1	1.24	6.66	3	↓	
11:05	20.8	1.24	6.70	4	↓	
11:06	20.7	1.24	6.71	5	Clear.	

Project Name: Chevron -Livermore

Site Address: 4904 Southfront St., Livermore

Project Number: 020104233.0610

Date: 7/21/94

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Project Manager: Ken Johnson

Well ID: C-15

Well Diameter: 3

DTW Measurements:
Initial: _____
Recharge: _____

Calc Well Volume: _____ gal
Well Volume: 6 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp °C / °F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
11:14	20.8	1.62	6.79	0	Clear.	
11:15	21.0	1.71	6.79	2	↓	
11:16	20.9	1.71	6.73	4	↓	
11:17	20.8	1.71	6.69	6	↓	

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

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Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-18

Well Diameter: 2

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: _____ gal

Purge Method
Peristaltic_____
Gear Drive_____
Submersible_____

Pump Depth_____ ft.
Hand Bailed_____
Air Lift_____
Other_____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp ~~X~~ C / ~~X~~ F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
						UNDER ASPHALT

Project Name: Chevron -Livermore

Site Address: 4904 Southfront St.., Livermore

Project Number: 020104233.0610

Date: 7/21/94

Page 5 of 18

Project Manager: Ken Johnson

Well ID: C-10

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: 2.1 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible X

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp X C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
11:26	20.0	1.31	6.68	5	cloudy	
11:30	20.0	1.32	6.69	10	↓	
11:33	20.1	1.32	6.70	15	↓	
11:37	20.1	1.32	6.70	20	↓	
11:40	20.1	1.31	6.72	21	↓	

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

Page 6 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-13

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: 4 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp ~~C~~ C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
11:48	21.5	1.60	6.72	0	clear	
11:49	21.7	1.60	6.72	1	↓	
11:50	22.0	1.60	6.73	2	↓	
11:51	21.9	1.57	6.73	4	↓	

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

Page 7 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-3

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: 4 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp °C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
11:57	22.8	1.58	6.78	0	Clear	
11:58	22.4	1.56	6.83	1		
11:59	22.5	1.57	6.84	2		DRY OUT 3 gallons.
12:00				4		

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

Page 8 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-19

Well Diameter: 2

DTW Measurements:
Initial: _____
Recharge: _____

Calc Well Volume: _____ gal
Well Volume: ~~5~~ gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed 0
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp ~~C~~ F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
12:09	22.9	1.60	6.80	0	cloudy	
12:10	22.8	1.44	6.81	1	↓	
12:11	22.4	1.45	6.80	2		
12:13	22.0	1.47	6.77	4		
12:14	21.7	1.44	6.76	5		

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St.., Livermore

Page 9 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-8

Well Diameter: 3

DTW Measurements:
Initial: _____
Recharge: _____

Calc Well Volume: _____ gal
Well Volume: 10 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible 10

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp °C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
12:22	22.0	0.94	6.73	2	Clear	
12:24	20.3	0.93	6.77	4	↓	
12:26	19.8	0.94	6.83	6		
12:28	19.4	0.95	6.85	8		
12:30	19.2	0.92	6.87	10		

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

Page 10 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-16

Well Diameter: 3

DTW Measurements:
Initial: _____
Recharge: _____

Calc Well Volume: _____ gal
Well Volume: 17 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
12:39	20.2	1.00	6.88	5	clear	
12:43	20.1	1.04	6.84	10	↓	
12:46	20.0	1.00	6.81	15		
12:49	20.0	1.01	6.82	16		
12:48	20.1	1.00	6.82	17		

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

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Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-5

Well Diameter: 3

DTW Measurements:
Initial: _____
Recharge: _____

Calc Well Volume: _____ gal
Well Volume: 17 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp °C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
12:47	21.9	1.46	6.83	5	cloudy	
12:49	21.9	1.45	6.77	10	↓	
12:51	21.9	1.46	6.75	15		
12:53	22.0	1.46	6.78	17	↓	

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

Page 12 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-1

Well Diameter: 3

DTW Measurements:
Initial: _____
Recharge: _____

Calc Well Volume: _____ gal
Well Volume: 4 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp ~~X~~ C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
13:03	22.6	1.~~34~~	6.75	0	Clear	
13:04	23.2	1.41	6.74	1	↓	
13:05	23.1	1.36	6.76	2		
13:07	23.0	1.37	6.76	4		

Project Name: Chevron -Livermore

Site Address: 4904 Southfront St., Livermore

Project Number: 020104233.0610

Date: 7/21/94

Page 13 of 18

Project Manager: Ken Johnson

Well ID: C-2

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: 12 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible X

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp X C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
13:16	22.7	1.18	6.80	2	Clear	
13:18	21.9	1.21	6.80	4		
13:20	21.5	1.28	6.80	6		
13:22	21.2	1.32	6.79	8		
13:24	21.2	1.33	6.79	10		
13:26	21.2	1.33	6.79	12	↓	

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St.., Livermore

Page 14 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-17

Well Diameter: 3

DTW Measurements:
Initial: _____
Recharge: _____

Calc Well Volume: _____ gal
Well Volume: 6 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____

Other: _____

Time	Temp C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
13:34	21.8	1.04	6.81	0	clear	
13:36	21.9	0.98	6.80	2		
13:37	21.8	1.01	6.83	4		
13:39	21.9	1.02	6.83	6	↓	

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

Page 15 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: ~~C-7~~ C-7

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: 9 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible X

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp ~~C~~ F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
13:49	22.5	1.36	6.80	2	Clear	
13:51	22.3	1.36	6.78	4	↓	
13:53	22.2	1.37	6.77	6		
13:55	22.2	1.37	6.78	8		
13:57	22.2	1.38	6.77	9		

Project Name: **Chevron -Livermore** Date: 7/21/94

Site Address: **4904 Southfront St., Livermore** Page 16 of 18

Project Number: **020104233.0610** Project Manager: **Ken Johnson**

Well ID: C-9

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: ~~70~~ gal

Purge Method
Peristaltic_____
Gear Drive_____
Submersible_____

Pump Depth_____ft.
Hand Bailed_____
Air Lift_____
Other_____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
14:07	22.9	0.98	6.77	2	DRK GREY	
14:09	21.4	0.84	6.81	4	↓	
14:11	20.8	0.88	6.80	6		
14:13	20.5	0.92	6.78	8		
14:15	20.4	0.93	6.77	10	↓	

Project Name: **Chevron -Livermore** Date: 7/21/94

Site Address: **4904 Southfront St., Livermore** Page 17 of 18

Project Number: **020104233.0610** Project Manager: **Ken Johnson**

Well ID: C-14

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: 2 gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible _____

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp X C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
14:23	20.9	1.02	6.79	0	clear	
14:32	20.8	1.01	6.78	1	↓	DRY @ 1 gal.
				2		

Project Name: Chevron -Livermore

Date: 7/21/94

Site Address: 4904 Southfront St., Livermore

Page 18 of 18

Project Number: 020104233.0610

Project Manager: Ken Johnson

Well ID: C-6

Well Diameter: 3

DTW Measurements:
Initial: _____ Calc Well Volume: _____ gal
Recharge: _____ Well Volume: ~~10~~ gal

Purge Method
Peristaltic _____
Gear Drive _____
Submersible X

Pump Depth _____ ft.
Hand Bailed _____
Air Lift _____
Other _____

Instruments Used
YSI: X
Hydac: _____
Omega: _____
Other: _____

Time	Temp X C / F	Conductivity	pH	Purge Volume Gallons	Turbidity	Comments
14:37	222	1.24	6.78	2	Clear	
14:39	220	1.25	6.77	4	↓	
14:41	219	1.28	6.70	6		
14:43	219	1.29	6.70	8		
14:45	219	1.29	6.71	10	↓	
						~

ATTACHMENT 4

Laboratory Report

GTEL
ENVIRONMENTAL
LABORATORIES, INC.

Western Region
4080 Pike Lane, Suite C
Concord, CA 94520
(510) 685-7852
(800) 544-3422 Inside CA
FAX (510) 825-0720

Client Number: 020104233
Consultant Project Number: 020104233.0610
Facility Number: 9-1924
Project ID: 4904 S. Front St. Livermore
Work Order Number: C4-07-0372

August 2, 1994

Ken Johnson
Groundwater Technology, Inc.
4057 Port Chicago Hwy.
Concord, CA 94520

Enclosed please find the analytical results for samples received by GTEL Environmental Laboratories, Inc. on 07/23/94.

A formal Quality Assurance/Quality Control (QA/QC) program is maintained by GTEL, which is designed to meet or exceed the EPA requirements. Analytical work for this project met QA/QC criteria, unless otherwise stated in the footnotes.

GTEL is certified by the California State Department of Health Services, Laboratory certification number E1075, to perform analyses for drinking water, wastewater, and hazardous waste materials according to EPA protocols.

If you have any questions concerning this analysis or if we can be of further assistance, please call our Customer Service Representative.

Sincerely,

GTEL Environmental Laboratories, Inc.

William Luhrda
for
Rashmi Shah
Laboratory Director

Client Number: 020104233
Consultant Project Number: 020104233.0610
Facility Number: 9-1924
Project ID: 4904 S. Front St. Livermore
Work Order Number: C4-07-0372

ANALYTICAL RESULTS

Lead in Water by Graphite Furnace AA

EPA Methods 7421[1]/3005[2]

GTEL Sample Number		02	03	04	05
Client Identification		C-11	C-12	C-15	C-10
Date Sampled		07/22/94	07/22/94	07/22/94	07/22/94
Date Prepared		07/29/94	07/29/94	07/29/94	07/29/94
Date Analyzed		08/01/94	08/01/94	08/01/94	08/01/94
Analyte	Detection Limit, ug/L	Concentration, ug/L			
Lead, total	5	7	<5	<5	<5
Detection Limit Multiplier		1	1	1	1

GTEL Sample Number		06	07	08	09
Client Identification		C-13	C-3	C-19	C-8
Date Sampled		07/22/94	07/22/94	07/22/94	07/22/94
Date Prepared		07/29/94	07/29/94	07/29/94	07/29/94
Date Analyzed		08/01/94	08/01/94	08/01/94	08/01/94
Analyte	Detection Limit, ug/L	Concentration, ug/L			
Lead, total	5	<5	<5	<5	<5
Detection Limit Multiplier		1	1	1	1

1. Test Methods for Evaluating Solid Waste, SW-846, Third Edition, Revision 0, November 1986.
2. Sample preparation by Modified EPA Method 3005. Acid concentration have been adjusted to allow analysis by GFAAS.

Client Number: 020104233
Consultant Project Number: 020104233.0610
Facility Number: 9-1924
Project ID: 4904 S. Front St. Livermore
Work Order Number: C4-07-0372

ANALYTICAL RESULTS

Lead in Water by Graphite Furnace AA

EPA Methods 7421[1]/3005[2]

GTEL Sample Number		10	11	12	13
Client Identification		C-16	C-5	C-1	C-2
Date Sampled		07/22/94	07/22/94	07/22/94	07/22/94
Date Prepared		07/29/94	07/29/94	07/29/94	07/29/94
Date Analyzed		08/01/94	08/01/94	08/01/94	08/01/94
Analyte	Detection Limit, ug/L	Concentration, ug/L			
Lead, total	5	8	<5	<5	<5
Detection Limit Multiplier		1	1	1	1

GTEL Sample Number		14	15	16	17
Client Identification		C-17	C-7	C-9	C-14
Date Sampled		07/22/94	07/22/94	07/22/94	07/22/94
Date Prepared		07/29/94	07/29/94	07/29/94	07/29/94
Date Analyzed		08/01/94	08/01/94	08/01/94	08/01/94
Analyte	Detection Limit, ug/L	Concentration, ug/L			
Lead, total	5	<5	<5	13	330
Detection Limit Multiplier		1	1	1	4

1. Test Methods for Evaluating Solid Waste, SW-846, Third Edition, Revision 0, November 1986.
2. Sample preparation by Modified EPA Method 3005. Acid concentration have been adjusted to allow analysis by GFAAS.

Client Number: 020104233
Consultant Project Number: 020104233.0610
Facility Number: 9-1924
Project ID: 4904 S. Front St. Livermore
Work Order Number: C4-07-0372

ANALYTICAL RESULTS

Lead in Water by Graphite Furnace AA

EPA Methods 7421[1]/3005[2]

GTEL Sample Number		18	072994 MET		
Client Identification		C-6	METHOD BLANK		
Date Sampled		07/22/94	--		
Date Prepared		07/29/94	07/29/94		
Date Analyzed		08/01/94	08/01/94		
Analyte	Detection Limit, ug/L	Concentration, ug/L			
Lead, total	5	<5	<5		
Detection Limit Multiplier		1	1		

1. Test Methods for Evaluating Solid Waste, SW-846, Third Edition, Revision 0, November 1986.
2. Sample preparation by Modified EPA Method 3005. Acid concentration have been adjusted to allow analysis by GFAAS.

Client Number: 020104233
Consultant Project Number: 020104233.0610
Facility Number: 9-1924
Project ID: 4904 S. Front St. Livermore
Work Order Number: C4-07-0372

QC Matrix Spike and Duplicate Spike Results

Matrix: Water

Analyte	Sample ID	Spike Amount	Units	Recovery, %	Duplicate Recovery, %	RPD, %	Control Limits
Metals:							
Lead	C4070372	50.0	ug/L	88.8	82.6	7.23	75 - 125

GTEL Client ID: 020104233 ANALYTICAL RESULTS
Login Number: C4070372 Volatile Organics
Project ID (number): 020104233.0610 Method: EPA 8020
Project ID (name): CHEVRON #9-1924, 4904 S. Front Street, Livermore, CA Matrix: Aqueous

GTEL Sample Number	C4070372-01	C4070372-02	C4070372-03	C4070372-04
Client ID	TB-LB	C-11	C-12	C-15
Date Sampled	07/22/94	07/22/94	07/22/94	07/22/94
Date Analyzed	07/27/94	07/27/94	07/26/94	07/26/94
Dilution Factor	1.00	1.00	1.00	1.00

Analyte	Reporting Limit	Units	Concentration:			
Benzene	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
Toluene	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
Ethylbenzene	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
Xylenes (total)	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
TPH as GAS	50.	ug/L	< 50.	< 50.	< 50.	< 50.
BFB (Surrogate)	--	%	89.2	88.0	90.4	90.4

Notes:

Dilution Factor:

Dilution factor indicates the adjustments made for sample dilution.

EPA 8020:

"Test Methods for Evaluating Solid Waste, Physical and Chemical Methods, SW-846", Third Edition, Revision 1, US EPA November 1986. Bromofluorobenzene surrogate recovery acceptability limits are 62-129%. Gasoline range hydrocarbons (TPH) quantitated by GC/FID with purge and trap.

C4070372-02:

Uncategorized compound is not included in gasoline concentration.

GTEL ENVIRONMENTAL LABORATORIES, INC.

GTEL Client ID: 020104233 ANALYTICAL RESULTS
Login Number: C4070372 Volatile Organics
Project ID (number): 020104233.0610 Method: EPA 8020
Project ID (name): CHEVRON #9-1924, 4904 S. Front Street, Livermore, CA Matrix: Aqueous

GTEL Sample Number	C4070372-05	C4070372-06	C4070372-07	C4070372-08
Client ID	C-10	C-13	C-3	C-19
Date Sampled	07/22/94	07/22/94	07/22/94	07/22/94
Date Analyzed	07/26/94	07/27/94	07/27/94	07/27/94
Dilution Factor	1.00	1.00	1.00	1.00

Analyte	Reporting Limit	Units	Concentration:			
Benzene	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
Toluene	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
Ethylbenzene	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
Xylenes (total)	0.5	ug/L	< 0.5	< 0.5	< 0.5	< 0.5
TPH as GAS	50.	ug/L	< 50.	< 50.	< 50.	< 50.
BFB (Surrogate)	--	%	90.1	87.1	89.0	87.1

Notes:

Dilution Factor:

Dilution factor indicates the adjustments made for sample dilution.

EPA 8020:

"Test Methods for Evaluating Solid Waste, Physical and Chemical Methods, SW-846", Third Edition, Revision 1, US EPA November 1986. Bromofluorobenzene surrogate recovery acceptability limits are 62-129%. Gasoline range hydrocarbons (TPH) quantitated by GC/FID with purge and trap.

C4070372-05:

Uncategorized compound is not included in gasoline concentration.

C4070372-08:

Uncategorized compound is not included in gasoline concentration.

GTEL ENVIRONMENTAL LABORATORIES, INC.

GTEL Client ID: 020104233 ANALYTICAL RESULTS
Login Number: C4070372 Volatile Organics
Project ID (number): 020104233.0610 Method: EPA 8020
Project ID (name): CHEVRON #9-1924, 4904 S. Front Street, Livermore, CA Matrix: Aqueous

GTEL Sample Number	C4070372-09	C4070372-10	C4070372-11	C4070372-12
Client ID	C-8	C-16	C-5	C-1
Date Sampled	07/22/94	07/22/94	07/22/94	07/22/94
Date Analyzed	07/27/94	07/27/94	07/27/94	07/27/94
Dilution Factor	1.00	1.00	1.00	1.00

Analyte	Reporting Limit	Units	Concentration:			
Benzene	0.5	ug/L	< 0.5	1.2	0.9	4.7
Toluene	0.5	ug/L	< 0.5	< 0.5	< 0.5	2.7
Ethylbenzene	0.5	ug/L	< 0.5	< 0.5	6.5	34.
Xylenes (total)	0.5	ug/L	< 0.5	1.0	1.0	13.
TPH as GAS	50.	ug/L	51.	72.	370	800
BFB (Surrogate)	--	%	114.	88.8	96.3	96.5

Notes:

Dilution Factor:

Dilution factor indicates the adjustments made for sample dilution.

EPA 8020:

"Test Methods for Evaluating Solid Waste, Physical and Chemical Methods, SW-846", Third Edition, Revision 1, US EPA November 1986. Bromofluorobenzene surrogate recovery acceptability limits are 62-129%. Gasoline range hydrocarbons (TPH) quantitated by GC/FID with purge and trap.

C4070372-09:

Uncategorized compounds are not included in gasoline concentration.

C4070372-10:

Uncategorized compound is not included in gasoline concentration.

C4070372-11:

Uncategorized compound is not included in gasoline concentration.

C4070372-12:

Uncategorized compound is not included in gasoline concentration.

GTEL ENVIRONMENTAL LABORATORIES, INC.

GTEL Client ID: 020104233 ANALYTICAL RESULTS
Login Number: C4070372 Volatile Organics
Project ID (number): 020104233.0610 Method: EPA 8020
Project ID (name): CHEVRON #9-1924, 4904 S. Front Street, Livermore, CA Matrix: Aqueous

GTEL Sample Number	C4070372-13	C4070372-14	C4070372-15	C4070372-16
Client ID	C-2	C-17	C-7	C-9
Date Sampled	07/22/94	07/22/94	07/22/94	07/22/94
Date Analyzed	07/27/94	07/27/94	07/27/94	07/29/94
Dilution Factor	1.00	1.00	1.00	1.00

Analyte	Reporting Limit	Units	Concentration:			
Benzene	0.5	ug/L	10.	< 0.5	50.	< 0.5
Toluene	0.5	ug/L	2.8	< 0.5	4.4	4.0
Ethylbenzene	0.5	ug/L	5.2	< 0.5	110	14.
Xylenes (total)	0.5	ug/L	53.	0.9	22.	10.
TPH as GAS	50.	ug/L	1200	72.	1700	1100
BFB (Surrogate)	--	%	102.	91.1	112.	101.

Notes:

Dilution Factor:

Dilution factor indicates the adjustments made for sample dilution.

EPA 8020:

"Test Methods for Evaluating Solid Waste, Physical and Chemical Methods, SW-846", Third Edition, Revision 1, US EPA November 1986. Bromofluorobenzene surrogate recovery acceptability limits are 62-129%. Gasoline range hydrocarbons (TPH) quantitated by GC/FID with purge and trap.

C4070372-13:

Uncategorized compound is not included in gasoline concentration.

C4070372-15:

Uncategorized compound is not included in gasoline concentration.

C4070372-16:

Uncategorized compound is not included in gasoline concentration.

GTEL ENVIRONMENTAL LABORATORIES, INC.

GTEL Client ID: 020104233 ANALYTICAL RESULTS
Login Number: C4070372 Volatile Organics
Project ID (number): 020104233.0610 Method: EPA 8020
Project ID (name): CHEVRON #9-1924, 4904 S. Front Street, Livermore, CA Matrix: Aqueous

GTEL Sample Number	C4070372-17	C4070372-18	--	--	
Client ID	C-14	C-6	--	--	
Date Sampled	07/22/94	07/22/94	--	--	
Date Analyzed	07/28/94	07/27/94	--	--	
Dilution Factor	10.0	10.0	--	--	

Analyte	Reporting Limit	Units	Concentration:			
Benzene	0.5	ug/L	92.	< 5.0	--	--
Toluene	0.5	ug/L	180	7.1	--	--
Ethylbenzene	0.5	ug/L	30.	130	--	--
Xylenes (total)	0.5	ug/L	530	130	--	--
TPH as GAS	50.	ug/L	6200	4500	--	--
BFB (Surrogate)	--	%	88.6	91.1	--	--

Notes:

Dilution Factor:

Dilution factor indicates the adjustments made for sample dilution.

EPA 8020:

"Test Methods for Evaluating Solid Waste, Physical and Chemical Methods, SW-846", Third Edition, Revision 1, US EPA November 1986. Bromofluorobenzene surrogate recovery acceptability limits are 62-129%. Gasoline range hydrocarbons (TPH) quantitated by GC/FID with purge and trap.

C4070372-18:

Uncategorized compound is not included in gasoline concentration.

GTEL ENVIRONMENTAL LABORATORIES, INC.

GTEL Client ID: 020104233 QUALITY CONTROL RESULTS
Login Number: C4070372 Volatile Organics
Project ID (number): 020104233.0610 Method: EPA 8020
Project ID (name): CHEVRON #9-1924, 4904 S. Front Street, Livermore, CA Matrix: Aqueous

Method Blank Results

QC Batch No: Q072694-1
Date Analyzed: 26-JUL-94

Analyte	Method:EPA 8020 Concentration: ug/L
Benzene	< 0.30
Toluene	< 0.30
Ethylbenzene	< 0.30
Xylenes (Total)	< 0.50
TPH as Gasoline	< 10.0

Notes:

GTEL ENVIRONMENTAL LABORATORIES, INC.

GTEL Client ID: 020104233 QUALITY CONTROL RESULTS
Login Number: C4070372 Volatile Organics
Project ID (number): 020104233.0610 Method: EPA 8020
Project ID (name): CHEVRON #9-1924, 4904 S. Front Street, Livermore, CA Matrix: Aqueous

Matrix Spike and Matrix Spike Duplicate Results

Analyte	Original Concentration	Spike Amount	Matrix Spike Concentration	Matrix Spike Recovery, %	Matrix Spike Duplicate Concentration	Matrix Spike Duplicate Recovery, %	RPD, %	Acceptability Limits RPD, %	Acceptability Limits Recovery, %
EPA 8020	GTEL Sample ID:C4070367-02		Spike ID:Q072694-3		Dup. ID:Q072694-4				
Units: ug/L	Analysis Date:25-JUL-94		26-JUL-94		27-JUL-94		Client ID:Batch QC		
Benzene	< 0.30	20.0	19.4	97.0	18.6	93.0	4.2	34	57.3-138%
Toluene	< 0.30	20.0	18.5	92.5	17.8	89.0	3.8	31	63-134%
Ethylbenzene	< 0.30	20.0	19.0	95.0	18.3	91.5	3.7	38	59.3-137%
Xylenes (Total)	< 0.50	60.0	54.6	91.0	51.7	86.2	5.4	31	59.3-144%

Notes:

GTEL ENVIRONMENTAL LABORATORIES, INC.

Fax copy of Lab Report and COC to Chevron Contact: ☐ Yes ☐ No

Chain-of-Custody-Rec

Chevron U.S.A. Inc.
P.O. BOX 5004
San Ramon, CA 94583
FAX (415)842-9591

Chevron Facility Number 9-1924
Facility Address 4904 SFRONT ST LIVERMORE
Consultant Project Number 020104233.0610
Consultant Name Groundwater Technology, Inc.
Address 4057 Port Chicago Hwy, Concord, CA. 94520
Project Contact (Name) Tim Watchers
(Phone) 510-671-2387 (Fax Number)

Chevron Contact (Name) BRENT HUNTER
(Phone) 842-8695
Laboratory Name GTEL
Laboratory Release Number 9033280
Samples Collected by (Name) HEATHER REINO
Collection Date 7/22/94
Signature

Sample Number	Lab Sample Number	Number of Containers	Matrix S = Soil A = Air W = Water C = Charcoal	Type G = Grab C = Composite D = Discrete	Time	Sample Preservation	Iced (Yes or No)	Analyses To Be Performed: BTEX + TPH GAS (8020 + 8015)	TPH Diesel (8015)	Oil and Grease (5520)	Purgeable Halocarbons (8010)	Purgeable Aromatics (8020)	Purgeable Organics (8240)	Extractable Organics (8270)	Metals CAM: Pb, Zn, Ni (ICP or AA)	EPA 7421				Remarks
TB-LB	01	2	W	G		HCl	Y 165	X												NOTE: DO NOT BIL TB-LB SAMP SEALS INTA ON ICE AT
C-11	02	4			820	HCl HNO3		X	NL							X				
C-12	03	4			830			X	N							X				
C-15	04	4			840			X	N							X				1/3 VOA V/BC
C-10	05	4			850			X	N						8/1	X				
C-13	06	4			900			X	N				M. Lahaney			X				
C-3	07	4			910			X	N							X				
C-19	08	4			920			X	N							X				
C-8	09	4			930			X	N							X				C407037
C-16	10	4			940			X	NL							X				
C-5	11	4			950			X	NL							X				
C-1	12	4			1000			X	NL							X				
C-2	13	4			1010			X	NL							X				
C-17	14	4	↓	↓	1020	↓	↓	X	NL							X				

Relinquished By (Signature)	Organization	Date/Time	Received By (Signature)	Organization	Date/Time
	GTI	7/22/94		GTI	
Relinquished By (Signature)	Organization	Date/Time	Received By (Signature)	Organization	Date/Time
	GTI	7-25-94 10:15	John Weber	GTEL	7-25-94 10:15

Turn Around Time (Circle Choice)
24 Hrs.
48 Hrs.
5 Days
10 Days

Fax copy of Lab Report and COC to Chevron Contact: ☐ Yes ☐ No

Chain-of-Custody-Rec

Chevron U.S.A. Inc.
P.O. BOX 5004
San Ramon, CA 94583
FAX (415)842-9591

Chevron Facility Number: 9-1924
Facility Address: 4904 5 Front ST - LIVERMORE
Consultant Project Number: 020104233.0610
Consultant Name: Groundwater Technology, Inc.
Address: 4057 Port Chicago Hwy, Concord, CA. 94520
Project Contact (Name): Tim Watchers
(Phone) 510-671-2387 (Fax Number)

Chevron Contact (Name): BRETT HUNTER
(Phone): 842-8695
Laboratory Name: GTEL
Laboratory Release Number: 9033280
Samples Collected by (Name): HECTOR MERINO
Collection Date: 7/22/94
Signature:

Sample Number	Lab Sample Number	Number of Containers	Matrix S = Soil W = Water A = Air C = Charcoal	Type G = Grab C = Composite D = Discrete	Time	Sample Preservation	Lead (Yes or No)	BTEX + TPH GAS (8020 + 8015)	TPH Diesel (8015)	Oil and Grease (5520)	Purgeable Halocarbons (8010)	Purgeable Aromatics (8020)	Purgeable Organics (8240)	Extractable Organics (8270)	Metals Cd,Cr,Pb,Zn,Ni (ICAP or AA)	EPA 7421				
C-7	15	4	W	G	1030	HCl/HNO3	YES	X	NV							X				
C-9	16	4			1040			X	TPD							X				
C-14	17	4			1050			X	TPD							X				
C-6	18	4	↓	↓	11:00	↓	↓	X	TPD							X				

Analyses To Be Performed

C407372

NOTE:
DO NOT BILL
TB-LB SAMPL
SEALS INTA
ON ICE AS

Remarks

Relinquished By (Signature)	Organization	Date/Time	Received By (Signature)	Organization	Date/Time
	GTI	7/22/94	Clayton Ogata		
Relinquished By (Signature)	Organization	Date/Time	Received By (Signature)	Organization	Date/Time
Clayton Ogata	GTI	7-25-94 10:15	John Walker	GTEL	7-25-94 10:15

Turn Around Time (Circle Choice)
24 Hrs.
48 Hrs.
5 Days
10 Days