



Chevron U.S.A. Products Company

2410 Camino Ramon, San Ramon, California • Phone (510) 842-9500
Mail Address: P.O. Box 5004, San Ramon, CA 94583-0804

February 19, 1993

Ms. Eva Chu
Alameda County Environmental Health
80 Swan Way, Room 200
Oakland, CA 94621

Re: Former Chevron Station # 9-2582, 7240 Dublin Blvd., Dublin, CA
Attached groundwater monitoring report (Blaine, 1/14/93)

Dear Ms. Chu:

Attached is a report dated January 14, 1993, which was prepared by Chevron's consultant, Blaine Tech Services (Blaine), to describe groundwater monitoring performed at the subject site on December 30, 1992. Blaine will monitor the site again in the first quarter of 1993.

The vapor extraction and treatment system has been operating successfully to remove hydrocarbons from the subsurface. Chevron's consultant, Geraghty & Miller, has completed the modification of the system's control scheme resulting in more efficient operation and an increase in the hydrocarbon removal rate.

If you have any questions or comments, I can be reached at (510) 842-8658.

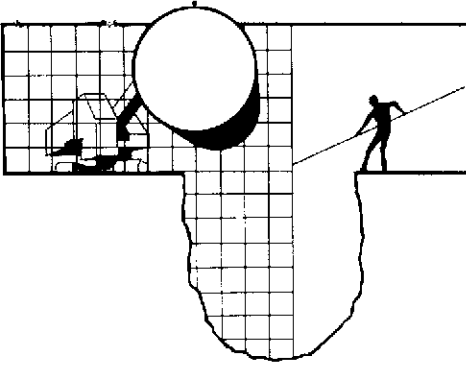
Sincerely,

Clint B. Rogers
Environmental Engineer

Attachment

cc: Lester Feldman, San Francisco Bay RWQCB, Oakland, CA
Janet Clinton (for Parkway Three), 2425 Webb Avenue, Suite 200, Alameda, CA 94501





BLAINE TECH SERVICES INC.

985 TIMOTHY DRIVE
SAN JOSE, CA 95133
(408) 995-5535
FAX (408) 293-8773

JAN 25 '93 PWM

January 14, 1993

Clint Rogers
Chevron U.S.A. Products Company
2410 Camino Ramon
San Ramon, CA 94583-0804

4th Quarter 1992 monitoring at 9-2582

Fourth Quarter 1992 Groundwater Monitoring at
Chevron Service Station number 9-2582
7240 Dublin Boulevard
Dublin, California

Monitoring performed December 30, 1992

Groundwater Sampling Report 921230-T-1

This report covers the routine quarterly monitoring of groundwater wells at this former Chevron facility. Blaine Tech Services, Inc. work at the site includes inspection, gauging, evacuation, purgewater containment, sample collection and sample handling in accordance with standard procedures that conform to Regional Water Quality Control Board requirements.

Routine field data collection includes depth to water, total well depth, thickness of any separate immiscible layer, water column volume, calculated volume of a three case volume purge, elapsed evacuation time, total volume of water removed, and standard water parameter instrument readings. Sample material is collected, contained, stored, and transported to the laboratory in conformance with EPA standards. Purgewater is, likewise, collected and transported to Chevron's Richmond Refinery for disposal.

Basic field information is presented alongside analytical values excerpted from the laboratory report in the cumulative table of **WELL DATA AND ANALYTICAL RESULTS**. The full analytical report for the most recent samples is located in the **Analytical Appendix**. The table also contains new groundwater elevation calculations taken from the computer plotted gradient map which is located in the **Professional Engineering Appendix**.

At a minimum, Blaine Tech Services, Inc. field personnel are certified on completion of a forty hour Hazardous Materials and Emergency Response training course per 29 CFR 1910.120. Field personnel are also enrolled in annual eight hour refresher courses.

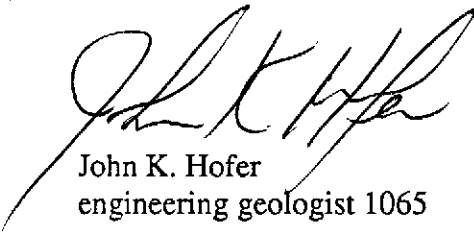
Blaine Tech Services, Inc. conducts sampling and documentation assignments of this type as an independent third party. In order to avoid compromising the objectivity necessary for the proper and disinterested performance of this work, Blaine Tech Services, Inc. concentrates on objective data collection and does not participate in the interpretation of analytical results, the definition of geological or hydrological conditions, the formulation of recommendations, or the marketing of remedial systems.

Blaine Tech Services, Inc. employs the services of outside professional firms to conduct independent reviews of our methodologies. Independent Professional Reviews by a certified engineering geologist are directed to the evaluating the efficacy of procedures and equipment employed by Blaine Tech Services, Inc. personnel in the conduct of our technical assignments. Independent Professional Reviews are intentionally limited in scope and do not extend to characterizing environmental conditions at the site or making recommendations.

Yours truly,



James Keller
for the Board of Directors



John K. Hofer
engineering geologist 1065

Independent Professional Review

RCB/jmb

attachments: Cumulative Table of Field Data and Analytical Results
Analytical Appendix
Professional Engineering Appendix

Cumulative Table of Well Data and Analytical Results

Vertical measurements are in feet.

Analytical values are in µg/l (ppb) unless otherwise annotated.

EA-1	Depth To	Water Elevation	Field Observations	TPH-G	benzene	toluene	ethyl- benzene	xylenes	1,2-DCA
10-17-1988	--	--	--	<50.	<0.5	<0.5	<0.5	<0.5	--
10-24-1988	10.64	322.77	(gauging)	--	--	--	--	--	--
11-02-1988	10.69	322.72	(gauging)	--	--	--	--	--	--
12-20-1988	10.51	322.90	--	<50.	<0.5	<0.5	<0.5	<0.5	--
03-28-1989	9.87	323.54	--	<250.	<0.5	<0.5	<0.5	<0.5	--
08-02-1989	10.34	323.07	--	<50.	<0.1	<0.1	<0.1	<0.1	<0.1
11-06-1989	10.65	322.76	--	<500.	<3.	<5.	<5.	<5.	<5.
01-25-1990	10.60	322.81	--	<50.	<0.5	<0.5	<0.5	<0.5	<0.5
04-23-1990	10.58	322.83	--	71.	2.	5.	3.	8.	<0.5
08-01-1990	10.88	322.53	--	300.	86.	21.	10.	33.	--
10-24-1991	11.12	322.29	--	280.	69.	13.	11.	16.	--
01-31-1991	11.16	322.25	--	460.	160.	11.	17.	17.	--
08-21-1991	10.80	322.61	--	2,400.	400.	220.	44.	120.	--
08-21-1991	--	--	EA-1D duplicate	2,300	390.	210.	42.	120.	--
10-07-1991	10.79	322.62	not sampled	--	--	--	--	--	--
01-28-1992	10.79	322.62	--	3,600.	320.	360.	110.	310.	--
01-28-1992	--	--	EA-1D duplicate	3,000.	290.	320.	99.	270.	--
06-05-1992	10.84	322.57	--	1,700.	290.	89.	61.	130.	--
09-30-1992	11.06	322.35	--	2,100.	160.	260.	80.	350.	--
12-30-1992	10.15	323.26	Sheen, odor	3200.	240.	180.	110.	310.	--

EA-2	DTW	Elevation	Observ.	TPH-G	benzene	toluene	ethyl-benz	xylenes	1,2-DCA
10-17-1988	--	--	--	<50.	<0.5	<0.5	<0.5	1.2	--
10-24-1988	9.70	322.89	(gauging)	--	--	--	--	--	--
11-02-1988	10.03	322.56	(gauging)	--	--	--	--	--	--
12-20-1988	9.98	322.61	--	<50.	<0.5	<0.5	<0.5	<0.5	--
03-28-1989	8.80	323.79	--	<250.	<2.	<0.5	<0.5	<0.5	<0.5
08-02-1989	9.44	323.15	--	<50.	<0.1	<0.1	<0.1	<0.1	<0.1
11-06-1989	9.53	323.06	--	<500.	<3.	<5.	<5.	<5.	<5.
01-25-1990	9.27	323.32	--	<50.	<0.5	<0.5	<0.5	<0.5	<0.5
04-23-1990	9.35	323.24	--	50.	0.6	0.8	<0.5	2.	<0.5
08-01-1990	9.71	322.88	--	<50	<0.5	<0.5	<0.5	<0.5	--

data continues on next page

Cumulative Table of Well Data and Analytical Results

continued from previous page

EA-2	<u>DTW</u>	<u>Elevation</u>	<u>Observ.</u>	<u>TPH-G</u>	<u>benzene</u>	<u>toluene</u>	<u>ethyl-benz</u>	<u>xylenes</u>	<u>1,2-DCA</u>
10-24-1990	10.08	322.51	--	<50.	<0.5	<0.5	<0.5	<0.5	--
01-31-1991	10.21	322.38	--	<50.	<0.5	<0.5	<0.5	<0.5	--
01-31-1991	--	--	EA-2D duplicate	<50.	<0.5	<0.5	<0.5	<0.5	--
08-21-1991	9.80	322.79	--	<50.	<0.5	<0.5	<0.5	<0.5	--
10-07-1991	9.98	322.61	not sampled	--	--	--	--	--	--
01-28-1992	9.81	322.78	--	<50.	0.8	<0.5	<0.5	<0.5	--
06-05-1992	9.86	322.73	--	<50.	<0.5	<0.5	<0.5	<0.5	--
09-30-1992	10.60	321.99	--	66.	1.	3.2	1.3	7.4	--
12-30-1992	9.11	323.48	--	<50.	<0.5	<0.5	<0.5	<0.5	--

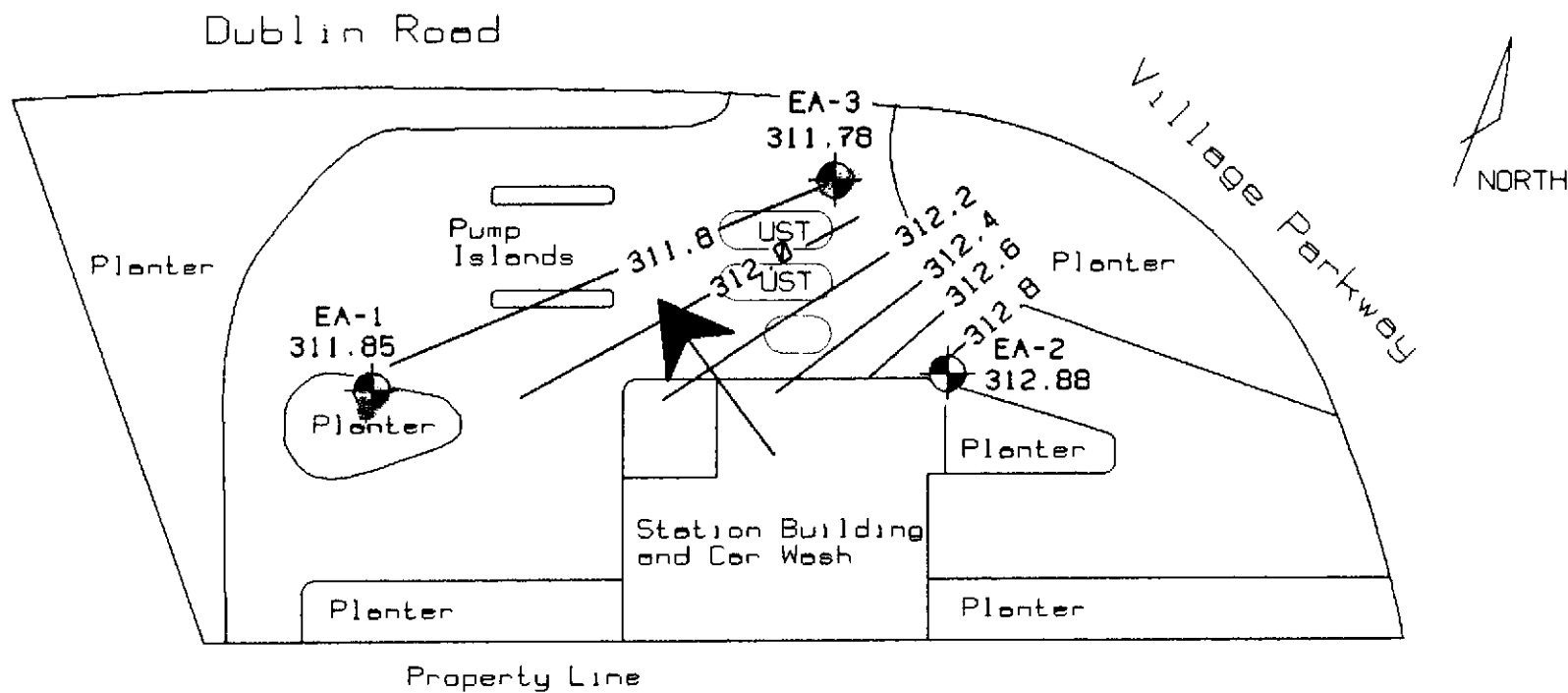
EA-3	<u>DTW</u>	<u>Elevation</u>	<u>Observ.</u>	<u>TPH-G</u>	<u>benzene</u>	<u>toluene</u>	<u>ethyl-benz</u>	<u>xylenes</u>	<u>1,2-DCA</u>
10-17-1988	--	--	--	<50.	1.8	<0.5	<0.5	3.	--
10-24-1988	11.03	322.61	(gauging)	--	--	--	--	--	--
11-02-1988	11.03	322.61	(gauging)	--	--	--	--	--	--
12-20-1988	10.96	322.68	--	240.	90.	1.2	13.	3.3	--
03-28-1989	9.77	322.87	--	2,300.	380.	130.	240.	910.	--
08-02-1989	10.65	322.99	--	<50.	<0.1	<0.1	<0.1	<0.1	<0.1
11-06-1989	10.78	322.86	--	<500.	<3.	<5.	<5.	<5.	<5.
01-25-1990	10.66	322.98	--	<50.	<0.5	<0.5	<0.5	<0.5	<0.5
04-23-1990	10.68	322.96	--	<50.	0.8	<0.5	0.9	<0.5	<0.5
08-01-1990	11.03	322.61	--	<50.	<0.5	<0.5	<0.5	<0.5	--
10-24-1990	11.35	322.29	--	<50.	<0.5	<0.5	<0.5	<0.5	--
01-31-1991	11.52	322.12	--	<50.	<0.5	<0.5	<0.5	<0.5	--
08-21-1991	--	--	not sampled	--	--	--	--	--	--
10-07-1991	11.15	322.49	--	180.	40.	20.	4.7	8.4	--
10-07-1991	--	--	EA-3D duplicate	200.	43.	17.	4.1	6.7	--
01-28-1992	11.08	322.12	--	640.	69.	85.	13.	46.	--
06-05-1992	10.98	322.66	--	250.	63.	8.3	3.	9.5	--
09-30-1992	11.38	322.26	--	330.	120.	33.	6.3	22.	--
12-30-1992	10.48	333.64	--	58.	7.6	1.3	2.5	5.4	--

Cumulative Table of Well Data and Analytical Results

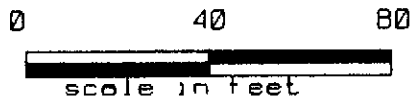
PVC	<u>DTW</u>	<u>Elevation</u>	<u>Observ.</u>	<u>TPH-G</u>	<u>benzene</u>	<u>toluene</u>	<u>ethyl-benz</u>	<u>xylenes</u>	<u>1,2-DCA</u>
08-02-1989	11.52	--	--	100,000.	8,700.	14,000.	1,700.	17,000.	50.
08-02-1989	--	--	duplicate	110,000.	9,200.	14,000.	1,800.	13,000.	50.
11-06-1989	--	--	--	--	--	--	--	--	--
01-25-1990	--	--	--	--	--	--	--	--	--
04-23-1990	--	--	--	--	--	--	--	--	--
08-01-1990	--	--	--	--	--	--	--	--	--
10-24-1990	--	--	--	--	--	--	--	--	--
01-31-1991	--	--	--	--	--	--	--	--	--
08-21-1991	--	--	--	--	--	--	--	--	--
10-07-1991	--	--	--	--	--	--	--	--	--
01-28-1992	--	--	--	--	--	--	--	--	--
06-05-1992	--	--	--	--	--	--	--	--	--
09-30-1992	--	--	--	--	--	--	--	--	--
12-30-1992	--	--	--	--	--	--	--	--	--

QC samples


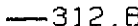

<u>Date</u>	<u>QC Blank Type</u>	<u>TPH-G</u>	<u>benzene</u>	<u>toluene</u>	<u>ethyl-benz</u>	<u>xylenes</u>	<u>1,2-DCA</u>
03-28-1989	equipment blank	<250.	<0.5	<0.5	<0.5	<0.5	--
07-28-1989	trip blank	<50.	<0.1	<0.1	<0.1	<0.1	<0.5
11-06-1989	trip blank	<500.	<3.0	<0.5	<0.5	<0.5	<0.5
01-25-1990	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	na
08-01-1990	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	<0.5
10-24-1990	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	--
01-31-1991	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	--
08-21-1991	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	--
10-07-1991	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	--
01-28-1992	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	--
06-05-1992	trip blank	<50.	<0.5	<0.5	<0.5	<0.5	--
09-30-1992	trip blank TB-LB	<50.	<0.5	<0.5	<0.5	<0.5	--
12-30-1992	trip blank TB-LB	<50.	<0.5	<0.5	<0.5	<0.5	--



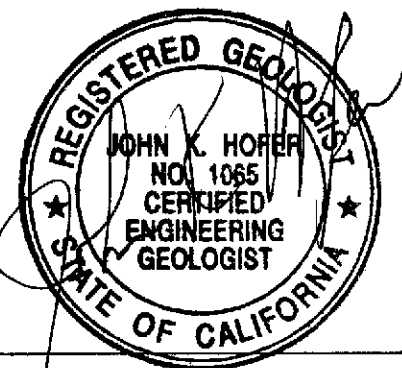
Potentiometric Surface
of Shallow Ground Water
December 30, 1992



LEGEND

-  EA-3 311.78 Monitor Well Location and ground-water elevation, ft-MSL
-  312.8 Approximate ground-water elevation contour, ft-MSL
-  Estimated direction of ground-water flow

Former Chevron Service Station #9-2582
7240 Dublin Boulevard Dublin, California



GEOCONSULTANTS, INC.
Geotechnical Consultants
Geology • Ground Water
1450 Koll Circle, Suite 114
San Jose, California 95112
G758-09

Cumulative Table of Well Data and Analytical Results

Note: Blaine Tech Services, Inc. began routine monitoring of the groundwater wells at this site on September 30, 1992. Earlier field data and analytical results are drawn from the tables contained in the Western Geologic Resources/RESNA report (WGR Project #1-124.08) of February 13, 1992 to Chevron U.S.A. Products Company. Wellhead elevation data contained in that source document are reproduced as follows:

<u>Well I.D.</u>	<u>Wellhead Elevation</u>
EA-1	333.41
EA-2	332.59
EA-3	333.64
PVC	not given

? but water elevation is not 333.64

Analytical Appendix

13947
 Fax copy of Lab Report and COC to Chevron Contact: Yes No

Chain-of-Custody-Record

Chevron U.S.A. Inc. P.O. BOX 5004 San Ramon, CA 94583 FAX (415)842-9591	Chevron Facility Number <u>92582</u> Facility Address <u>7240 DUBLIN BLVD, DUBLIN</u> Consultant Project Number <u>921230-T1</u> Consultant Name <u>BLAINE TECH SERVICES</u> Address <u>985 TIMOTHY DRIVE, SAN JOSE, CA</u> Project Contact (Name) <u>GLEN BENNETT</u> (Phone) <u>(408) 995-5555</u> (Fax Number) <u>(408) 293 8773</u>	Chevron Contact (Name) <u>CLINT B. ROGERS</u> (Phone) <u>842-8658</u> Laboratory Name <u>SUPERIOR</u> Laboratory Release Number <u>2612800</u> Samples Collected by (Name) <u>FRAN THIE</u> Collection Date <u>12-30-92</u> Signature <u>[Signature]</u>
--	---	--

Sample Number	Lab Sample Number	Number of Containers	Matrix S = Soil W = Water C = Charcoal	Type C = Grab Composite D = Discrete	Time	Sample Preservation	Iced (Yes or No)	Analyses To Be Performed											Remarks
								BTEX + TPH GAS (8020 + 8015)	TPH Diesel (8015)	Oil and Grease (8020)	Purgeable Hydrocarbons (8010)	Purgeable Aromatics (8020)	Purgeable Organics (8240)	Extractable Organics (8270)	Metals Cd, Cr, Pb, Zn, Ni (1049 or AA)				
EA-1		3	W		1630	HCL	Y	✓											DO NOT CHARGE LB/AT
EA-2		3	W		1445	HCL	Y	✓											
EA-3		3	W		1330	HCL	Y	✓											
TRIP BLANK		2	W			HCL	Y	✓											

Samples Stored In Ice.
 Samples Stored in Original Containers.
 Samples Preserved.
 Samples Preserved Without Headspace.
 Comments:

Relinquished By (Signature) <u>[Signature]</u>	Organization <u>BTS</u>	Date/Time <u>12-31-92 8:55</u>	Received By (Signature) <u>[Signature]</u>	Organization <u>[Signature]</u>	Date/Time <u>1/31 8:55</u>	Turn Around Time (Circle Choice) 24 Hrs. 48 Hrs. 5 Days 10 Days <input checked="" type="radio"/> As Contracted
Relinquished By (Signature)	Organization	Date/Time	Received By (Signature)	Organization	Date/Time	
Relinquished By (Signature)	Organization	Date/Time	Received For Laboratory By (Signature) <u>[Signature]</u>	Organization	Date/Time <u>12/31/92</u>	

COC-3/DWG/03 BT/HCH



Superior Precision Analytical, Inc.

1555 Burke, Unit 1 • San Francisco, California 94124 • (415) 647 2081 / fax (415) 821-7123

Blaine Tech Services
Attn: GLENN BENNETT

Project 921230-T1
Reported 01/05/93

TOTAL PETROLEUM HYDROCARBONS

Lab #	Sample Identification	Sampled	Analyzed Matrix
13947- 1	EA-1	12/30/92	01/04/93 Water
13947- 2	EA-2	12/30/92	01/04/93 Water
13947- 3	EA-3	12/30/92	01/04/93 Water
13947- 4	TB-LB	12/30/92	01/04/93 Water

RESULTS OF ANALYSIS

Laboratory Number: 13947- 1 13947- 2 13947- 3 13947- 4

Gasoline:	3200	ND<50	58	ND<50
Benzene:	240	ND<0.5	7.6	ND<0.5
Toluene:	180	ND<0.5	1.3	ND<0.5
Ethyl Benzene:	110	ND<0.5	2.5	ND<0.5
Xylenes:	310	ND<0.5	5.4	ND<0.5
Concentration:	ug/L	ug/L	ug/L	ug/L



Superior Precision Analytical, Inc.

1555 Burke, Unit I ▪ San Francisco, California 94124 ▪ (415) 647-2081 / fax (415) 821-7123

C E R T I F I C A T E O F A N A L Y S I S

ANALYSIS FOR TOTAL PETROLEUM HYDROCARBONS

Page 2 of 2
QA/QC INFORMATION
SET: 13947

NA = ANALYSIS NOT REQUESTED
ND = ANALYSIS NOT DETECTED ABOVE QUANTITATION LIMIT
ug/L = parts per billion (ppb)

OIL AND GREASE ANALYSIS By Standard Methods Method 5520F:
Minimum Detection Limit in Water: 5000ug/L

Modified EPA SW-846 Method 8015 for Extractable Hydrocarbons:
Minimum Quantitation Limit for Diesel in Water: 50ug/L

EPA SW-846 Method 8015/5030 Total Purgable Petroleum Hydrocarbons:
Minimum Quantitation Limit for Gasoline in Water: 50ug/L

EPA SW-846 Method 8020/BTXE
Minimum Quantitation Limit in Water: 0.5ug/L

ANALYTE -----	MS/MSD RECOVERY -----	RPD ---	CONTROL LIMIT -----
Gasoline:	100/98	2%	76-111
Benzene:	94/93	1%	78-110
Toluene:	94/93	1%	78-111
Ethyl Benzene:	94/94	0%	78-118
Xylenes:	95/94	1%	73-113

Richard Srna, Ph.D.

Richard Srna (for)
Laboratory Director

Professional Engineering Appendix



GEOCONSULTANTS, INC.

*Geotechnical Consultants
Geology • Ground Water*

1450 Koll Circle, Suite 114
San Jose, California 95112
Telephone: (408) 453-2541
Fax: (408) 453-2543

January 15, 1993
Project No. G758-09

Mr. Richard Blaine
Blaine Tech Services, Inc.
985 Timothy Drive
San Jose, CA 95133

**RE: GROUND-WATER ELEVATION CONTOUR MAPS
FORMER CHEVRON SERVICE STATION NO. 9-2582
7240 DUBLIN BOULEVARD, DUBLIN CALIFORNIA**

Dear Mr. Blaine:

In accordance with your request, please find attached the December 30, 1992 ground-water elevation contour map for the subject site. The depth to the water table was measured in three wells (EA-1, EA-2, and EA-3) by your staff. An elevation datum of mean sea-level was utilized. The ground-water elevation contours were extrapolated from the three wells, and are to be considered only approximate in nature. The general direction of the ground-water gradient is indicated on the contour map.

If you have any questions regarding the map, please call.

Very truly yours,

GEOCONSULTANTS, INC.

David J. Welch
Project Geologist

John K. Hofer
Engineering Geologist, EG-1065

JKH:djw
(CH92582F.D92)