RO 223

CAMBRIA

July 5, 2002

Barney Chan
Alameda County Health Care Services Agency
1131 Harbor Bay Parkway, Suite 250
Alameda, California 94502-6577

JUL 08 2002

Re: **First Quarter 2002 Monitoring Report**
Shell-branded Service Station
540 Hegenberger Road
Oakland, California
Incident #98995752
Cambria Project #244-0414-002

Dear Mr. Chan:

On behalf of Equilon Enterprises LLC dba Shell Oil Products US, Cambria Environmental Technology, Inc. (Cambria) is submitting this groundwater monitoring report in accordance with the reporting requirements of 23 CCR 2652d.

FIRST QUARTER 2002 ACTIVITIES

Groundwater Monitoring: Blaine Tech Services, Inc. (Blaine) of San Jose, California gauged water levels, sampled the monitoring wells, calculated groundwater elevations, and compiled the analytical data. The adjacent Arco station located at 566 Hegenberger Road was not sampled during the first quarter 2002. In addition, Blaine collected a sample from the canal northwest of the site, and attempted to collect samples from two storm drain inlets north of the site which were dry during the sampling event. Cambria prepared a vicinity map, which includes previously submitted well survey information (Figure 1), and a groundwater elevation contour map (Figure 2). Blaine's report, presenting the laboratory report and supporting field documents, is included as Attachment A.

Interim Remedial Action: From July 1999 through June 2000, groundwater extraction (GWE) was performed at the site to remove dissolved-phase hydrocarbons and methyl tert-butyl ether (MTBE) from beneath the site. From June through December 2000, dual-phase vacuum extraction (DVE) was conducted to enhance GWE and to extract vapor-phase hydrocarbon and MTBE from the soil as well. DVE was discontinued after the December 2000 event, and monthly DVE events were resumed in May 2001. Due to low vapor mass-removal rates, DVE was discontinued in October 2001, and monthly GWE was re-initiated. Wells MW-1 and MW-3 and tank backfill well BW-D were used for extraction until April 2002, when extraction from the tank

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backfill was switched from well BW-D to BW-B due to higher historic MTBE concentrations observed in this well. Hydrocarbon mass removal data for liquid and vapor phase are presented in Tables 1 and 2, respectively. Mass removal and MTBE concentrations versus time for wells MW-1 and MW-3 are shown on graphs presented in Figures 3 and 4, respectively.

ANTICIPATED SECOND QUARTER 2002 ACTIVITIES

Groundwater Monitoring: Blaine will gauge water levels, sample the monitoring wells using the non-purging method, and tabulate the data. In addition, Blaine will sample all tank backfill wells at the site. The sampling event will take place concurrently with sampling at the Arco station located at 566 Hegenberger Road, north of the site. Arco and Shell will exchange water level and analytical data on these events. Cambria will prepare a report documenting those activities.

Surface Water and Storm Drain Sampling: As proposed in our work plan, storm drain and canal points will be included in future quarterly sampling events to monitor the condition of the nearest receptor.

Interim Remedial Action: Monthly extraction events will continue and will be reported in the second quarter report. Following review of analytical data from the tank backfill well samples collected during the second quarter 2002 event, the GWE scope will be updated to extract from the tank backfill well with the highest MTBE concentration.

Subsurface Investigation: In accordance with our February 27, 2002 *Subsurface Investigation Work Plan* which was approved in an April 29, 2002 Alameda County Health Care Services Agency letter, Cambria installed one onsite groundwater monitoring well on June 7, 2002. A subsurface investigation report will be submitted under separate cover during the third quarter 2002.

Feasibility Study Work Plan: At Shell's request, Cambria will submit a work plan for feasibility testing for a permanent GWE system at the site.

CLOSING

We appreciate the opportunity to work with you on this project. Please call Jacquelyn Jones at (510) 420-3316 if you have any questions or comments.

Sincerely,
Cambria Environmental Technology, Inc

Jacquelyn L. Jones
Project Geologist

Matthew W. Derby, P.E.
Senior Project Engineer

Figures: 1 - Vicinity/Area Well Survey Map
2 - Groundwater Elevation Contour Map
3 - GWE/DVE Effect on MTBE Concentration – MW-1
4 - GWE/DVE Effect on MTBE Concentration – MW-3

Tables: 1 - Groundwater Extraction - Mass Removal Data
2 - Vapor Extraction - Mass Removal Data

Attachment: A - Blaine Groundwater Monitoring Report and Field Notes

cc: Karen Petryna, Shell Oil Products US, P.O. Box 7869, Burbank, CA 91510-7869

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10/05/01

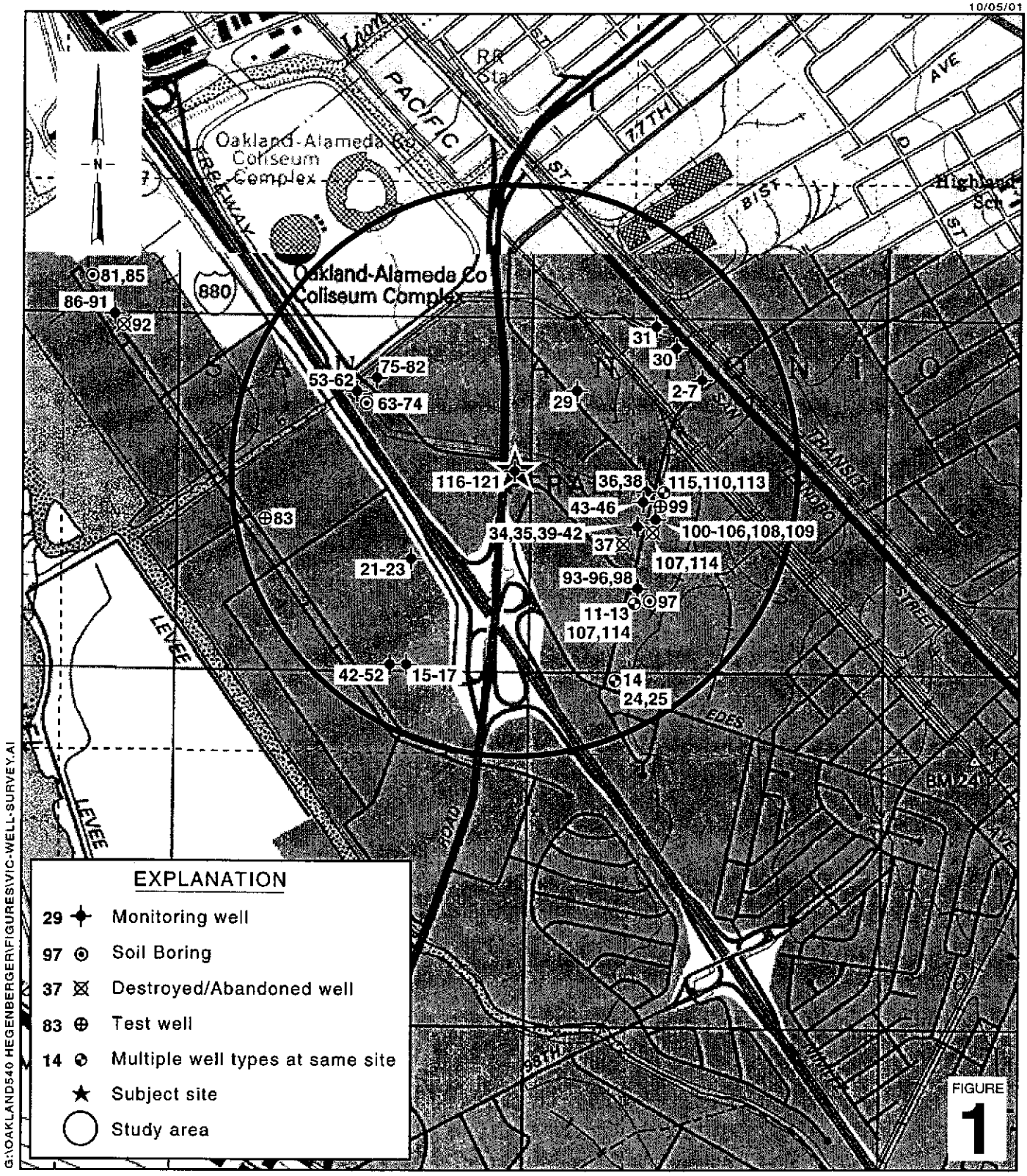

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FIGURE 1

0 1/8 1/4 1/2 1

SCALE 1:1/4 MILES

Shell-branded Service Station
540 Hegenberger Road
Oakland, California
Incident #98995752

CAMBRIA

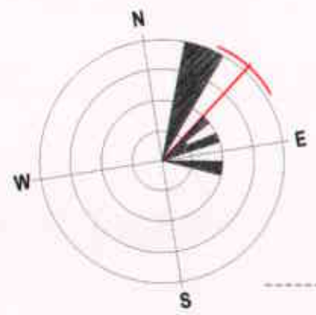
Vicinity / Area Well Survey Map

(1/2-Mile Radius)

06/26/02

Groundwater Elevation Contour Map

March 14, 2002



Groundwater Gradient Direction
August 1998 through March 2002
(fifteen events)

EXPLANATION

- MW-1 — Site monitoring well
- BW-A — Tank backfill well
- MW-1 — ARCO monitoring well, not referenced to mean sea level, not used for contouring
- RW-1 — ARCO recovery well
- SB-1 — Soil boring location (March 1998)
- SB-D — Soil boring location (July 1998)
- SB-E — Soil boring location (August 2000)
- C-1 — Canal sampling location
- FH — Fire hydrant
- FL = 5.0' — Flowline elevation (msl)
- ss — Sanitary sewer main
- water — Water line
- SD — Storm drain
- Flow direction
- NS — Not surveyed
- NA — Not available
- Groundwater flow direction and gradient (ft/ft)
- xx.xx — Groundwater elevation contour, in feet above mean sea level (msl), approximately located, dashed where inferred
- Well designation
- ELEV — Groundwater elevation, in feet above msl
- Benzene / MTBE — Benzene and MTBE concentrations are in parts per billion and are analyzed by EPA Method 8260; results in parentheses were analyzed by EPA Method 8020.

FIGURE **2**

Shell-branded Service Station
540 Hegenberger Road
Oakland, California
Incident #98995752

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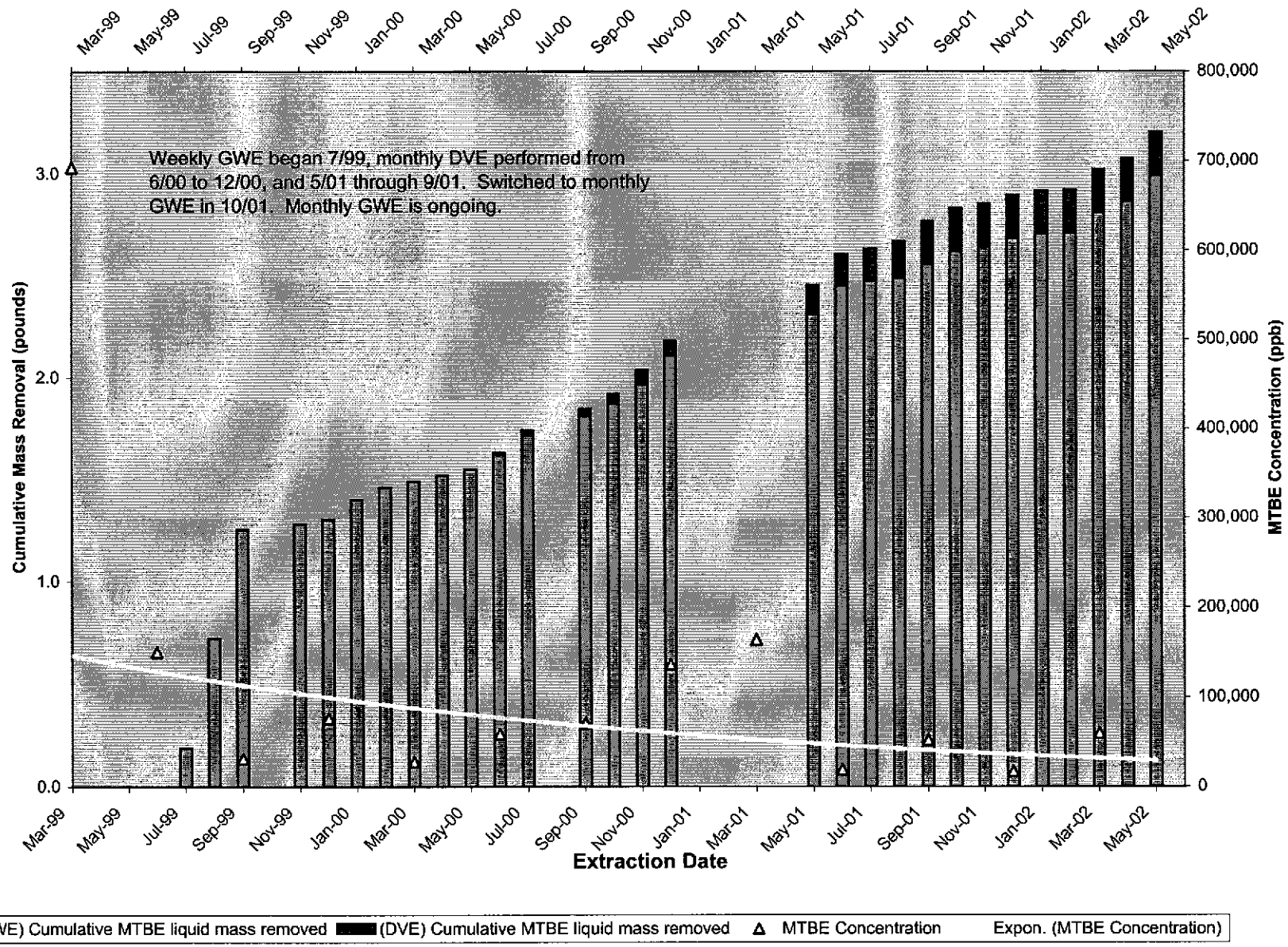
GWE/DVE effect on MTBE concentration
540 Hegenberger, Oakland - MW-1

Date	DTW-ft
3/29/99	8.32
6/22/99	9.05
9/30/99	8.35
12/10/99	8.86
3/2/00	8.83
6/8/00	7.78
9/5/00	7.84
12/15/00	7.65
3/9/01	6.44
6/27/01	8.46
9/19/01	8.10
12/31/02	7.31
3/14/02	7.69



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GWE/DVE effect on MTBE concentration
540 Hegenberger, Oakland - MW-3

Date	DTW-ft
3/29/99	6.21
6/22/99	7.00
9/30/99	6.84
12/10/99	7.28
3/2/00	5.87
6/8/00	5.32
9/5/00	5.60
12/15/00	6.27
3/9/01	5.71
6/27/01	6.88
9/19/01	6.70
12/31/01	5.92
3/14/02	6.25

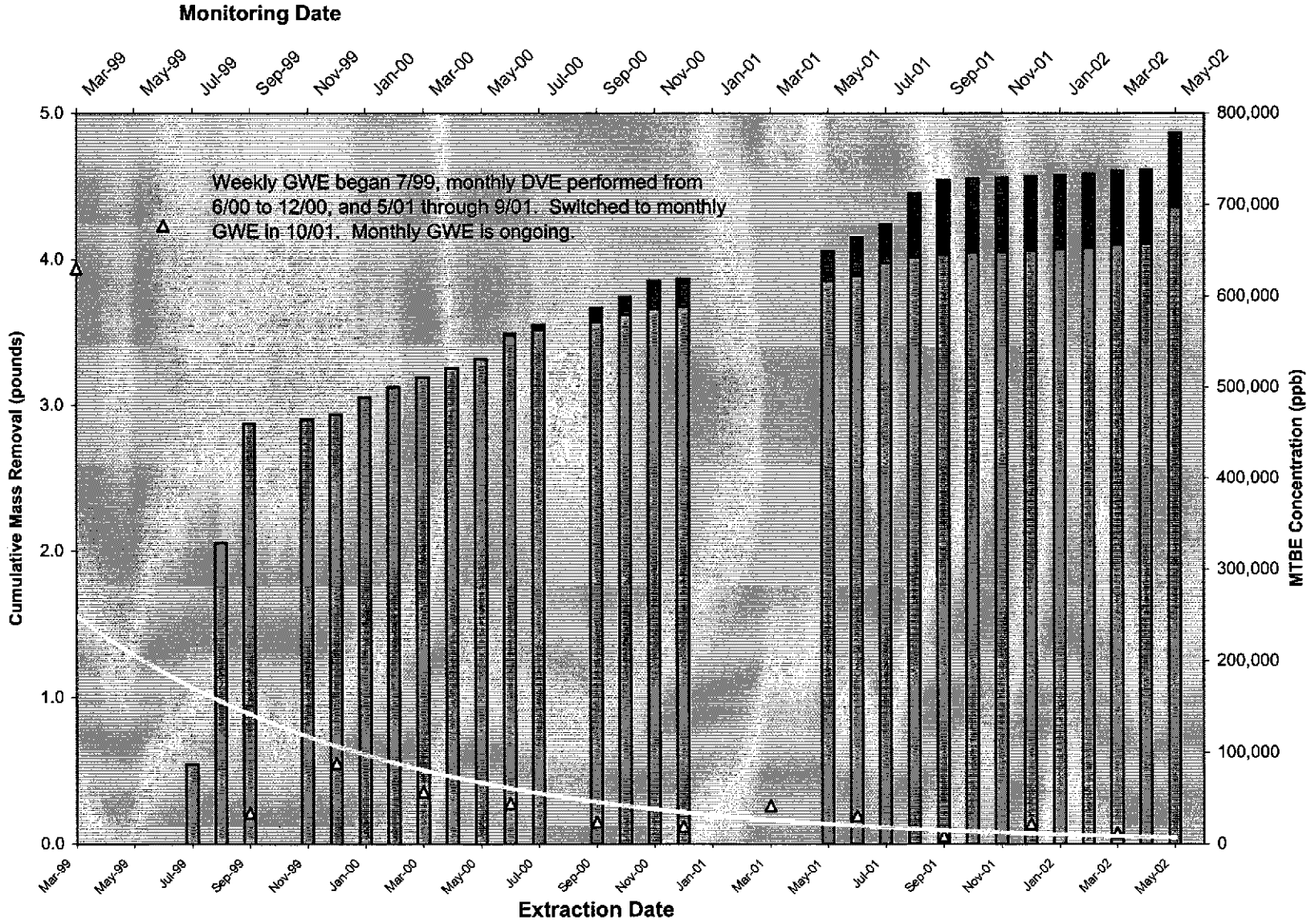

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Table 1: Groundwater Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

					TPPH			Benzene			MTBE		
Date Purged	Well ID	Volume Pumped (gal)	Cumulative Volume Pumped (gal)	Date Sampled	TPPH Concentration (ppb)	TPPH Removed (pounds)	TPPH Removed To Date (pounds)	Benzene Concentration (ppb)	Benzene Removed (pounds)	Benzene Removed To Date (pounds)	MTBE Concentration (ppb)	MTBE Removed (pounds)	MTBE Removed To Date (pounds)
07/29/99	BW-A	400	400	06/22/99	318	0.00106	0.00106	<0.50	0.00000	0.00000	4,470	0.01492	0.01492
08/04/99	BW-A	2,000	2,400	06/22/99	318	0.00531	0.00637	<0.50	0.00000	0.00001	4,470	0.07460	0.08952
08/11/99	BW-A	2,437	4,837	06/22/99	318	0.00647	0.01284	<0.50	0.00001	0.00001	4,470	0.09090	0.18042
08/20/99	BW-A	1,213	6,050	06/22/99	318	0.00322	0.01605	<0.50	0.00000	0.00001	4,470	0.04524	0.22566
08/30/99	BW-A	2,673	8,723	06/22/99	318	0.00709	0.02315	<0.50	0.00001	0.00002	4,470	0.09970	0.32536
09/03/99*	BW-A	325	9,048	06/22/99	318	0.00086	0.02401	<0.50	0.00000	0.00002	4,470	0.01212	0.33748
09/10/99*	BW-A	425	9,148	06/22/99	318	0.00113	0.02514	<0.50	0.00000	0.00002	4,470	0.01585	0.35334
09/23/99	BW-A	615	9,763	06/22/99	318	0.00163	0.02677	<0.50	0.00000	0.00002	4,470	0.02294	0.37628
09/29/99	BW-A	800	10,563	06/22/99	318	0.00212	0.02889	<0.50	0.00000	0.00002	4,470	0.02984	0.40611
11/05/99	BW-A	675	11,238	06/22/99	318	0.00179	0.03068	<0.50	0.00000	0.00002	4,470	0.02518	0.43129
07/29/99	BW-B	1,000	1,000	06/22/99	<250	0.00104	0.00104	<2.5	0.00001	0.00001	8,600	0.07176	0.07176
08/04/99	BW-B	800	1,800	06/22/99	<250	0.00083	0.00188	<2.5	0.00001	0.00105	8,600	0.05741	0.12917
08/11/99	BW-B	2,213	4,013	06/22/99	<250	0.00231	0.00419	<2.5	0.00002	0.00190	8,600	0.15881	0.28798
08/20/99	BW-B	1,213	5,226	06/22/99	<250	0.00127	0.00545	<2.5	0.00001	0.00420	8,600	0.08705	0.37503
08/30/99	BW-B	877	6,103	06/22/99	<250	0.00091	0.00637	<2.5	0.00001	0.00546	8,600	0.06293	0.43796
09/03/99*	BW-B	325	6,428	06/22/99	<250	0.00034	0.00670	<2.5	0.00000	0.00637	8,600	0.02332	0.46128
09/10/99*	BW-B	425	6,853	06/22/99	<250	0.00044	0.00715	<2.5	0.00000	0.00671	8,600	0.03050	0.49178
09/23/99	BW-B	750	7,603	06/22/99	<250	0.00078	0.00793	<2.5	0.00001	0.00716	8,600	0.05382	0.54560
09/29/99	BW-B	600	8,203	06/22/99	<250	0.00063	0.00856	<2.5	0.00001	0.00794	8,600	0.04306	0.58866
11/05/99	BW-B	650	8,853	06/22/99	<250	0.00068	0.00923	<2.5	0.00001	0.00856	8,600	0.04664	0.63530
04/30/02	BW-B	1,050	9,903	03/14/02	<2,000	0.00876	0.01800	<20	0.00009	0.00932	9,400	0.08236	0.71766
05/28/02	BW-B	2,650	12,553	03/14/02	<2,000	0.02211	0.04011	<20	0.00022	0.01822	9,400	0.20786	0.92552
07/29/99	BW-C	300	300	06/22/99	<50	0.00006	0.00006	<0.50	0.00000	0.00000	11,000	0.02754	0.02754
08/04/99	BW-C	700	1,000	06/22/99	<50	0.00015	0.00021	<0.50	0.00000	0.00000	11,000	0.06425	0.09179
08/11/99	BW-C	0	1,000	06/22/99	<50	0.00000	0.00021	<0.50	0.00000	0.00000	11,000	0.00000	0.09179
08/20/99	BW-C	1,013	2,013	06/22/99	<50	0.00021	0.00042	<0.50	0.00000	0.00000	11,000	0.09298	0.18477
08/30/99	BW-C	375	2,388	06/22/99	<50	0.00008	0.00050	<0.50	0.00000	0.00000	11,000	0.03442	0.21919

Table 1: Groundwater Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

					TPPH			Benzene			MTBE		
Date Purged	Well ID	Volume Pumped (gal)	Cumulative Volume Pumped (gal)	Date Sampled	TPPH Concentration (ppb)	TPPH Removed (pounds)	TPPH Removed To Date (pounds)	Benzene Concentration (ppb)	Benzene Removed (pounds)	Benzene Removed To Date (pounds)	MTBE Concentration (ppb)	MTBE Removed (pounds)	MTBE Removed To Date (pounds)
09/03/99*	BW-C	325	2,713	06/22/99	<50	0.00007	0.00057	<0.50	0.00000	0.00001	11,000	0.02983	0.24902
09/10/99*	BW-C	425	3,138	06/22/99	<50	0.00009	0.00065	<0.50	0.00000	0.00001	11,000	0.03901	0.28803
09/23/99	BW-C	750	3,888	06/22/99	<50	0.00016	0.00081	<0.50	0.00000	0.00001	11,000	0.06884	0.35687
09/29/99	BW-C	700	4,588	06/22/99	<50	0.00015	0.00096	<0.50	0.00000	0.00001	11,000	0.06425	0.42112
11/05/99	BW-C	550	5,138	06/22/99	<50	0.00011	0.00107	<0.50	0.00000	0.00001	11,000	0.05048	0.47161
06/06/00	BW-C	926	6,064	06/22/99	<50	0.00019	0.00127	<0.50	0.00000	0.00001	11,000	0.08500	0.55660
09/07/00	BW-C	1,000	7,064	06/22/99	<50	0.00021	0.00147	<0.50	0.00000	0.00001	11,000	0.09179	0.64839
07/29/99	BW-D	1,500	1,500	06/22/99	<50	0.00031	0.00031	<0.500	0.00000	0.00000	2,190	0.02741	0.02741
08/04/99	BW-D	250	1,750	06/22/99	<50	0.00005	0.00037	<0.500	0.00000	0.00000	2,190	0.00457	0.03198
08/11/99	BW-D	0	1,750	06/22/99	<50	0.00000	0.00037	<0.500	0.00000	0.00000	2,190	0.00000	0.03198
08/20/99	BW-D	1,213	2,963	06/22/99	<50	0.00025	0.00062	<0.500	0.00000	0.00001	2,190	0.02217	0.05415
08/30/99	BW-D	280	3,243	06/22/99	<50	0.00006	0.00068	<0.500	0.00000	0.00001	2,190	0.00512	0.05926
09/03/99*	BW-D	325	3,568	06/22/99	<50	0.00007	0.00074	<0.500	0.00000	0.00001	2,190	0.00594	0.06520
09/10/99*	BW-D	425	3,993	06/22/99	<50	0.00009	0.00083	<0.500	0.00000	0.00001	2,190	0.00777	0.07297
09/23/99	BW-D	750	4,743	06/22/99	<50	0.00016	0.00099	<0.500	0.00000	0.00001	2,190	0.01371	0.08667
09/29/99	BW-D	700	5,443	06/22/99	<50	0.00015	0.00114	<0.500	0.00000	0.00001	2,190	0.01279	0.09947
11/05/99	BW-D	625	6,068	06/22/99	<50	0.00013	0.00127	<0.500	0.00000	0.00001	2,190	0.01142	0.11089
10/22/01	BW-D**	2,100	8,168	06/27/01	<5,000	0.04381	0.04507	<50	0.00044	0.00045	**40,000**	0.70093	0.81181
11/06/01	BW-D**	2,600	10,768	06/27/01	<5,000	0.05424	0.09931	<50	0.00054	0.00099	**40,000**	0.86781	1.67963
12/04/01	BW-D**	1,500	12,268	06/27/01	<5,000	0.03129	0.13060	<50	0.00031	0.00131	**40,000**	0.50066	2.18029
01/28/02	BW-D**	2,520	14,788	12/31/01	<2,000	0.02103	0.15163	<20	0.00021	0.00152	**9,200**	0.19346	2.37374
02/18/02	BW-D**	2,451	17,239	12/31/01	<2,000	0.02045	0.17208	<20	0.00020	0.00172	**9,200**	0.18816	2.56190
03/27/02	BW-D**	1,400	18,639	03/14/02	<2,000	0.01168	0.18377	<20	0.00012	0.00184	**9,400**	0.10981	2.67171
07/29/99	MW-1	150	150	06/22/99	20,000	0.02503	0.02503	100	0.00013	0.00013	150,000	0.18775	0.18775
08/04/99	MW-1	150	300	06/22/99	20,000	0.02503	0.05007	100	0.00013	0.00025	150,000	0.18775	0.37550
08/11/99	MW-1	15	315	06/22/99	20,000	0.00250	0.05257	100	0.00001	0.00026	150,000	0.01877	0.39427
08/20/99	MW-1	44	359	06/22/99	20,000	0.00734	0.05991	100	0.00004	0.00030	150,000	0.05507	0.44934

Table 1: Groundwater Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

					TPPH			Benzene			MTBE		
Date Purged	Well ID	Volume Pumped (gal)	Cumulative Volume Pumped (gal)	Date Sampled	TPPH Concentration (ppb)	TPPH Removed (pounds)	TPPH Removed To Date (pounds)	Benzene Concentration (ppb)	Benzene Removed (pounds)	Benzene Removed To Date (pounds)	MTBE Concentratior (ppb)	MTBE Removed (pounds)	MTBE Removed To Date (pounds)
08/30/99	MW-1	218	577	06/22/99	20,000	0.03638	0.09629	100	0.00018	0.00048	150,000	0.27286	0.72220
09/03/99*	MW-1	125	702	06/22/99	20,000	0.02086	0.11715	100	0.00010	0.00059	150,000	0.15646	0.87866
09/10/99*	MW-1	75	777	06/22/99	20,000	0.01252	0.12967	100	0.00006	0.00065	150,000	0.09387	0.97253
09/23/99	MW-1	175	952	06/22/99	20,000	0.02921	0.15888	100	0.00015	0.00079	150,000	0.21904	1.19157
09/29/99	MW-1	50	1,002	06/22/99	20,000	0.00834	0.16722	100	0.00004	0.00084	150,000	0.06258	1.25416
11/05/99	MW-1	50	1,052	09/30/99	<2,500	0.00052	0.16774	<25.0	0.00001	0.00084	30,900	0.01289	1.26705
11/19/99	MW-1	22.5	1,075	09/30/99	<2,500	0.00023	0.16798	<25.0	0.00000	0.00084	30,900	0.00580	1.27285
11/24/99	MW-1	25	1,100	09/30/99	<2,500	0.00026	0.16824	<25.0	0.00000	0.00085	30,900	0.00645	1.27930
12/02/99	MW-1	25	1,125	09/30/99	<2,500	0.00026	0.16850	<25.0	0.00000	0.00085	30,900	0.00645	1.28574
12/17/99	MW-1	25	1,150	12/10/99	<50.0	0.00001	0.16850	29.7	0.00001	0.00086	76,300	0.01592	1.30166
01/03/00	MW-1	40	1,190	12/10/99	<50.0	0.00001	0.16851	29.7	0.00001	0.00086	76,300	0.02547	1.32713
01/07/00	MW-1	0	1,190	12/10/99	<50.0	0.00000	0.16851	29.7	0.00000	0.00086	76,300	0.00000	1.32713
01/13/00	MW-1	45	1,235	12/10/99	<50.0	0.00001	0.16852	29.7	0.00001	0.00088	76,300	0.02865	1.35578
01/12/00	MW-1	35	1,270	12/10/99	<50.0	0.00001	0.16853	29.7	0.00001	0.00088	76,300	0.02228	1.37806
01/25/00	MW-1	35	1,305	12/10/99	<50.0	0.00001	0.16854	29.7	0.00001	0.00089	76,300	0.02228	1.40034
02/01/00	MW-1	22	1,327	12/10/99	<50.0	0.00000	0.16854	29.7	0.00001	0.00090	76,300	0.01401	1.41435
02/11/00	MW-1	28	1,355	12/10/99	<50.0	0.00001	0.16855	29.7	0.00001	0.00091	76,300	0.01783	1.43218
02/15/00	MW-1	25	1,380	12/10/99	<50.0	0.00001	0.16855	29.7	0.00001	0.00091	76,300	0.01592	1.44809
02/23/00	MW-1	20	1,400	12/10/99	<50.0	0.00000	0.16856	29.7	0.00000	0.00092	76,300	0.01273	1.46083
03/02/00	MW-1	7.5	1,407	03/02/00	<2,500	0.00008	0.16863	<25.0	0.00000	0.00092	27,600	0.00173	1.46255
03/10/00	MW-1	40	1,447	03/02/00	<2,500	0.00042	0.16905	<25.0	0.00000	0.00092	27,600	0.00921	1.47177
03/15/00	MW-1	25	1,472	03/02/00	<2,500	0.00026	0.16931	<25.0	0.00000	0.00092	27,600	0.00576	1.47752
03/21/00	MW-1	25	1,497	03/02/00	<2,500	0.00026	0.16957	<25.0	0.00000	0.00093	27,600	0.00576	1.48328
03/27/00	MW-1	30	1,527	03/02/00	<2,500	0.00031	0.16989	<25.0	0.00000	0.00093	27,600	0.00691	1.49019
04/07/00	MW-1	45	1,572	03/02/00	<2,500	0.00047	0.17036	<25.0	0.00000	0.00094	27,600	0.01036	1.50056
04/13/00	MW-1	30	1,602	03/02/00	<2,500	0.00031	0.17067	<25.0	0.00000	0.00094	27,600	0.00691	1.50746
04/20/00	MW-1	25	1,627	03/02/00	<2,500	0.00026	0.17093	<25.0	0.00000	0.00094	27,600	0.00576	1.51322
04/26/00	MW-1	25	1,652	03/02/00	<2,500	0.00026	0.17119	<25.0	0.00000	0.00094	27,600	0.00576	1.51898
05/04/00	MW-1	28	1,680	03/02/00	<2,500	0.00029	0.17148	<25.0	0.00000	0.00095	27,600	0.00645	1.52543

Table 1: Groundwater Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

Date Purged	Well ID	Volume Pumped (gal)	Cumulative Volume Pumped (gal)	Date Sampled	TPPH Concentration (ppb)	TPPH Removed (pounds)	TPPH Removed To Date (pounds)	Benzene Concentration (ppb)	Benzene Removed (pounds)	Benzene Removed To Date (pounds)	MTBE Concentration (ppb)	MTBE Removed (pounds)	MTBE Removed To Date (pounds)
					TPPH			**Benzene**			**MTBE**		
05/09/00	MW-1	45	1,725	03/02/00	<2,500	0.00047	0.17195	<25.0	0.00000	0.00095	27,600	0.01036	1.53579
05/17/00	MW-1	27	1,752	03/02/00	<2,500	0.00028	0.17223	<25.0	0.00000	0.00095	27,600	0.00622	1.54201
05/22/00	MW-1	25	1,777	03/02/00	<2,500	0.00026	0.17249	<25.0	0.00000	0.00096	27,600	0.00576	1.54777
06/01/00	MW-1	25	1,802	03/02/00	<2,500	0.00026	0.17275	<25.0	0.00000	0.00096	27,600	0.00576	1.55353
06/06/00	MW-1	175	1,977	03/02/00	<2,500	0.00183	0.17458	<25.0	0.00002	0.00098	27,600	0.04030	1.59383
06/08/00	MW-1	43	2,020	03/02/00	<2,500	0.00045	0.17503	<25.0	0.00000	0.00098	27,600	0.00990	1.60373
06/15/00	MW-1	29	2,049	06/08/00	<2,000	0.00024	0.17527	<20.0	0.00000	0.00098	**67,600**	0.01636	1.62009
07/10/00	MW-1	169	2,218	06/08/00	<2,000	0.00141	0.17668	<20.0	0.00001	0.00100	**67,600**	0.09533	1.71542
09/07/00	MW-1	100	2,318	09/05/00	<10,000	0.00417	0.18085	411	0.00034	0.00134	**115,000**	0.09596	1.81138
10/23/00*	MW-1	100	2,418	09/05/00	<10,000	0.00417	0.18502	411	0.00034	0.00168	71,100	0.05933	1.87071
11/30/00	MW-1	160	2,578	09/05/00	<10,000	0.00668	0.19170	411	0.00055	0.00223	71,100	0.09493	1.96563
12/21/00	MW-1	125	2,703	12/15/00	35,600	0.03713	0.22883	1,310	0.00137	0.00360	136,000	0.14185	2.10749
05/16/01	MW-1	150	2,853	03/09/01	<10,000	0.00626	0.23509	1,390	0.00174	0.00534	**164,000**	0.20527	2.31276
06/19/01	MW-1	100	2,953	03/09/01	<10,000	0.00417	0.23926	1,390	0.00116	0.00650	**164,000**	0.13685	2.44961
07/24/01	MW-1	150	3,103	06/27/01	<5,000	0.00313	0.24239	<50	0.00003	0.00653	**19,000**	0.02378	2.47339
08/17/01	MW-1	100	3,203	06/27/01	<5,000	0.00209	0.24448	<50	0.00002	0.00655	**19,000**	0.01585	2.48924
09/25/01	MW-1	150	3,353	09/19/01	<5,000	0.00313	0.24761	<50	0.00003	0.00658	**52,000**	0.06509	2.55433
10/22/01	MW-1	150	3,503	09/19/01	<5,000	0.00313	0.25074	<50	0.00003	0.00661	**52,000**	0.06509	2.61941
11/06/01	MW-1	50	3,553	09/19/01	<5,000	0.00104	0.25178	<50	0.00001	0.00662	**52,000**	0.02170	2.64111
12/04/01	MW-1	100	3,653	09/19/01	<5,000	0.00209	0.25387	<50	0.00002	0.00664	**52,000**	0.04339	2.68450
01/28/02	MW-1	125	3,778	12/31/01	<5,000	0.00261	0.25647	<25	0.00001	0.00666	**17,000**	0.01773	2.70223
02/18/02	MW-1	50	3,828	12/31/01	<5,000	0.00104	0.25752	<25	0.00001	0.00666	**17,000**	0.00709	2.70932
03/27/02	MW-1	200	4,028	03/14/02	<20,000	0.01669	0.27420	<200	0.00017	0.00683	**60,000**	0.10013	2.80946
04/30/02	MW-1	108	4,136	03/14/02	<20,000	0.00901	0.28322	<200	0.00009	0.00692	**60,000**	0.05407	2.86353
05/28/02	MW-1	253	4,389	03/14/02	<20,000	0.02111	0.30433	<200	0.00021	0.00713	**60,000**	0.12667	2.99019
07/29/99	MW-3	100	100	06/22/99	58,000	0.04840	0.04840	6,600	0.00551	0.00551	**653,000**	0.54489	0.54489
08/04/99	MW-3	100	200	06/22/99	58,000	0.04840	0.09679	6,600	0.00551	0.01101	**653,000**	0.54489	1.08977
08/11/99	MW-3	45	245	06/22/99	58,000	0.02178	0.11857	6,600	0.00248	0.01349	**653,000**	0.24520	1.33497

Table 1: Groundwater Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

					TPPH			Benzene			MTBE		
Date Purged	Well ID	Volume Pumped (gal)	Cumulative Volume Pumped (gal)	Date Sampled	TPPH Concentration (ppb)	TPPH Removed (pounds)	TPPH Removed To Date (pounds)	Benzene Concentration (ppb)	Benzene Removed (pounds)	Benzene Removed To Date (pounds)	MTBE Concentration (ppb)	MTBE Removed (pounds)	MTBE Removed To Date (pounds)
08/20/99	MW-3	55	300	06/22/99	58,000	0.02662	0.14519	6,600	0.00303	0.01652	**653,000**	0.29969	1.63466
08/30/99	MW-3	77	377	06/22/99	58,000	0.03727	0.18246	6,600	0.00424	0.02076	**653,000**	0.41956	2.05422
09/03/99*	MW-3	50	427	06/22/99	58,000	0.02420	0.20666	6,600	0.00275	0.02352	**653,000**	0.27244	2.32667
09/10/99*	MW-3	40	467	06/22/99	58,000	0.01936	0.22602	6,600	0.00220	0.02572	**653,000**	0.21795	2.54462
09/23/99	MW-3	10	477	06/22/99	58,000	0.00484	0.23085	6,600	0.00055	0.02627	**653,000**	0.05449	2.59911
09/29/99	MW-3	50	527	06/22/99	58,000	0.02420	0.25505	6,600	0.00275	0.02902	**653,000**	0.27244	2.87155
11/05/99	MW-3	50	577	09/30/99	4,360	0.00182	0.25687	121	0.00005	0.02907	**35,600**	0.01485	2.88640
11/19/99	MW-3	22.5	600	09/30/99	4,360	0.00082	0.25769	121	0.00002	0.02910	**35,600**	0.00668	2.89309
11/24/99	MW-3	28	628	09/30/99	4,360	0.00102	0.25871	121	0.00003	0.02912	**35,600**	0.00832	2.90141
12/02/99	MW-3	25	653	09/30/99	4,360	0.00091	0.25962	121	0.00003	0.02915	**35,600**	0.00743	2.90883
12/17/99	MW-3	35	688	12/10/99	4,220	0.00123	0.26085	973	0.00028	0.02943	**88,200**	0.02576	2.93459
01/03/00	MW-3	40	728	12/10/99	4,220	0.00141	0.26226	973	0.00032	0.02976	**88,200**	0.02944	2.96403
01/07/00	MW-3	0	728	12/10/99	4,220	0.00000	0.26226	973	0.00000	0.02976	**88,200**	0.00000	2.96403
01/13/00	MW-3	45	773	12/10/99	4,220	0.00158	0.26385	973	0.00037	0.03012	**88,200**	0.03312	2.99715
01/21/00	MW-3	35	808	12/10/99	4,220	0.00123	0.26508	973	0.00028	0.03041	**88,200**	0.02576	3.02291
01/25/00	MW-3	38	846	12/10/99	4,220	0.00134	0.26642	973	0.00031	0.03072	**88,200**	0.02797	3.05088
02/01/00	MW-3	23	869	12/10/99	4,220	0.00081	0.26723	973	0.00019	0.03090	**88,200**	0.01693	3.06780
02/11/00	MW-3	22	891	12/10/99	4,220	0.00077	0.26800	973	0.00018	0.03108	**88,200**	0.01619	3.08399
02/15/00	MW-3	22	913	12/10/99	4,220	0.00077	0.26877	973	0.00018	0.03126	**88,200**	0.01619	3.10019
02/23/00	MW-3	30	943	12/10/99	4,220	0.00106	0.26983	973	0.00024	0.03150	**88,200**	0.02208	3.12226
03/02/00	MW-3	7	950	03/02/00	65,300	0.00381	0.27365	5,210	0.00030	0.03181	**59,800**	0.00349	3.12576
03/10/00	MW-3	42	992	03/02/00	65,300	0.02289	0.29653	5,210	0.00183	0.03363	**59,800**	0.02096	3.14672
03/15/00	MW-3	20	1,012	03/02/00	65,300	0.01090	0.30743	5,210	0.00087	0.03450	**59,800**	0.00998	3.15670
03/21/00	MW-3	25	1,037	03/02/00	65,300	0.01362	0.32105	5,210	0.00109	0.03559	**59,800**	0.01247	3.16917
03/27/00	MW-3	40	1,077	03/02/00	65,300	0.02180	0.34285	5,210	0.00174	0.03733	**59,800**	0.01996	3.18913
04/07/00	MW-3	45	1,122	03/02/00	65,300	0.02452	0.36737	5,210	0.00196	0.03929	**59,800**	0.02245	3.21158
04/13/00	MW-3	30	1,152	03/02/00	65,300	0.01635	0.38371	5,210	0.00130	0.04059	**59,800**	0.01497	3.22655
04/20/00	MW-3	25	1,177	03/02/00	65,300	0.01362	0.39733	5,210	0.00109	0.04168	**59,800**	0.01247	3.23903
04/26/00	MW-3	30	1,207	03/02/00	65,300	0.01635	0.41368	5,210	0.00130	0.04298	**59,800**	0.01497	3.25400

Table 1: Groundwater Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

Date Purged	Well ID	Volume Pumped (gal)	Cumulative Volume Pumped (gal)	Date Sampled	TPPH Concentration (ppb)	TPPH Removed (pounds)	TPPH Removed To Date (pounds)	Benzene Concentration (ppb)	Benzene Removed (pounds)	Benzene Removed To Date (pounds)	MTBE Concentration (ppb)	MTBE Removed (pounds)	MTBE Removed To Date (pounds)
					TPPH			**Benzene**			**MTBE**		
05/04/00	MW-3	26	1,233	03/02/00	65,300	0.01417	0.42785	5,210	0.00113	0.04411	**59,800**	0.01297	3.26697
05/09/00	MW-3	45	1,278	03/02/00	65,300	0.02452	0.45237	5,210	0.00196	0.04607	**59,800**	0.02245	3.28943
05/17/00	MW-3	27	1,305	03/02/00	65,300	0.01471	0.46708	5,210	0.00117	0.04724	**59,800**	0.01347	3.30290
05/22/00	MW-3	25	1,330	03/02/00	65,300	0.01362	0.48070	5,210	0.00109	0.04833	**59,800**	0.01247	3.31537
06/01/00	MW-3	25	1,355	03/02/00	65,300	0.01362	0.49432	5,210	0.00109	0.04942	**59,800**	0.01247	3.32785
06/06/00	MW-3	240	1,595	03/02/00	65,300	0.13077	0.62510	5,210	0.01043	0.05985	**59,800**	0.11976	3.44761
06/08/00	MW-3	42	1,637	03/02/00	65,300	0.02289	0.64798	5,210	0.00183	0.06168	**59,800**	0.02096	3.46857
06/15/00	MW-3	29	1,666	06/08/00	72,700	0.01759	0.66557	3,570	0.00086	0.06254	44,400	0.01074	3.47931
07/10/00	MW-3	101	1,767	06/08/00	72,700	0.06127	0.72684	3,570	0.00301	0.06555	44,400	0.03742	3.51673
09/07/00	MW-3	265	2,032	09/05/00	26,100	0.05771	0.78456	959	0.00212	0.06767	24,000	0.05307	3.56980
10/23/00*	MW-3	250	2,282	09/05/00	26,100	0.05445	0.83901	959	0.00200	0.06967	24,000	0.05007	3.61987
11/30/00	MW-3	210	2,492	09/05/00	26,100	0.04574	0.88474	959	0.00168	0.07135	24,000	0.04206	3.66192
12/21/00	MW-3	150	2,642	12/15/00	5,190	0.00650	0.89124	438	0.00055	0.07190	**11,800**	0.01477	3.67669
05/16/01	MW-3	500	3,142	03/09/01	5,880	0.02453	0.91577	472	0.00197	0.07387	41,800	0.17440	3.85109
06/19/01	MW-3	100	3,242	03/09/01	5,880	0.00491	0.92068	472	0.00039	0.07426	41,800	0.03488	3.88597
07/24/01	MW-3	350	3,592	06/27/01	9,100	0.02658	0.94725	330	0.00096	0.07522	**31,000**	0.09054	3.97650
08/17/01	MW-3	150	3,742	06/27/01	9,100	0.01139	0.95864	330	0.00041	0.07467	**31,000**	0.03880	4.01530
09/25/01	MW-3	300	4,042	09/19/01	790	0.00198	0.96062	14	0.00004	0.07526	**8,100**	0.02028	4.03558
10/22/01	MW-3	150	4,192	09/19/01	790	0.00099	0.96161	14	0.00002	0.07469	**8,100**	0.01014	4.04572
11/06/01	MW-3	50	4,242	09/19/01	790	0.00033	0.96194	14	0.00001	0.07527	**8,100**	0.00338	4.04910
12/04/01	MW-3	150	4,392	09/19/01	790	0.00099	0.96293	14	0.00002	0.07471	**8,100**	0.01014	4.05924
01/28/02	MW-3	50	4,442	12/31/01	<5,000	0.00104	0.96397	220	0.00009	0.07536	**22,000**	0.00918	4.06842
02/18/02	MW-3	49	4,491	12/31/01	<5,000	0.00102	0.96499	220	0.00009	0.07480	**22,000**	0.00900	4.07741
03/27/02	MW-3	220	4,711	03/14/02	<2,500	0.00229	0.96729	<25	0.00002	0.07538	**12,000**	0.02203	4.09944
04/30/02	MW-3	50	4,761	03/14/02	<2,500	0.00052	0.96781	<25	0.00001	0.07480	**12,000**	0.00501	4.10445
05/28/02	MW-3	2,520	7,281	03/14/02	<2,500	0.02628	0.99409	<25	0.00026	0.07564	**12,000**	0.25233	4.35678
Total Gallons Extracted:		**61,489**			**Total Pounds Removed:**		**1.55445**			**0.08560**			**12.02389**
					Total Gallons Removed:		**0.25483**			**0.01173**			**1.93934**

Table 1: Groundwater Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

					TPPH			Benzene			MTBE		
Date Purged	Well ID	Volume Pumped (gal)	Cumulative Volume Pumped (gal)	Date Sampled	TPPH Concentration (ppb)	TPPH Removed (pounds)	TPPH Removed To Date (pounds)	Benzene Concentration (ppb)	Benzene Removed (pounds)	Benzene Removed To Date (pounds)	MTBE Concentration (ppb)	MTBE Removed (pounds)	MTBE Removed To Date (pounds)

Abbreviations & Notes:

TPPH = Total purgeable hydrocarbons as gasoline
MtBE = Methyl tert-butyl ether
ppb = Parts per billion
gal = Gallon
* = Groundwater extracted per well estimated; subcontractor did not report individual well volumes
** = Concentrations for tank backfill well BW-D taken from nearest sampled tank backfill well, BW-B.
Mass removed based on the formula: volume extracted (gal) x Concentration (µg/L) x (g/10^6µg) x (pound/453.6g) x (3.785 L/gal)
Volume removal data based on the formula: density (in gms/cc) x 9.339 (ccxlbs/gmsxgals)
TPPH, benzene analyzed by EPA Method 8015/8020
MTBE analyzed by EPA Method 8260 in bold font, all other MTBE analyzed by EPA Method 8020
Concentrations based on most recent groundwater monitoring results
If concentration is less than the laboratory detection limit, one half of the detection limit concentration is used in the mass removal calculation.
Groundwater extracted by vacuum trucks provided by Onyx. Water disposed of at a Martinez Refinery.

Table 2: Vapor Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

Date	Well ID	Interval Hours of Operation (hours)	System Flow Rate (CFM)	Hydrocarbon Concentrations (Concentrations in ppmv) TPHg	Benzene	MTBE	TPHg Removal Rate (#/hour)	TPHg Cumulative TPHg Removed (#)	Benzene Removal Rate (#/hour)	Benzene Cumulative Benzene Removed (#)	MTBE Removal Rate (#/hour)	MTBE Cumulative MTBE Removed (#)
							TPHg		**Benzene**		**MTBE**	
06/06/00	MW-1	3.00	12.76	4.4	0.192	20.7	0.001	0.002	0.000	0.000	0.004	0.011
07/10/00	MW-1	3.00	11	<28	<0.31	30	0.002	0.008	0.000	0.000	0.005	0.024
09/07/00	MW-1	2.00	2.4	25.4	2.51	138	0.001	0.010	0.000	0.000	0.005	0.033
10/23/00	MW-1	4.00	0.7	1,650	61.6	392	0.015	0.072	0.001	0.002	0.004	0.048
11/30/00	MW-1	4.00	7.0	561	<1.57	62.8	0.052	0.282	0.000	0.003	0.006	0.073
12/21/00	MW-1	3.60	2.1	<2.838	<0.031	<0.277	0.000	0.282	0.000	0.003	0.000	0.073
05/16/01	MW-1	4.00	28.4	400	0.26	44	0.152	0.889	0.000	0.003	0.017	0.141
06/19/01	MW-1	3.83	5.8	350	<0.40	52	0.027	0.993	0.000	0.003	0.004	0.157
07/24/01	MW-1	4.00	10.3	<5.0	<0.050	<0.10	0.000	0.995	0.000	0.003	0.000	0.157
08/17/01	MW-1	4.00	15.1	1,900	7.3	51	0.384	2.529	0.001	0.008	0.011	0.199
09/25/01	MW-1	4.00	5.8	160	<0.10	37	0.012	2.578	0.000	0.008	0.003	0.211
06/06/00	MW-3	3.50	9.35	1,371	27.6	32	0.171	0.600	0.003	0.011	0.004	0.014
07/10/00	MW-3	2.00	11	564	8.9	76	0.083	0.766	0.001	0.013	0.011	0.037
09/07/00	MW-3	4.00	4.7	2,832	109	244	0.178	1.477	0.006	0.038	0.016	0.100
10/23/00	MW-3	4.00	1.4	3,040	45.6	323	0.057	1.705	0.001	0.041	0.006	0.125
11/30/00	MW-3	2.00	2.5	23,800	59.9	974	0.795	3.296	0.002	0.045	0.033	0.191
12/21/00	MW-3	4.50	3.0	<2.838	<0.031	<0.277	0.000	3.296	0.000	0.045	0.000	0.191
05/16/01	MW-3	4.25	0.9	21,000	64	270	0.253	4.370	0.001	0.048	0.003	0.205
06/19/01	MW-3	5.83	2.4	14,000	62	300	0.449	6.988	0.002	0.058	0.010	0.263
07/24/01	MW-3	4.00	5.3	<5.0	0.10	0.80	0.000	6.989	0.000	0.058	0.000	0.263
08/17/01	MW-3	4.00	11.0	11,000	53	290	1.618	13.459	0.007	0.087	0.044	0.438
09/25/01	MW-3	4.00	3.2	19,000	79	410	0.813	16.710	0.003	0.099	0.018	0.509
Total Pounds Removed:							**TPHg =**	**19.289**	**Benzene =**	**0.107**	**MTBE =**	**0.720**

Table 2: Vapor Extraction - Mass Removal Data - Shell-branded Service Station, Incident #98995752, 540 Hegenberger Road, Oakland, California

							TPHg		Benzene		MTBE	
		Interval	System				TPHg	Cumulative	Benzene	Cumulative	MTBE	Cumulative
		Hours of	Flow	Hydrocarbon Concentrations			Removal	TPHg	Removal	Benzene	Removal	MTBE
	Well	Operation	Rate	TPHg	Benzene	MTBE	Rate	Removed	Rate	Removed	Rate	Removed
Date	ID	(hours)	(CFM)	(Concentrations in ppmv)			(#/hour)	(#)	(#/hour)	(#)	(#/hour)	(#)

Abbreviations and Notes:

CFM = Cubic feet per minute

TPHg = Total petroleum hydrocarbons as gasoline (C6-C12) by modified EPA Method 8015 in 1 liter tedlar bag samples

ppmv = Parts per million by volume

= Pounds

TPHG, Benzene, and MTBE analyzed by EPA Method 8015/8020 in 1 liter tedlar bag samples

TPHg / Benzene / MTBE removal rate = Rate based on Bay Area Air Quality Management District's Manual of Procedures for Soil Vapor Extraction dated July 17, 1991.

(Rate = Concentration (ppmv) x system flow rate (cfm) x (1lb-mole/386ft3) x molecular weight (86 lb/lb-mole for TPHg, 78 lb/lb-mole for benzene, 88 lb/lb-mole for MTBE) x 60 min/hour x 1/1,000,000)

Cumulative TPHg / Benzene / MTBE removal = Previous removal rate multiplied by the hour-interval of operation plus the previous total

If concentration is less than the laboratory detection limit, one half of the detection limit concentration is used in the mass removal calculation.

ATTACHMENT A

Blaine Groundwater Monitoring Report and Field Notes

BLAINE
TECH SERVICES, INC.

1680 ROGERS AVENUE
SAN JOSE, CA 95112-1105
(408) 573-7771 FAX
(408) 573-0555 PHONE
CONTRACTOR'S LICENSE #746684
www.blainetech.com

April 10, 2002

Karen Petryna
Equiva Services LLC
P.O. Box 7869
Burbank, CA 91510-7869

First Quarter 2002 Groundwater Monitoring at
Shell-branded Service Station
540 Hegenberger Road
Oakland, CA

Monitoring performed on March 14 and 29, 2002

Groundwater Monitoring Report **020314-DA-1**

This report covers the routine monitoring of groundwater wells at this Shell-branded facility. 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 purge volume (if applicable), elapsed evacuation time (if applicable), total volume of water removed (if applicable), and standard water parameter instrument readings. Sample material is collected, contained, stored, and transported to the laboratory in conformance with EPA standards. Purgewater (if applicable) is, likewise, collected and transported to the Martinez Refining Company.

Basic field information is presented alongside analytical values excerpted from the laboratory report in the cumulative table of **WELL CONCENTRATIONS**. The full analytical report for the most recent samples and the field data sheets are attached to this report.

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. Our activities at this site consisted of objective data and sample collection only. No interpretation of analytical results, defining of hydrological conditions or formulation of recommendations was performed.

Please call if you have any questions.

Yours truly,

Leon Gearhart
Project Coordinator

LG/jt

attachments: Cumulative Table of WELL CONCENTRATIONS
Certified Analytical Report
Field Data Sheets

cc: Anni Kreml
Cambria Environmental Technology, Inc.
1144 65th Street
Oakland, CA 94608-2411

WELL CONCENTRATIONS
Shell-branded Service Station
540 Hegenberger Road
Oakland, CA
WIC #204-5508-5900

Well ID	Date	TPPH (ug/L)	B (ug/L)	T (ug/L)	E (ug/L)	X (ug/L)	MTBE 8020 (ug/L)	MTBE 8260 (ug/L)	TOC (MSL)	Depth to Water (ft.)	GW Elevation (MSL)	DO Reading (ppm)
MW-1 (a)	08/26/1998	2,700	28	55	59	39	33,000	NA	10.54	7.91	2.63	1.8
MW-1 (b)	08/26/1998	<1,000	22	<10	<10	<10	17,000	NA	10.54	7.91	2.63	2.2
MW-1	12/28/1998	<5,000	<50.0	<50.0	<50.0	<50.0	153,000	33,000	10.54	8.75	1.79	1.9
MW-1	03/29/1999	<2,000	<20.0	<20.0	<20.0	<20.0	693,000	NA	10.54	8.32	2.22	2.0
MW-1	06/22/1999	20,000	<200	<200	<200	<200	150,000	NA	10.54	9.05	1.49	1.7
MW-1	09/30/1999	<2,500	<25.0	<25.0	<25.0	<25.0	30,900	NA	10.54	8.35	2.19	2.6
MW-1	11/19/1999	NA	NA	NA	NA	NA	NA	NA	10.54	9.58	0.96	NA
MW-1	11/24/1999	NA	NA	NA	NA	NA	NA	NA	10.54	9.65	0.89	NA
MW-1	12/02/1999	NA	NA	NA	NA	NA	NA	NA	10.54	9.55	0.99	NA
MW-1	12/10/1999	<50.0	29.7	<20.0	<20.0	<20.0	76,300	NA	10.54	8.86	1.68	1.2
MW-1	03/02/2000	<2,500	<25.0	<25.0	<25.0	<25.0	27,600	NA	10.54	8.83	1.71	3.2
MW-1	06/08/2000	<2,000	<20.0	<20.0	<20.0	<20.0	59,000	67,600	10.54	7.78	2.76	1.9
MW-1	09/05/2000	<10,000	411	<100	<100	<100	71,100	115,000e	10.54	7.84	2.70	NA
MW-1	12/15/2000	35,600	1,310	<50.0	<50.0	<50.0	136,000	f	10.54	7.65	2.89	NA
MW-1	03/09/2001	<10,000	1,390	<100	<100	<100	89,600	164,000	10.54	6.44	4.10	NA
MW-1	06/27/2001	<5,000	<50	<50	<50	<50	NA	19,000	10.54	8.46	2.08	NA
MW-1	09/19/2001	<5,000	<50	<50	<50	<50	NA	52,000	10.54	8.10	2.44	NA
MW-1	12/31/2001	<5,000	<25	<25	<25	<25	NA	17,000	10.54	7.31	3.23	NA
MW-1	**03/14/2002**	**<20,000**	**<200**	**<200**	**<200**	**<200**	**NA**	**60,000**	**10.54**	**7.68**	**2.86**	**NA**
MW-2 (a)	08/26/1998	<250	3.2	<2.5	<2.5	<2.5	4,000	NA	9.21	7.18	2.03	2.4
MW-2 (b)	08/26/1998	<250	3.1	<2.5	<2.5	<2.5	4,800	NA	9.21	7.18	2.03	2.7
MW-2 (D)(b)	08/26/1998	<250	4.8	<2.5	<2.5	6.0	3,300	NA	9.21	7.18	2.03	2.7
MW-2	12/28/1998	<50.0	<0.500	<0.500	<0.500	<0.500	28.8	NA	9.21	7.34	1.87	2.1
MW-2	03/29/1999	235	<0.500	<0.500	<0.500	3.4	101	NA	9.21	6.85	2.36	2.0
MW-2	06/22/1999	<50	<0.50	<0.50	<0.50	<0.50	<2.5	NA	9.21	7.10	2.11	1.9

WELL CONCENTRATIONS
Shell-branded Service Station
540 Hegenberger Road
Oakland, CA
WIC #204-5508-5900

Well ID	Date	TPPH (ug/L)	B (ug/L)	T (ug/L)	E (ug/L)	X (ug/L)	MTBE 8020 (ug/L)	MTBE 8260 (ug/L)	TOC (MSL)	Depth to Water (ft.)	GW Elevation (MSL)	DO Reading (ppm)
MW-2	09/30/1999	<50.0	<0.500	<0.500	<0.500	<0.500	1,700	NA	9.21	8.06	1.15	1.0
MW-2	12/10/1999	<50.0	<0.500	<0.500	<0.500	<0.500	<2.50	NA	9.21	8.61	0.60	1.4
MW-2	03/02/2000	<500	11.5	<5.00	<5.00	<5.00	5,280	NA	9.21	6.33	2.88	0.4
MW-2	06/08/2000	<50.0	0.670	<0.500	<0.500	<0.500	3,160	NA	9.21	6.87	2.34	1.6
MW-2	09/05/2000	<1,000	<10.0	<10.0	<10.0	<10.0	9,600	NA	9.21	6.79	2.42	NA
MW-2	12/15/2000	<200	<2.00	<2.00	<2.00	<2.00	6,320	NA	9.21	6.76	2.45	NA
MW-2	03/09/2001	<500	<5.00	<5.00	<5.00	<5.00	17,200	NA	9.21	6.28	2.93	NA
MW-2	06/27/2001	<100	1.4	<1.0	<1.0	<2.0	NA	470	9.21	7.12	2.09	NA
MW-2	09/19/2001	<50	<0.50	<0.50	<0.50	<0.50	NA	330	9.21	7.17	2.04	NA
MW-2	12/31/2001	<100	<1.0	<1.0	<1.0	<1.0	NA	420	9.21	6.24	2.97	NA
MW-2	**03/14/2002**	**<250**	**4.5**	**3.3**	**<2.5**	**<2.5**	**NA**	**1,600**	**9.21**	**6.72**	**2.49**	**NA**
MW-3 (a)	08/26/1998	2,300	180	330	<0.50	420	44,000	NA	9.45	6.52	2.93	1.8
MW-3 (b)	08/26/1998	<50	<0.50	<0.50	<0.50	<0.50	52,000	75,000	9.45	6.52	2.93	2.3
MW-3	12/28/1998	<5,00	139	<50.0	<50.0	<50.0	15,100	NA	9.45	6.73	2.72	1.7
MW-3	03/29/1999	52,500	5,500	6,900	1,360	6,250	508,000	630,000 (c)	9.45	6.21	3.24	2.1
MW-3	06/22/1999	58,000	6,600	9,850	1,640	6,950	677,000	653,000	9.45	7.00	2.45	1.3
MW-3	09/30/1999	4,360	121	122	36.1	647	33,700	35,600	9.45	6.84	2.61	0.6
MW-3	11/19/1999	NA	NA	NA	NA	NA	NA	NA	9.45	7.93	1.52	NA
MW-3	11/24/1999	NA	NA	NA	NA	NA	NA	NA	9.45	8.25	1.20	NA
MW-3	12/02/1999	NA	NA	NA	NA	NA	NA	NA	9.45	7.55	1.90	NA
MW-3	12/10/1999	4,220	973	26.3	273	584	88,200	NA	9.45	7.28	2.17	2.5
MW-3	03/02/2000	65,300	5,210	10,300	2,650	15,100	56,800	59,800e	9.45	5.87	3.58	d
MW-3	06/08/2000	72,700	3,570	10,200	2,100	13,400	44,400	NA	9.45	5.32	4.13	1.1
MW-3	09/05/2000	26,100	959	2,910	1,090	5,640	24,000	NA	9.45	5.60	3.85	NA
MW-3	12/15/2000	5,190	438	8.39	483	530	19,100	11,800f	9.45	6.27	3.18	NA
MW-3	03/09/2001	5,880	472	42.2	392	1,290	41,800	NA	9.45	5.71	3.74	NA

WELL CONCENTRATIONS
Shell-branded Service Station
540 Hegenberger Road
Oakland, CA
WIC #204-5508-5900

Well ID	Date	TPPH (ug/L)	B (ug/L)	T (ug/L)	E (ug/L)	X (ug/L)	MTBE 8020 (ug/L)	MTBE 8260 (ug/L)	TOC (MSL)	Depth to Water (ft.)	GW Elevation (MSL)	DO Reading (ppm)
MW-3	06/27/2001	9,100	330	79	140	1,600	NA	31,000	9.45	6.88	2.57	NA
MW-3	09/19/2001	790	14	18	17	67	NA	8,100	9.45	6.70	2.75	NA
MW-3	12/31/2001	<5,000	220	<50	86	<50	NA	22,000	9.45	5.92	3.53	NA
MW-3	**03/14/2002**	**<2,500**	**<25**	**<25**	**<25**	**<25**	**NA**	**12,000**	**9.45**	**6.25**	**3.20**	**NA**
MW-4	09/25/2000	NA	NA	NA	NA	NA	NA	NA	9.88	7.64	2.24	NA
MW-4	12/15/2000	<50.0	<0.500	<0.500	<0.500	<0.500	<2.50	NA	9.88	7.55	2.33	NA
MW-4	03/09/2001	<50.0	<0.500	0.730	<0.500	0.529	3.16	NA	9.88	7.04	2.84	NA
MW-4	06/27/2001	<50	<0.50	<0.50	<0.50	<0.50	NA	<5.0	9.88	7.76	2.12	NA
MW-4	09/19/2001	<50	<0.50	<0.50	<0.50	<0.50	NA	<5.0	9.88	7.69	2.19	NA
MW-4	12/31/2001	<50	<0.50	<0.50	<0.50	<0.50	NA	<5.0	9.88	7.08	2.80	NA
MW-4	**03/14/2002**	**<50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**NA**	**<5.0**	**9.88**	**7.57**	**2.31**	**NA**
C-1	09/19/2001	<50	<0.50	<0.50	<0.50	<0.50	NA	<5.0	NA	1.44	NA	NA
C-1	**03/29/2002**	**<50**	**<0.50**	**<0.50**	**<0.50**	**<0.50**	**NA**	**<5.0**	**NA**	**2.59**	**NA**	**NA**
SD-1	09/19/2001	Unable to sample		NA	NA	NA	NA	NA	NA	NA	NA	NA
SD-1	**03/29/2002**	**Dry**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**
SD-2	09/19/2001	Unable to sample		NA	NA	NA	NA	NA	NA	NA	NA	NA
SD-2	**03/29/2002**	**Dry**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**	**NA**
BW-A	06/22/1999	318	<0.50	<0.50	0.590	1.48	4,470	NA	NA	4.71	NA	1.1
BW-B	06/22/1999	<250	<2.5	<2.5	<2.5	<2.5	8,600	NA	NA	5.90	NA	1.2
BW-B	06/27/2001	<5,000	<50	<50	<50	<50	NA	40,000	NA	5.83	NA	NA
BW-B	12/31/2001	<2,000	<20	<20	<20	<20	NA	9,200	NA	4.19	NA	NA

WELL CONCENTRATIONS
Shell-branded Service Station
540 Hegenberger Road
Oakland, CA
WIC #204-5508-5900

Well ID	Date	TPPH (ug/L)	B (ug/L)	T (ug/L)	E (ug/L)	X (ug/L)	MTBE 8020 (ug/L)	MTBE 8260 (ug/L)	TOC (MSL)	Depth to Water (ft.)	GW Elevation (MSL)	DO Reading (ppm)
BW-B	**03/14/2002**	**<2,000**	**<20**	**<20**	**<20**	**<20**	**NA**	**9,400**	**NA**	**5.24**	**NA**	**NA**
BW-C	06/22/1999	<50	<0.50	<0.50	<0.50	0.98	11,000	NA	NA	5.91	NA	1.6
BW-D	06/22/1999	<50.0	<0.500	<0.500	<0.500	<0.500	2,190	NA	NA	4.78	NA	1.4

Abbreviations:
TPPH = Total petroleum hydrocarbons as gasoline by EPA Method 8260B; prior to June 27, 2001, analyzed by EPA Method 8015.
BTEX = Benzene, toluene, ethylbenzene, xylenes by EPA Method 8260B; prior to June 27, 2001, analyzed by EPA Method 8020.
MTBE = Methyl-tertiary-butyl ether
TOC = Top of Casing Elevation
GW = Groundwater
DO = Dissolved Oxygen
ppm = Parts per million
ug/L = Parts per billion
msl = Mean sea level
ft = Feet
<n = Below detection limit
D = Duplicate sample
NA = Not applicable

WELL CONCENTRATIONS
Shell-branded Service Station
540 Hegenberger Road
Oakland, CA
WIC #204-5508-5900

Well ID	Date	TPPH (ug/L)	B (ug/L)	T (ug/L)	E (ug/L)	X (ug/L)	MTBE 8020 (ug/L)	MTBE 8260 (ug/L)	TOC (MSL)	Depth to Water (ft.)	GW Elevation (MSL)	DO Reading (ppm)

Notes:

a = pre-purge

b = post purge

c = Lab confirmed MTBE by mistake. MTBE value at MW-1 should have been confirmed instead.

d = DO reading not taken.

e = Sample was analyzed outside of the EPA recommended holding time.

f = The second highest MTBE hit was mistakenly confirmed. MTBE for MW-1 should have been confirmed.

Site surveyed September 21, 2000 by Virgil Chavez Land Surveying of Vallejo, California.

C-1 is a canal sample location.

SD-1 and SD-2 are storm drains.

KIFF ANALYTICAL LLC

Report Number : 25348
Date : 3/27/2002

Leon Gearhart
Blaine Tech Services
1680 Rogers Avenue
San Jose, CA 95112-1105

Subject : 5 Water Samples
Project Name : 540 Hegenberger Road, Oakland
Project Number : 020314-DA-1
P.O. Number : 98995752

Dear Mr. Gearhart,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,

Joel Kiff

Joel Kiff

KIFF ANALYTICAL LLC

Report Number : 25348
Date : 3/27/2002

Project Name : **540 Hegenberger Road, Oakland**
Project Number : **020314-DA-1**

Sample : **MW-1** Matrix : Water Lab Number : 25348-01
Sample Date :3/14/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	**< 200**	200	ug/L	EPA 8260B	3/26/2002
Toluene	**< 200**	200	ug/L	EPA 8260B	3/26/2002
Ethylbenzene	**< 200**	200	ug/L	EPA 8260B	3/26/2002
Total Xylenes	**< 200**	200	ug/L	EPA 8260B	3/26/2002
Methyl-t-butyl ether (MTBE)	**60000**	2000	ug/L	EPA 8260B	3/26/2002
TPH as Gasoline	**< 20000**	20000	ug/L	EPA 8260B	3/26/2002
Toluene - d8 (Surr)	97.0		% Recovery	EPA 8260B	3/26/2002
4-Bromofluorobenzene (Surr)	97.8		% Recovery	EPA 8260B	3/26/2002

Sample : **MW-2** Matrix : Water Lab Number : 25348-02
Sample Date :3/14/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	**4.5**	2.5	ug/L	EPA 8260B	3/27/2002
Toluene	**3.3**	2.5	ug/L	EPA 8260B	3/27/2002
Ethylbenzene	**< 2.5**	2.5	ug/L	EPA 8260B	3/27/2002
Total Xylenes	**< 2.5**	2.5	ug/L	EPA 8260B	3/27/2002
Methyl-t-butyl ether (MTBE)	**1600**	25	ug/L	EPA 8260B	3/27/2002
TPH as Gasoline	**< 250**	250	ug/L	EPA 8260B	3/27/2002
Toluene - d8 (Surr)	98.1		% Recovery	EPA 8260B	3/27/2002
4-Bromofluorobenzene (Surr)	98.2		% Recovery	EPA 8260B	3/27/2002

Joel Kiff

Approved By: Joel Kiff

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

KIFF ANALYTICAL LLC

Report Number : 25348
Date : 3/27/2002

Project Name : **540 Hegenberger Road, Oakland**
Project Number : **020314-DA-1**

Sample : **MW-3** Matrix : Water Lab Number : 25348-03
Sample Date :3/14/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	**< 25**	25	ug/L	EPA 8260B	3/24/2002
Toluene	**< 25**	25	ug/L	EPA 8260B	3/24/2002
Ethylbenzene	**< 25**	25	ug/L	EPA 8260B	3/24/2002
Total Xylenes	**< 25**	25	ug/L	EPA 8260B	3/24/2002
Methyl-t-butyl ether (MTBE)	**12000**	250	ug/L	EPA 8260B	3/24/2002
TPH as Gasoline	**< 2500**	2500	ug/L	EPA 8260B	3/24/2002
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	3/24/2002
4-Bromofluorobenzene (Surr)	91.6		% Recovery	EPA 8260B	3/24/2002

Sample : **MW-4** Matrix : Water Lab Number : 25348-04
Sample Date :3/14/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	**< 0.50**	0.50	ug/L	EPA 8260B	3/19/2002
Toluene	**< 0.50**	0.50	ug/L	EPA 8260B	3/19/2002
Ethylbenzene	**< 0.50**	0.50	ug/L	EPA 8260B	3/19/2002
Total Xylenes	**< 0.50**	0.50	ug/L	EPA 8260B	3/19/2002
Methyl-t-butyl ether (MTBE)	**< 5.0**	5.0	ug/L	EPA 8260B	3/19/2002
TPH as Gasoline	**< 50**	50	ug/L	EPA 8260B	3/19/2002
Toluene - d8 (Surr)	93.6		% Recovery	EPA 8260B	3/19/2002
4-Bromofluorobenzene (Surr)	99.6		% Recovery	EPA 8260B	3/19/2002

Approved By: Joel Kiff

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

KIFF ANALYTICAL LLC

Report Number : 25348
Date : 3/27/2002

Project Name : **540 Hegenberger Road, Oakland**
Project Number : **020314-DA-1**

Sample : **BW-B** Matrix : Water Lab Number : 25348-05
Sample Date :3/14/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	**< 20**	20	ug/L	EPA 8260B	3/26/2002
Toluene	**< 20**	20	ug/L	EPA 8260B	3/26/2002
Ethylbenzene	**< 20**	20	ug/L	EPA 8260B	3/26/2002
Total Xylenes	**< 20**	20	ug/L	EPA 8260B	3/26/2002
Methyl-t-butyl ether (MTBE)	**9400**	200	ug/L	EPA 8260B	3/26/2002
TPH as Gasoline	**< 2000**	2000	ug/L	EPA 8260B	3/26/2002
Toluene - d8 (Surr)	97.6		% Recovery	EPA 8260B	3/26/2002
4-Bromofluorobenzene (Surr)	92.4		% Recovery	EPA 8260B	3/26/2002

Approved By: Joel Kiff

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

Report Number : 25348

Date : 3/27/2002

QC Report : Method Blank Data

Project Name : **540 Hegenberger Road, Oakland**

Project Number : **020314-DA-1**

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	3/26/2002
Toluene	< 0.50	0.50	ug/L	EPA 8260B	3/26/2002
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	3/26/2002
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	3/26/2002
Methyl-t-butyl ether (MTBE)	< 5.0	5.0	ug/L	EPA 8260B	3/26/2002
TPH as Gasoline	< 50	50	ug/L	EPA 8260B	3/26/2002
Toluene - d8 (Surr)	99.4		%	EPA 8260B	3/26/2002
4-Bromofluorobenzene (Surr)	100		%	EPA 8260B	3/26/2002
Benzene	< 0.50	0.50	ug/L	EPA 8260B	3/23/2002
Toluene	< 0.50	0.50	ug/L	EPA 8260B	3/23/2002
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	3/23/2002
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	3/23/2002
Methyl-t-butyl ether (MTBE)	< 5.0	5.0	ug/L	EPA 8260B	3/23/2002
TPH as Gasoline	< 50	50	ug/L	EPA 8260B	3/23/2002
Toluene - d8 (Surr)	99.7		%	EPA 8260B	3/23/2002
4-Bromofluorobenzene (Surr)	91.6		%	EPA 8260B	3/23/2002
Benzene	< 0.50	0.50	ug/L	EPA 8260B	3/19/2002
Toluene	< 0.50	0.50	ug/L	EPA 8260B	3/19/2002
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	3/19/2002
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	3/19/2002
Methyl-t-butyl ether (MTBE)	< 5.0	5.0	ug/L	EPA 8260B	3/19/2002
TPH as Gasoline	< 50	50	ug/L	EPA 8260B	3/19/2002
Toluene - d8 (Surr)	93.5		%	EPA 8260B	3/19/2002
4-Bromofluorobenzene (Surr)	98.7		%	EPA 8260B	3/19/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed

Approved By: Joel Kiff

KIFF ANALYTICAL, LLC

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

Report Number : 25348

QC Report : Matrix Spike/ Matrix Spike Duplicate

Date : 3/27/2002

Project Name : **540 Hegenberger Road,**

Project Number : **020314-DA-1**

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	Units	Analysis Method	Date Analyzed	Spiked Sample Percent Recov.	Duplicate Spiked Sample Percent Recov.	Relative Percent Diff.	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
Benzene	25409-03	0.84	19.9	19.8	19.1	19.3	ug/L	EPA 8260B	3/26/02	91.5	93.2	1.86	70-130	25
Toluene	25409-03	<0.50	19.9	19.8	18.3	18.4	ug/L	EPA 8260B	3/26/02	91.8	93.1	1.41	70-130	25
Tert-Butanol	25409-03	<5.0	99.7	98.9	102	99.8	ug/L	EPA 8260B	3/26/02	102	101	1.04	70-130	25
Methyl-t-Butyl Ether	25409-03	<0.50	19.9	19.8	15.4	17.4	ug/L	EPA 8260B	3/26/02	77.0	87.9	13.1	70-130	25
Benzene	25383-09	<0.50	40.0	40.0	39.6	39.8	ug/L	EPA 8260B	3/23/02	99.1	99.5	0.352	70-130	25
Toluene	25383-09	<0.50	40.0	40.0	40.5	39.9	ug/L	EPA 8260B	3/23/02	101	99.8	1.47	70-130	25
Tert-Butanol	25383-09	<5.0	200	200	200	200	ug/L	EPA 8260B	3/23/02	100	99.9	0.310	70-130	25
Methyl-t-Butyl Ether	25383-09	<0.50	40.0	40.0	34.2	35.6	ug/L	EPA 8260B	3/23/02	85.5	89.1	4.15	70-130	25
Benzene	25388-01	<0.50	40.0	40.0	42.1	40.9	ug/L	EPA 8260B	3/19/02	105	102	2.89	70-130	25
Toluene	25388-01	<0.50	40.0	40.0	41.3	38.4	ug/L	EPA 8260B	3/19/02	103	95.9	7.40	70-130	25
Tert-Butanol	25388-01	<5.0	200	200	223	218	ug/L	EPA 8260B	3/19/02	112	109	2.54	70-130	25
Methyl-t-Butyl Ether	25388-01	<0.50	40.0	40.0	36.8	37.8	ug/L	EPA 8260B	3/19/02	92.1	94.5	2.62	70-130	25

Approved By: Joel Kiff

KIFF ANALYTICAL, LLC

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

Report Number : 25348

Date : 3/27/2002

QC Report : Laboratory Control Sample (LCS)

Project Name : **540 Hegenberger Road,**

Project Number : **020314-DA-1**

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
Benzene	20.0	ug/L	EPA 8260B	3/26/02	95.1	70-130
Toluene	20.0	ug/L	EPA 8260B	3/26/02	95.6	70-130
Tert-Butanol	100	ug/L	EPA 8260B	3/26/02	105	70-130
Methyl-t-Butyl Ether	20.0	ug/L	EPA 8260B	3/26/02	75.4	70-130
Benzene	40.0	ug/L	EPA 8260B	3/23/02	102	70-130
Toluene	40.0	ug/L	EPA 8260B	3/23/02	103	70-130
Tert-Butanol	200	ug/L	EPA 8260B	3/23/02	99.9	70-130
Methyl-t-Butyl Ether	40.0	ug/L	EPA 8260B	3/23/02	92.5	70-130
Benzene	40.0	ug/L	EPA 8260B	3/19/02	108	70-130
Toluene	40.0	ug/L	EPA 8260B	3/19/02	106	70-130
Tert-Butanol	200	ug/L	EPA 8260B	3/19/02	108	70-130
Methyl-t-Butyl Ether	40.0	ug/L	EPA 8260B	3/19/02	110	70-130

Approved By: Joel Kiff

KIFF ANALYTICAL, LLC

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

LAB: 16155

EQUIVA Services LLC Chain Of Custody Record

Lab Identification (if necessary):

Address:

City, State, Zip:

Equiva Project Manager to be Invoiced: Karen Petryna

☑ SCIENCE & ENGINEERING ☐ TECHNICAL SERVICES ☐ CRMT HOUSTON

25348

INCIDENT NUMBER (S&E ONLY): 9 8 9 9 5 7 5 2

SAP or CRMT NUMBER (TS/CRMT):

DATE: 3/14/02

PAGE: 1 of 1

SAMPLING COMPANY:	LOG CODE:	SITE ADDRESS (Street and City):	GLOBAL ID NO.:
Blaine Tech Services	BTSS	540 Hegenberger Road, Oakland	T0600102123

ADDRESS: 1680 Rogers Avenue, San Jose, CA 95112

EDF DELIVERABLE TO (Responsible Party or Designee):	PHONE NO.:	E-MAIL:	CONSULTANT PROJECT NO.:
Anni Kreml	510-420-3335	ShellOaklandEDF@cambria-env.com	BTS # 020304-DA-1

PROJECT CONTACT (Hardcopy or PDF Report to): Leon Gearhart

TELEPHONE:	FAX:	E-MAIL:
408-573-0555	408-573-7771	lgearhart@blainetech.com

SAMPLER NAME(S) (Print): David Allbaugh

LAB USE ONLY

TURNAROUND TIME (BUSINESS DAYS): ☒ 10 DAYS ☐ 5 DAYS ☐ 72 HOURS ☐ 48 HOURS ☐ 24 HOURS ☐ LESS THAN 24 HOURS

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

GC/MS MTBE CONFIRMATION: HIGHEST _____ HIGHEST per BORING _____ ALL _____

SPECIAL INSTRUCTIONS OR NOTES: CHECK BOX IF EDD IS NEEDED ☑

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPH - Gas, Purgeable	BTEX	MTBE (8021B - 5ppb RL)	MTBE (8260B - 0.5ppb RL)	Oxygenates (5) by (8260B)	Ethanol (8260B)	Methanol	1,2-DCA (8260B)	EDB (8260B)		TPH - Diesel, Extractable (8015m)		MTBE (8260B) Confirmation, See Note								TEMPERATURE ON RECEIPT C°
-	MW-1	3/14/02	1610	W	3	X	X	X																		-01
-	MW-2		0903			X	X	X																		-02
-	MW-3		0942			X	X	X																		-03
-	MW-4		0835			X	X	X																		-04
-	~~MW-5~~ BW-B		0915			X	X	X																		-05

FIELD NOTES: Container/Preservative or PID Readings or Laboratory Notes

Relinquished by: (Signature)	Received by: (Signature)	Date:	Time:
David Allbaugh			
Relinquished by: (Signature)	Received by: (Signature)	Date:	Time:
Relinquished by: (Signature)	Received by: (Signature)	Date:	Time:
	John Cuttle/Kiff Analytical	031502	1032

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10/15/00 Revision

Q&Q Graphic (714) 898-9702

KIFF ANALYTICAL LLC

Report Number : 25736
Date : 4/4/2002

Leon Gearhart
Blaine Tech Services
1680 Rogers Avenue
San Jose, CA 95112-1105

Subject : 1 Water Sample
Project Name : 540 Hegenberger Road, Oakland
Project Number : 020329-DA-3
P.O. Number : 98995752

Dear Mr. Gearhart,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,

Joel Kiff

Joel Kiff

KIFF ANALYTICAL LLC

Report Number : 25736
Date : 4/4/2002

Project Name : **540 Hegenberger Road, Oakland**
Project Number : **020329-DA-3**

Sample : **C-1** Matrix : Water Lab Number : 25736-01
Sample Date :3/29/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	**< 0.50**	0.50	ug/L	EPA 8260B	4/3/2002
Toluene	**< 0.50**	0.50	ug/L	EPA 8260B	4/3/2002
Ethylbenzene	**< 0.50**	0.50	ug/L	EPA 8260B	4/3/2002
Total Xylenes	**< 0.50**	0.50	ug/L	EPA 8260B	4/3/2002
Methyl-t-butyl ether (MTBE)	**< 5.0**	5.0	ug/L	EPA 8260B	4/3/2002
TPH as Gasoline	**< 50**	50	ug/L	EPA 8260B	4/3/2002
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	4/3/2002
4-Bromofluorobenzene (Surr)	96.2		% Recovery	EPA 8260B	4/3/2002

Approved By: Joel Kiff

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

Report Number : 25736

Date : 4/4/2002

QC Report : Method Blank Data

Project Name : **540 Hegenberger Road, Oakland**

Project Number : **020329-DA-3**

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	4/3/2002
Toluene	< 0.50	0.50	ug/L	EPA 8260B	4/3/2002
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	4/3/2002
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	4/3/2002
Methyl-t-butyl ether (MTBE)	< 5.0	5.0	ug/L	EPA 8260B	4/3/2002
TPH as Gasoline	< 50	50	ug/L	EPA 8260B	4/3/2002
Toluene - d8 (Surr)	102		%	EPA 8260B	4/3/2002
4-Bromofluorobenzene (Surr)	97.7		%	EPA 8260B	4/3/2002

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed

Approved By: Joel Kiff

KIFF ANALYTICAL, LLC

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

Report Number : 25736

QC Report : Matrix Spike/ Matrix Spike Duplicate

Date : 4/4/2002

Project Name : **540 Hegenberger Road,**

Project Number : **020329-DA-3**

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	Units	Analysis Method	Date Analyzed	Spiked Sample Percent Recov.	Duplicate Spiked Sample Percent Recov.	Relative Percent Diff.	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
Benzene	25736-01	<0.50	40.0	40.0	43.0	41.4	ug/L	EPA 8260B	4/3/02	108	104	3.84	70-130	25
Toluene	25736-01	<0.50	40.0	40.0	45.4	43.7	ug/L	EPA 8260B	4/3/02	113	109	3.82	70-130	25
Tert-Butanol	25736-01	<5.0	200	200	192	183	ug/L	EPA 8260B	4/3/02	96.1	91.5	4.98	70-130	25
Methyl-t-Butyl Ether	25736-01	0.52	40.0	40.0	37.6	36.6	ug/L	EPA 8260B	4/3/02	92.7	90.3	2.57	70-130	25

Approved By: Joel Kiff

KIFF ANALYTICAL, LLC

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

Report Number : 25736

QC Report : Laboratory Control Sample (LCS)

Date : 4/4/2002

Project Name : **540 Hegenberger Road,**

Project Number : **020329-DA-3**

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
Benzene	40.0	ug/L	EPA 8260B	4/3/02	109	70-130
Toluene	40.0	ug/L	EPA 8260B	4/3/02	109	70-130
Tert-Butanol	200	ug/L	EPA 8260B	4/3/02	102	70-130
Methyl-t-Butyl Ether	40.0	ug/L	EPA 8260B	4/3/02	108	70-130

Approved By: Joel Kiff

KIFF ANALYTICAL, LLC

720 Olive Drive, Suite D Davis, CA 95616 530-297-4800

LAB: ____

EQUIVA Services LLC Chain Of Custody Record

Lab Identification (if necessary):

Address:

City, State, Zip:

Equiva Project Manager to be invoiced:

☑ SCIENCE & ENGINEERING ☐ TECHNICAL SERVICES ☐ CRMT HOUSTON

Karen Petryna

25736

INCIDENT NUMBER (S&E ONLY): 98995752

SAP or CRMT NUMBER (TS/CRMT):

DATE: 3/29/02

PAGE: 1 of 1

SAMPLING COMPANY: Blaine Tech Services	LOG CODE: BTSS
ADDRESS: 1680 Rogers Avenue, San Jose, CA 95112	
PROJECT CONTACT (Hardcopy or PDF Report to): Leon Gearhart	
TELEPHONE: 408-573-0555	FAX: 408-573-7771
E-MAIL: lgearhart@blainetech.com	
SITE ADDRESS (Street and City): 540 Hegenberger Road, Oakland	GLOBAL ID NO.: T0600102123
EDF DELIVERABLE TO (Responsible Party or Designee): Anni Kreml	PHONE NO.: 510-420-3335
E-MAIL: ShellOaklandEDF@cambria-env.com	CONSULTANT PROJECT NO.: BTS # 020329-DA-3
SAMPLER NAME(S) (Print): David Allbut	LAB USE ONLY

TURNAROUND TIME (BUSINESS DAYS): ☒ 10 DAYS ☐ 5 DAYS ☐ 72 HOURS ☐ 48 HOURS ☐ 24 HOURS ☐ LESS THAN 24 HOURS

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY: _____

GC/MS MTBE CONFIRMATION: HIGHEST _____ HIGHEST per BORING _____ ALL _____

SPECIAL INSTRUCTIONS OR NOTES: CHECK BOX IF EDD IS NEEDED ☑

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPH - Gas, Purgeable	BTEX	MTBE (8021B - 5ppb RL)	MTBE (8260B - 0.5ppb RL)	Oxygenates (5) by (8260B)	Ethanol (8260B)	Methanol	1,2-DCA (8260B)	EDB (8260B)		TPH - Diesel, Extractable (8015m)		MTBE (8260B) Confirmation, See Note									TEMPERATURE ON RECEIPT C°
	C-1	3/29/02	1350	W	3	X	X	X																		-01

FIELD NOTES:

Container/Preservative or PID Readings or Laboratory Notes

Relinquished by: (Signature) David Allbut	Received by: (Signature)	Date: 4/1/02 Time: 1048
Relinquished by: (Signature)	Received by: (Signature)	Date: Time:
Relinquished by: (Signature)	Received by: (Signature) John Cuttel/Kiff Analytical	Date: 040102 Time: 1048

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10/16/00 Revision

WELL GAUGING DATA

Project # 020329-DA-3 Date 3/29/02 Client Equiva

Site 540 Hegenberger Oakland

Well ID	Well Size (in.)	Sheen / Odor	Depth to Immiscible Liquid (ft.)	Thickness of Immiscible Liquid (ft.)	Volume of Immiscibles Removed (ml)	Depth to water (ft.)	Depth to well bottom (ft.)	Survey Point: TOB or TOC	
C-1 *	—					2.59	4.80	*	
SD-1 **	—	Storm Drain		Dry		—	—	Top of Grate	
SD-2 **	—	Storm	Drain	Dry		—	—	"	
* Gauged from cement overhang above ground west									
of Hegenberger.									
** Referenced from top of grate; North Side									

EQUIVA WELL MONITORING DATA SHEET

BTS #: 020329-DA-3	Site: 540 Hegenberger, Oakland
Sampler: Dave A	Date: 3/29/02
Well I.D.: ~~SD-2~~ C-1	Well Diameter: 2 3 4 6 8 canal
Total Well Depth: 4.80	Depth to Water: 2.59
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: sample ~~PVC~~ ~~Grade~~	D.O. Meter (if req'd): YSI HACH

Purge Method: ~~Bailer~~ Waterra
~~Disposable Bailer~~ Peristaltic
Middleburg Extraction Pump
Electric Submersible Other

Sampling Method: X Bailer
Disposable Bailer
Extraction Port
Dedicated Tubing
Other:

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
2"	0.16	6"	1.47
3"	0.37	Other canal	radius² * 0.163

(Gals.) X Grab Sample = Gals.
1 Case Volume | Specified Volumes | Calculated Volume

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
1345	63.8	7.9	13	16	~~0~~	

Did well dewater? Yes (No) Gallons actually evacuated: ~~0~~

Sampling Time: 1350 Sampling Date: 3/29/02

Sample I.D.: ~~SD-2~~ C-1 Laboratory: (Kiff) Sequoia Other

Analyzed for: ~~TPH-G BTEX MTBE~~ TPH-D Other:

EB I.D. (if applicable): @ Time Duplicate I.D. (if applicable):

Analyzed for: TPH-G BTEX MTBE TPH-D Other:

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

EQUIVA WELL MONITORING DATA SHEET

BTS #: 020379-0A-3	Site: 3/29/02 540 Hegenberger Oakland
Sampler: David A	Date: 3/29/02
Well I.D.: ~~SDT~~ SD-1	Well Diameter: 2 3 4 6 8 ~~other~~
Total Well Depth: —	Depth to Water: —
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: ~~TOP of~~ Grade ~~PVC~~ Grade	D.O. Meter (if req'd): YSI HACH

Purge Method: Bailer / ~~Disposable Bailer~~ / Middleburg / Electric Submersible / Waterra / Peristaltic / Extraction Pump / Other_____

Sampling Method: Bailer / ~~Disposable Bailer~~ / Extraction Port / Dedicated Tubing / Other: _____

Grab Sample

_____(Gals.) X _____ = _____ Gals.
1 Case Volume | Specified Volumes | Calculated Volume

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius² * 0.163

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
					~~0~~	
		Well Dry. No Sample.				

Did well dewater? Yes (No) Gallons actually evacuated: ~~0~~

Sampling Time: Sampling Date: 3/29/02

Sample I.D.: SD1 Laboratory: (Kiff) Sequoia Other_____

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

EB I.D. (if applicable): @ Time Duplicate I.D. (if applicable):

Analyzed for: TPH-G BTEX MTBE TPH-D Other:

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

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EQUIVA WELL MONITORING DATA SHEET

BTS #: 070529-DA-3	Site: 540 Heyenburger, Oakland
Sampler: David A.	Date: 3/29/02
Well I.D.: SP-2	Well Diameter: 2 3 4 6 8 storm drain
Total Well Depth: —	Depth to Water: —
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: TOC Grade	D.O. Meter (if req'd): YSI HACH

Purge Method: Bailer, Disposable Bailer, Middleburg, Electric Submersible, Waterra, Peristaltic, Extraction Pump, Other_____

Sampling Method: Bailer, Disposable Bailer, Extraction Port, Dedicated Tubing, Other: _____

_____ (Gals.) X	Grab Sample	=	_____ Gals.	
1 Case Volume	Specified Volumes		Calculated Volume	

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius² * 0.163

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
					—	
			Well Dry. No Sample.			

Did well dewater? Yes No Gallons actually evacuated: —

Sampling Time: Sampling Date: 3/29/02

Sample I.D.: SP-2 Laboratory: Kiff Sequoia Other_____

Analyzed for: ~~TPH-G BTEX MTBE~~ TPH-D Other:

EB I.D. (if applicable): @ Time Duplicate I.D. (if applicable):

Analyzed for: TPH-G BTEX MTBE TPH-D Other:

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

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WELL GAUGING DATA

Project # 020514-DA-1 Date 3/14/02 Client Equiva

Site 540 Hegenberger Rd. Oakland, CA

Well ID	Well Size (in.)	Sheen / Odor	Depth to Immiscible Liquid (ft.)	Thickness of Immiscible Liquid (ft.)	Volume of Immiscibles Removed (ml)	Depth to water (ft.)	Depth to well bottom (ft.)	Survey Point: TOB or TOC	
MW-1*	2					7.68	23.63		
MW-2	2					6.72	19.57		
MW-3*	2					6.25	19.46		
MW-4	4					7.57	18.53		
BW-B*	4					5.24	11.74		
* Gauged w/ stinger in well									

EQUIVA WELL MONITORING DATA SHEET

BTS #: 020314-DA-1	Site: 540 Hegenberger Rd - Oakland, CA
Sampler: David A.	Date: 3/14/02
Well I.D.: MW-1	Well Diameter: (2) 3 4 6 8 ___
Total Well Depth: 23.63	Depth to Water: 7.68
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: (PVC) Grade	D.O. Meter (if req'd): YSI HACH

Purge Method: (X) Bailer; Disposable Bailer; Middleburg; Electric Submersible; Waterra; Peristaltic; Extraction Pump; Other_____

Sampling Method: (X) Bailer; Disposable Bailer; Extraction Port; Dedicated Tubing; Other:

2.6 (Gals.) X	3	=	7.8 Gals.
1 Case Volume	Specified Volumes		Calculated Volume

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
(2")	0.16	6"	1.47
3"	0.37	Other	radius² * 0.163

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
0958	62.2	7.9	5770	7200	2.75	grey
1001	62.9	7.5	9246	>200	5.5	"
1005	61.9	7.5	9469	>200	8.0	"

Did well dewater? Yes (No) Gallons actually evacuated: 8

Sampling Time: 1010 Sampling Date: 3/14/02

Sample I.D.: MW-1 Laboratory: (Kiff) Sequoia Other_____

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

EB I.D. (if applicable): @ Time Duplicate I.D. (if applicable):

Analyzed for: TPH-G BTEX MTBE TPH-D Other:

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

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EQUIVA WELL MONITORING DATA SHEET

BTS #: 020314-DH-1	Site: 540 Hegenberger Rd - Oakland, CA
Sampler: David A.	Date: 3/14/02
Well I.D.: MW-2	Well Diameter: (2) 3 4 6 8 ___
Total Well Depth: 19.57	Depth to Water: 6.72
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: (PVC) Grade	D.O. Meter (if req'd): YSI HACH

Purge Method: X Bailer / Disposable Bailer / Middleburg / Electric Submersible / Waterra / Peristaltic / Extraction Pump / Other_____

Sampling Method: X Bailer / Disposable Bailer / Extraction Port / Dedicated Tubing / Other: _____

2.1 (Gals.) X	3	= 6.3 Gals.
1 Case Volume	Specified Volumes	Calculated Volume

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
(2")	0.16	6"	1.47
3"	0.37	Other	radius² * 0.163

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
0856	61.0	7.9	1414	7200	3	cloudy
0857	62.2	7.8	1302	7200	4	"
0859	63.2	7.6	1254	7200	6	"

Did well dewater? Yes (No)		Gallons actually evacuated: 6	
Sampling Time: ~~0855~~ 0903		Sampling Date: 3/14/02	
Sample I.D.: MW-2		Laboratory: (Kiff) Sequoia Other_____	
Analyzed for: (TPH-G BTEX MTBE) TPH-D	Other:		
EB I.D. (if applicable): @ Time		Duplicate I.D. (if applicable):	
Analyzed for: TPH-G BTEX MTBE TPH-D	Other:		
D.O. (if req'd): Pre-purge:	mg/L	Post-purge:	mg/L
O.R.P. (if req'd): Pre-purge:	mV	Post-purge:	mV

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EQUIVA WELL MONITORING DATA SHEET

BTS #: 020314-DA-1	Site: 540 Heggenberger Rd. Oakland, CA
Sampler: David A.	Date: 3/14/02
Well I.D.: MW-3	Well Diameter: (2) 3 4 6 8
Total Well Depth: 19.46	Depth to Water: 6.25
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: (PVC) Grade	D.O. Meter (if req'd): YSI HACH

Purge Method: X Bailer; Disposable Bailer; Middleburg; Electric Submersible; Waterra; Peristaltic; Extraction Pump; Other_____

Sampling Method: X Bailer; Disposable Bailer; Extraction Port; Dedicated Tubing; Other:

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	4"	0.65
(2")	0.16	6"	1.47
3"	0.37	Other	radius² * 0.163

2.1 (Gals.) X 3 = 6.3 Gals.
1 Case Volume | Specified Volumes | Calculated Volume

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
0933	61.6	7.9	3539	7200	2.5	odor, dark grey
0936	63.8	7.8	9586	7200	2.5	"
0938	64.8	7.6	9302	7200	6.5	"

Did well dewater? Yes (No) Gallons actually evacuated: 6.5

Sampling Time: 0942 Sampling Date: 3/14/02

Sample I.D.: MW-3 Laboratory: (Kiff) Sequoia Other_____

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

EB I.D. (if applicable): @ Time Duplicate I.D. (if applicable):

Analyzed for: TPH-G BTEX MTBE TPH-D Other:

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

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EQUIVA WELL MONITORING DATA SHEET

BTS #: 020314-DA-1	Site: 540 Hegenberger Rd. Oakland, CA
Sampler: David A.	Date: 3/14/02
Well I.D.: MW-4	Well Diameter: 2 3 (4) 6 8 ___
Total Well Depth: 18.53	Depth to Water: 7.57
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: (PVC) Grade	D.O. Meter (if req'd): YSI HACH

Purge Method: Bailer; Disposable Bailer; Middleburg; X Electric Submersible; Waterra; Peristaltic; Extraction Pump; Other ____

Sampling Method: X Bailer; Disposable Bailer; Extraction Port; Dedicated Tubing; Other: ____

7.1 (Gals.) X 3 = 21.3 Gals.
1 Case Volume | Specified Volumes | Calculated Volume

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	(4")	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius² * 0.163

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
0828	61.6	7.9	5186	7200	8	cloudy, tan
0830	63.8	7.8	4993	7200	16	"
0831	63.7	7.7	5217	7200	22	"

Did well dewater? Yes (No) Gallons actually evacuated: 22

Sampling Time: 0835 Sampling Date: 3/14/02

Sample I.D.: MW-4 Laboratory: (Kiff) Sequoia Other ____

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

EB I.D. (if applicable): @ Time Duplicate I.D. (if applicable):

Analyzed for: TPH-G BTEX MTBE TPH-D Other:

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

EQUIVA WELL MONITORING DATA SHEET

BTS #: 020314-DA-1	Site: 540 Hegenberger Rd. Oakland, CA
Sampler: David A.	Date: 3/14/02
Well I.D.: BW-B	Well Diameter: 2 3 (4) 6 8 ___
Total Well Depth: 11.74	Depth to Water: 5.24
Depth to Free Product:	Thickness of Free Product (feet):
Referenced to: (PVC) Grade	D.O. Meter (if req'd): YSI HACH

Purge Method: Bailer; Disposable Bailer; Middleburg; X Electric Submersible; Waterra; Peristaltic; Extraction Pump; Other_____

Sampling Method: X Bailer; Disposable Bailer; Extraction Port; Dedicated Tubing; Other: _____

4.2 (Gals.) X	3	=	12.6 Gals.
1 Case Volume	Specified Volumes		Calculated Volume

Well Diameter	Multiplier	Well Diameter	Multiplier
1"	0.04	(4")	0.65
2"	0.16	6"	1.47
3"	0.37	Other	radius² * 0.163

Time	Temp (°F)	pH	Cond.	Turbidity	Gals. Removed	Observations
0910	62.1	7.8	936	7200	5	cloudy
0911	63.4	7.7	900	7200	10	cloudy
0912	63.9	7.6	893	80	13	clearing

Did well dewater? Yes (No) Gallons actually evacuated: 13

Sampling Time: 0915 Sampling Date: 3/14/02

Sample I.D.: BW-B Laboratory: (Kiff) Sequoia Other_____

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

EB I.D. (if applicable): @ Time Duplicate I.D. (if applicable):

Analyzed for: TPH-G BTEX MTBE TPH-D Other:

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