Tetra Tech EM Inc.

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July 21, 2000

Ms. Michelle Gallice-Sondrup
Department of the Navy
Engineering Field Division Southwest
Naval Facilities Engineering Command
1230 Columbia Street, Suite 1100
San Diego, California 92101

Subject: Interim Product Removal Report, June and July 2000, Event 12
Naval Fuel Depot (NFD) Point Molate, Richmond, California
CLEAN Contract No. N62474-94-D-7609, Contract Task Order (CTO) 112

Dear Ms. Gallice-Sondrup:

Tetra Tech EM Inc. (TtEMI) conducted the twelfth and final product extraction event at NFD Point Molate on June 28 and July 3, 2000, in accordance with the Interim Product Removal Field Work Plan dated September 17, 1999. A table summarizing product removal data to date is provided in Attachment A.

Product was removed in late June and early July 2000 with disposable bailers. Bailers were used because Mr. Tom Robertson of NFD Point Molate, who normally assisted with this task, was laid off when the facility staff was downsized on May 30, 2000. Therefore, he was no longer available to operate the vacuum truck usually used to remove the product. TtEMI is currently evaluating automated product removal technologies, including both enhanced and passive product recovery. Once chosen, these technologies may be applied to locations that demonstrate consistent product occurrence.

Routine product removal was conducted at Treatment Ponds Area monitoring wells PZ11-27A and MW11-28; however, these wells (as well as several other Treatment Ponds Area wells) were abandoned as part of basewide pipeline removal operations in December 1999.

Product thickness in Treatment Ponds Area wells PZ11-31A and MW11-43 remained at 0.0 feet during May (May 26-28) and June (June 21-23) 2000 basewide water level and product thickness measurements, and product removal was not conducted at these wells.

Treatment Ponds Area well MW11-45 has remained inaccessible beneath a soil pile since the Industrial Ecosystems, Inc. (IEI) bioremediation demonstration, and well MW11-49 has remained inaccessible because of pipeline removal activities.

However, other Treatment Ponds Area wells with consistent product occurrence were measured and product was removed at these wells even though they were not included in the routine list of wells. They are summarized as follows with the associated June 2000 product thickness:

Well	Product Thickness
MW11-11	0.03 foot
PZ11-33A	0.24 foot (included in Attachment A summary)
MW11-36	0.42 foot
PZ11-37A	0.66 foot
PZ11-37B	0.51 foot

contains recycled fiber and is recyclable

Waste Disposal Area well ERM-EW1 was abandoned in mid-May 2000 during basewide pipeline removal activities between Valve Boxes 6 and 7, specifically during demolition of Valve Box 7.

Monitoring wells adjacent to the underground storage tanks (UST) have shown consistent or increasing product thickness since previous measurements. These wells and their ranges of measured product thickness in late June and early July 2000 are as follows. These wells are also included in a technology evaluation for product recovery at USTs that is currently being developed by TtEMI.

Well	Product Thickness
MWTB-01	0.10 to 0.14 feet
MWT05-02	0.30 to 0.35 feet
MWT06-02	0.22 to 0.31 feet
MWT08-01	0.15 to 0.30 feet
MWT12-02	0.11 to 0.19 feet
MWT13-02	0.04 to 0.05 feet
MWT15-01	0.00 to 0.23 feet
MWT03-01	0.10 foot
MWT18-01	1.82 to 2.43 feet

Consistent product thickness and product recharge were evident in Tank 18 well MWT18-01, based on June and July 2000 measurements, suggesting that a significant source of free product remains near the base of this tank even though product accumulation in the Tank 18 skim pit has ceased. Enhanced recovery at Tanks 18 and 5 will be the primary focus of the technology evaluation for product recovery at USTs. Data from the monitoring well product removals have been totaled both with and without the Tank 18 skim pit data. These data were totaled separately because the volume of product removed from the monitoring wells is calculated to a higher degree of accuracy than the Tank 18 skim pit volume, which was approximated.

The well MW11-54 product recovery system in Drum Lot No. 1, summarized in Attachment B, was checked for operation and maintenance (O&M) on June 22, 2000 and found to be functioning properly. However, a buildup of product scum was found inside the hydrophobic screen on the floating skimmer and was removed. Also during this time period, the skid-mount product recovery system that was located at south shoreline well MW10-03 was moved to Extraction Trench well EW-B, where consistent product has been accumulating. It will be used for automated recovery of product at extraction well EW-B. Hookup of this system will require coordination with the Site 3 O&M contractor, International Technology, to complete.

If you have any questions, please call me at (303) 312-8834 or David West at (303) 312-8879.

Sincerely,

for

Gary Miller
Project Manager

Attachments

cc: David West, TtEMI
Brian Schuller, TtEMI

ATTACHMENT A

NAVAL FUEL DEPOT POINT MOLATE
BASEWIDE PRODUCT REMOVAL
JUNE/JULY 2000 PRODUCT REMOVAL SUMMARY

Well Name	TOC Elevation	Date Measured	Prior to Product Removal: Depth to Product (feet)	Prior to Product Removal: Depth to Water (feet)	Prior to Product Removal: Water/Product Elevations (feet)	Prior to Product Removal: Product Thickness (feet)	Following Product Removal: Depth to Product (feet)	Following Product Removal: Depth to Water (feet)	Following Product Removal: Water/Product Elevations (feet)	Following Product Removal: Product Thickness (feet)	Volume of Product Removed (gallons)	Product Type and Comments
Treatment Ponds Area Monitoring Wells												
PZ11-27A	16.92	4/99	14.60	15.44	2.32	0.84	Product not removed					Black diesel/bunker fuel
	16.92	8/25/99	15.72	16.58	1.20	0.86		15.95	0.97	0.00	0.14	0.56 feet in Jan. '99
	16.92	9/28/99	16.11	16.78	0.81	0.67	16.18	16.25	0.74	0.07	0.10	
	16.92	11/9/99	14.75	15.30	2.17	0.55	14.80	14.85	2.12	0.05	0.08	
	16.92	12/8/99	14.80	15.23	2.12	0.43	14.85	14.86	2.07	0.01	0.07	
	Well abandoned by IT on 12/20/99 during basewide pipeline removal											
MW11-28	16.57	4/99	12.70	13.19	3.87	0.49	Product not removed					Black diesel/bunker fuel
	16.57	8/25/99	13.89	15.17	2.68	1.28		15.67	0.90	0.00	0.84	0.29 feet in Jan. '99
	16.57	9/28/99	14.30	14.57	2.27	0.27		16.40	0.17	0.00	0.18	
	16.57	11/9/99	13.10	13.11	3.47	0.01		14.13	2.44	0.00	0.01	
	16.57	12/8/99	NP	13.19	3.38	NA		NA		0.00	NA	No product to remove
	Well abandoned by IT on 12/21/99 during basewide pipeline removal											
PZ11-31A	16.97	4/99	13.62	14.90	3.35	1.28	Product not removed					Diesel fuel
	16.97	8/25/99	13.99	15.36	2.98	1.37		16.50	0.47	0.00	0.22	1.35 feet in Jan. '99
	16.97	9/28/99	15.54	15.55	1.43	0.01	15.40	15.41	1.57	0.01	0.00	
	16.97	11/9/99	13.98	14.02	2.99	0.04		14.30	2.67	0.00	0.01	
	16.97	12/8/99	13.98	14.01	2.99	0.03		15.75	1.22	0.00	0.00	
	16.97	1/18/00	12.03	12.06	4.94	0.03		14.80	2.17	0.00	0.00	
	16.97	2/22/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	16.97	3/24/00	12.05	12.06	4.92	0.01	Product not removed					Measured during basewide water levels
	16.97	3/27/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	16.97	4/11/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	16.97	4/17/00	NP	11.06	5.91	0.00						Measured during basewide water levels
	16.97	4/25/00	11.20	11.25	5.77	0.05		13.38	3.59	0.00	0.01	
	16.97	5/9/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	16.97	5/23/00	NM	NM	NA	NA						Well inaccessible due to construction
	16.97	5/27/00	NP	12.26	4.71	0.00						Measured during basewide water levels
	16.97	6/22/00	NP	12.42	4.55	0.00						Measured during basewide water levels

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Well Name	TOC Elevation	Date Measured	Prior to Product Removal: Depth to Product (feet)	Prior to Product Removal: Depth to Water (feet)	Prior to Product Removal: Water/Product Elevations (feet)	Prior to Product Removal: Product Thickness (feet)	Following Product Removal: Depth to Product (feet)	Following Product Removal: Depth to Water (feet)	Following Product Removal: Water/Product Elevations (feet)	Following Product Removal: Product Thickness (feet)	Volume of Product Removed (gallons)	Product Type and Comments
Treatment Ponds Area Monitoring Wells												
PZ11-33A	17.79	4/99	NP	12.04	5.75	0.00	Product not removed					Bunker fuel
	17.79	8/25/99	12.47	12.50	5.32	0.03		dry	dry	0.00	0.00	0.03 feet in Jan. '99
	17.79	9/28/99	12.22	12.62	5.57	0.40		dry	dry	0.00	0.07	
	17.79	11/9/99	12.41	12.42	5.38	0.01		dry	dry	0.00	0.00	
	17.79	12/8/99	12.30	12.40	5.49	0.10	12.38	12.39	5.41	0.01	0.01	
	17.79	1/18/00	9.78	10.15	8.01	0.37		13.02	4.77	0.00	0.06	
	17.79	2/22/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	17.79	3/24/00	11.58	11.59	6.21	0.01	Product not removed					Measured during basewide water levels
	17.79	3/27/00	11.85	11.87	5.94	0.02		14.20	3.59	0.00	0.00	
	17.79	4/11/00	8.90	9.20	8.89	0.30		12.90	4.89	0.00	0.05	
	17.79	4/17/00	10.51	10.57	7.28	0.06	Product not removed					Measured during basewide water levels
	17.79	4/25/00	11.60	11.62	6.19	0.02		12.80	4.99	0.00	0.00	
	17.79	5/9/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	17.79	5/23/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	17.79	5/27/00	12.01	12.29	5.78	0.28	Product not removed					Measured during basewide water levels
	17.79	6/28/00	12.17	12.41	5.62	0.24	12.86	12.87	4.93	0.01	0.05	
MW11-43	22.05	4/99	NP	7.06	14.99	0.00	Product not removed					Fuel type unknown
	22.05	8/25/99	8.92	NM	13.13		8.79	8.82	13.26			2.02 feet in Jan. '99
	22.05	9/28/99	8.92	8.98	13.13	0.06	NM	10.28		NA	NA	
	22.05	11/9/99	NP	8.78	13.27	0.00						
	22.05	12/8/99	NP	7.95	14.10	0.00						
	22.05	1/18/00	NP	6.58	15.47	0.00						
	22.05	2/14/00	NP	5.30	16.75	0.00						
	22.05	2/22/00	NM	NM	NA							Well inaccessible due to construction
	22.05	3/24/00	NP	6.68	15.37	0.00						Measured during basewide water levels
	22.05	3/27/00	NM	NM	NA							Well inaccessible due to construction
	22.05	4/11/00	NM	NM	NA							Well inaccessible due to construction
	22.05	4/17/00	NP	6.29	15.76	0.00						Measured during basewide water levels
	22.05	4/25/00	NP	6.50	15.55	0.00						
	22.05	5/9/00	NM	NM	NA							Well inaccessible due to construction
	22.05	5/23/00	NM	NM	NA							Well inaccessible due to construction
	22.05	5/27/00	NP	6.63	15.42	0.00						Measured during basewide water levels
	22.05	6/22/00	NP	6.76	15.29	0.00						Measured during basewide water levels

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Treatment Ponds Area Monitoring Wells												
MW11-45	19.85	4/99	4.87	5.02	14.98	0.15	Product not removed					Possibly diesel fuel
	19.85	8/25/99	5.89	6.05	13.96	0.16		6.46	13.39	0.00	0.10	0.3 feet in Jan. '99
	19.85	9/28/99	6.24	6.25	13.61	0.01		6.97	12.88	0.00	0.01	
	19.85	11/9/99	7.15	7.24	12.70	0.09		8.53	11.32	0.00	0.06	
	19.85	12/8/99	6.81	6.82	13.04	0.01		7.80	12.05	0.00	0.01	
	19.85	1/18/00	6.76	6.78	13.09	0.02	Product not removed			NA	NA	Measured during basewide water levels
	19.85	2/22/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	3/27/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	4/11/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	4/17/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	4/25/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	5/9/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	5/23/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	5/27/00	NM	NM	NA	NA					NA	Well covered by soil pile
	19.85	6/22/00	NM	NM	NA	NA					NA	Well covered by soil pile
MW11-49	20.98	4/99	NP	3.10	17.88	0.00	Product not removed					Bunker fuel
	20.98	8/25/99	2.79	2.80	18.19	0.01		2.81	18.17	0.00	0.01	0.03 feet in Jan. '99
	20.98	9/28/99	3.65	3.67	17.33	0.02	4.72	4.73	16.26	0.01	0.01	
	20.98	11/9/99	3.37	3.40	17.61	0.03	3.90	3.91	17.08	0.01	0.01	
	20.98	12/8/99	3.44	3.45	17.54	0.01		3.63	17.35	0.00	0.01	
	20.98	1/18/00	NM	NM	NM	NA				NA	NA	Well inaccessible due to construction
	20.98	2/14/00	NP	2.42	18.56	0.00					NA	Measured during basewide water levels
	20.98	2/22/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	20.98	3/27/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	20.98	4/11/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	20.98	4/17/00	2.889	2.89	18.09	0.001	Product not removed				NA	Measured during basewide water levels
	20.98	4/25/00	NM	NM	NA	NA					NA	
	20.98	5/9/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	20.98	5/23/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	20.98	5/27/00	NP	3.16	17.82	0.00					NA	
	20.98	6/22/00	NM	NM	NA	NA					NA	Well cover destroyed during construction

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Treatment Ponds Area Monitoring Wells												
MW11-54	17.42	3/16/00	10.07	16.68	7.35	6.61	Product not removed					Recovery system shut down since Dec. 99
	17.42	3/24/00	11.54	15.43	5.88	3.89	Product not removed					Recovery system shut down since Dec. 99
	17.42	3/28/00	10.56	15.69	6.86	5.13	Product bailed by hand				12	Bailed by hand
	17.42	4/17/00	12.77	12.80	4.65	0.03	Product removed via product recovery system					Measured during basewide water levels
	17.42	5/27/00	13.11	13.12	4.31	0.01	Product removed via product recovery system					Measured during basewide water levels
	17.42	6/19/00	13.03	13.04	4.39	0.005	Product removed via product recovery system					Measured during O&M of system
	17.42	6/22/00	13.16	13.20	4.28	0.04	Product removed via product recovery system					Measured during basewide water levels
Waste Disposal Area Monitoring Wells												
ERM-EW1	106.29	8/6/99	14.54	15.00	91.75	0.46	Product not removed					Diesel fuel/JP-5
	106.29	8/25/99	16.37	16.99	89.92	0.62	18.44	18.45	87.85	0.01	0.40	0.69 feet in April '99
	106.29	9/28/99	18.15	18.53	88.14	0.38	20.19	20.22	86.10	0.03	0.23	
	106.29	11/4/99	19.17	19.35	87.12	0.18		21.64	84.65	0.00	0.12	
	106.29	12/8/99	17.98	18.35	88.31	0.37		19.00	87.29	0.00	0.24	
	106.29	1/18/00	14.49	15.07	91.80	0.58		16.12	90.17	0.00	0.38	
	106.29	2/22/00	3.97	3.98	102.32	0.01		4.55	101.74	0.00	0.01	
	106.29	3/23/00	5.27	5.275	101.02	0.005	Product not removed					Measured during basewide water levels
	106.29	3/27/00	6.75	6.80	99.54	0.05		7.85	98.44	0.00	0.03	
	106.29	4/11/00	8.02	8.03	98.27	0.01	8.51	8.52	97.78	0.01	0.00	
	106.29	4/18/00	8.62	8.63	97.67	0.01	Product not removed					Measured during basewide water levels
	106.29	5/9/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	106.29	5/23/00	NM	NM	NA	NA					NA	Well inaccessible due to construction
	Well abandoned by I.T. during pipeline and Valve Box 7 removal (May 2000)											
UST Monitoring Wells												
MWTB-01	68.66	8/6/99	22.94	23.22	45.72	0.28	Product not removed					Bunker fuel
	68.66	8/25/99	23.07	23.44	45.59	0.37		24.71	43.95	0.00	0.24	No product in April '99
	68.66	9/28/99	23.56	23.80	45.10	0.24		24.77	43.89	0.00	0.16	
	68.66	11/9/99	24.53	24.71	44.13	0.18		28.14	40.52	0.00	0.12	
	68.66	12/8/99	24.62	24.63	44.04	0.01		25.78	42.88	0.00	0.01	
	68.66	1/18/00	24.76	24.77	43.90	0.01		26.45	42.21	0.00	0.01	
	68.66	2/22/00	21.12	21.13	47.54	0.01		22.04	46.62	0.00	0.01	
	68.66	3/23/00	20.965	20.97	47.70	0.005	Product not removed					Measured during basewide water levels
	68.66	3/27/00	21.23	21.39	47.43	0.16	24.06	24.10	44.60	0.04	0.08	
	68.66	4/11/00	21.80	22.30	46.86	0.50		24.30	44.36	0.00	0.33	
	68.66	4/18/00	NP	20.82	47.84	0.00						Measured during basewide water levels
	68.66	4/25/00	22.90	22.91	45.76	0.01	Product not removed					
	68.66	5/9/00	23.44	23.45	45.22	0.01		26.45	42.21	0.00	0.01	
	68.66	5/23/00	22.73	22.75	45.93	0.02		23.85	44.81	0.00	0.01	
	68.66	5/28/00	22.48	22.49	46.18	0.01	Product not removed					Measured during basewide water levels
	68.66	6/23/00	23.89	24.03	44.77	0.14	Product not removed					Measured during basewide water levels
	68.66	6/28/00	23.95	24.05	44.71	0.10	24.69	24.70	43.97	0.01	0.50	

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UST Monitoring Wells												
MWT05-02	213.55	8/6/99	26.16	26.17	187.39	0.01	Product not removed					JP-5 (diesel)
	213.55	8/25/99	26.21	26.42	187.34	0.21		27.58	185.97	0.00	0.14	
	213.55	9/28/99	26.33	27.42	187.22	1.09		30.82	182.73	0.00	0.71	
	213.55	11/4/99	26.50	31.08	187.05	4.58	32.14	32.18	181.41	0.04	2.96	
	213.55	12/8/99	25.95	26.28	187.60	0.33	26.95	26.97	186.60	0.02	0.20	
	213.55	1/18/00	25.77	25.97	187.78	0.20	25.82	25.83	187.73	0.01	0.12	
	213.55	2/22/00	25.66	25.89	187.89	0.23		26.65	186.90	0.00	0.15	
	213.55	3/23/00	25.81	26.30	187.74	0.49	Product not removed					Measured during basewide water levels
	213.55	3/27/00	25.85	26.14	187.70	0.29		27.35	186.20	0.00	0.19	
	213.55	4/11/00	25.89	26.05	187.66	0.16		28.90	184.65	0.00	0.10	
	213.55	4/18/00	25.85	26.13	187.70	0.28	Product not removed					Measured during basewide water levels
	213.55	4/25/00	25.83	26.10	187.72	0.27		28.81	184.74	0.00	0.18	
	213.55	5/9/00	25.90	26.13	187.65	0.23		28.18	185.37	0.00	0.15	
	213.55	5/23/00	25.91	26.20	187.64	0.29		27.10	186.45	0.00	0.19	
	213.55	5/26/00	26.04	26.26	187.51	0.22	Product not removed					Measured during basewide water levels
	213.55	6/23/00	26.00	26.32	187.55	0.32	Product not removed					Measured during basewide water levels
	213.55	7/3/00	26.00	26.35	187.55	0.35	27.46	27.49	186.09	0.03	1.5	Volume removed is approximate
	213.55	7/13/00	26.04	26.34	187.51	0.30	Product not removed					Measured for technology evaluation product recovery
MWT06-02	159.92	8/6/99	25.85	26.21	134.07	0.36	Product not removed					JP-5 (diesel)
	159.92	8/25/99	25.86	26.24	134.06	0.38		27.49	132.43	0.00	0.25	
	159.92	9/28/99	25.97	26.25	133.95	0.28		28.55	131.37	0.00	0.18	
	159.92	11/4/99	26.01	26.28	133.91	0.27	27.28	27.29	132.64	0.01	0.17	
	159.92	12/8/99	25.70	26.07	134.22	0.37		28.63	131.29	0.00	0.24	
	159.92	1/18/00	25.03	25.27	134.89	0.24	25.82	25.83	134.10	0.01	0.15	
	159.92	2/22/00	25.27	25.48	134.65	0.21		28.80	131.12	0.00	0.14	
	159.92	3/23/00	25.57	25.80	134.35	0.23	Product not removed					Measured during basewide water levels
	159.92	3/27/00	25.54	25.72	134.38	0.18		27.40	132.52	0.00	0.12	
	159.92	4/11/00	25.75	25.86	134.17	0.11	28.20	28.21	131.72	0.01	0.07	
	159.92	4/18/00	25.39	25.56	134.53	0.17	Product not removed					Measured during basewide water levels
	159.92	4/25/00	25.83	26.10	134.09	0.27		28.81	131.11	0.00	0.18	
	159.92	5/9/00	25.66	25.72	134.26	0.06	29.36	29.37	130.56	0.01	0.03	
	159.92	5/23/00	25.71	25.88	134.21	0.17		28.55	131.37	0.00	0.11	
	159.92	5/26/00	25.75	25.86	134.17	0.11	Product not removed					Measured during basewide water levels
	159.92	6/23/00	25.70	25.92	134.22	0.22	Product not removed					Measured during basewide water levels
	159.92	7/3/00	25.70	25.95	134.22	0.25	26.71	26.73	133.21	0.02	1.5	Volume removed is approximate
	159.92	7/13/00	25.80	26.11	134.12	0.31	Product not removed					Measured for technology evaluation product recovery

NAVAL FUEL DEPOT POINT MOLATE
BASEWIDE PRODUCT REMOVAL
JUNE/JULY 2000 PRODUCT REMOVAL SUMMARY

Well Name	TOC Elevation	Date Measured	Prior to Product Removal: Depth to Product (feet)	Prior to Product Removal: Depth to Water (feet)	Prior to Product Removal: Water/Product Elevations (feet)	Prior to Product Removal: Product Thickness (feet)	Following Product Removal: Depth to Product (feet)	Following Product Removal: Depth to Water (feet)	Following Product Removal: Water/Product Elevations (feet)	Following Product Removal: Product Thickness (feet)	Volume of Product Removed (gallons)	Product Type and Comments
UST Monitoring Wells												
MWT08-01	188.78	8/6/99	23.45	23.49	165.33	0.04	Product not removed					JP-5 (diesel)
	188.78	8/25/99	23.43	23.50	165.35	0.07	24.64	24.70	164.14	0.06	0.01	
	188.78	9/28/99	23.50	23.70	165.28	0.20		dry	dry	0.00	0.13	
	188.78	11/4/99	23.51	23.81	165.27	0.30		dry	dry	0.00	0.20	
	188.78	12/8/99	23.46	23.50	165.32	0.04		24.90	163.88	0.00	0.03	
	188.78	1/18/00	NP	20.95	167.83	0.00						
	188.78	2/22/00	NP	22.54	166.24	0.00						
	188.78	3/23/00	23.25	23.26	165.53	0.01	Product not removed					Measured during basewide water levels
	188.78	3/27/00	23.29	23.34	165.49	0.05		24.82	163.96	0.00	0.03	
	188.78	4/11/00	23.40	23.45	165.38	0.05	24.96	24.98	163.82	0.02	0.02	
	188.78	4/18/00	22.84	22.86	165.94	0.02	Product not removed					Measured during basewide water levels
	188.78	5/9/00	23.35	23.37	165.43	0.02	23.31	23.32	165.47	0.01	0.01	
	188.78	5/23/00	23.40	23.42	165.38	0.02	24.90	24.91	163.88	0.01	0.01	
	188.78	5/26/00	23.05	23.055	165.73	0.005	Product not removed					Measured during basewide water levels
	188.78	6/23/00	23.44	23.59	165.34	0.15	Product not removed					Measured during basewide water levels
	188.78	7/3/00	23.44	23.62	165.34	0.18	24.78	24.81	164.00	0.03	0.12	
	188.78	7/13/00	23.43	23.73	165.35	0.30	Product not removed					Measured for technology evaluation product recovery
MWT12-02	313.05	8/6/99	31.53	31.75	281.52	0.22	Product not removed					Diesel
	313.05	8/25/99	31.84	32.07	281.21	0.23		dry	dry	0.00	0.15	
	313.05	9/28/99	32.16	none	280.89	NA		dry	dry	0.00	NA	
	313.05	11/4/99	NP	dry	NA	0.00						
	313.05	12/8/99	NP	30.46	282.59	0.00						
	313.05	1/18/00	NP	30.62	282.43	0.00						
	313.05	2/22/00	NP	26.88	286.17	0.00						
	313.05	3/23/00	28.865	28.870	284.19	0.005	Product not removed					Measured during basewide water levels
	313.05	3/27/00	NP	29.27	283.78	0.00						
	313.05	4/11/00	30.02	30.04	283.03	0.02		30.50	282.55	0.00	0.01	
	313.05	7/3/00	27.655	27.66	285.40	0.005	Product not removed					Measured during basewide water levels
	313.05	5/9/00	28.97	29.00	284.08	0.03		30.25	282.80	0.00	0.02	
	313.05	5/23/00	29.14	29.17	283.91	0.03		30.45	282.60	0.00	0.02	
	313.05	5/26/00	29.47	29.49	283.58	0.02	Product not removed					Measured during basewide water levels
	313.05	6/23/00	30.44	30.55	282.61	0.11	Product not removed					Measured during basewide water levels
	313.05	7/3/00	30.64	30.76	282.41	0.12	30.72	30.73	282.33	0.01	0.5	Product/Water mix
	313.05	7/13/00	30.81	31.00	282.24	0.19	Product not removed					Measured for technology evaluation product recovery

NAVAL FUEL DEPOT POINT MOLATE
BASEWIDE PRODUCT REMOVAL
JUNE/JULY 2000 PRODUCT REMOVAL SUMMARY

Well Name	TOC Elevation	Date Measured	Prior to Product Removal: Depth to Product (feet)	Prior to Product Removal: Depth to Water (feet)	Prior to Product Removal: Water/Product Elevations (feet)	Prior to Product Removal: Product Thickness (feet)	Following Product Removal: Depth to Product (feet)	Following Product Removal: Depth to Water (feet)	Following Product Removal: Water/Product Elevations (feet)	Following Product Removal: Product Thickness (feet)	Volume of Product Removed (gallons)	Product Type and Comments
USTI Monitoring Wells												
MWT13-02	399.72	8/6/99	32.05	32.55	367.67	0.50	Product not removed					JP-5 (diesel)
	399.72	8/25/99	32.15	32.68	367.57	0.53		33.62	366.10	0.00	0.35	
	399.72	9/28/99	32.34	32.83	367.38	0.49		34.35	365.37	0.00	0.32	
	399.72	11/4/99	32.59	33.04	367.13	0.45		35.71	364.01	0.00	0.29	
	399.72	12/8/99	32.73	33.05	366.99	0.32		33.80	365.92	0.00	0.21	
	399.72	1/18/00	32.63	32.65	367.09	0.02		35.88	363.84	0.00	0.01	
	399.72	2/22/00	29.04	29.07	370.68	0.03		29.02	370.70	0.00	0.02	
	399.72	3/23/00	29.59	30.25	370.13	0.66	Product not removed					Measured during basewide water levels
	399.72	3/27/00	29.81	30.45	369.91	0.64	30.70	30.72	369.02	0.02	0.40	
	399.72	4/11/00	30.92	31.69	368.80	0.77	31.14	31.15	368.58	0.01	0.50	
	399.72	4/18/00	31.04	31.24	368.68	0.20	Product not removed					Measured during basewide water levels
	399.72	4/25/00	31.28	31.76	368.44	0.48	31.50	31.51	368.22	0.01	0.31	
	399.72	5/9/00	31.70	31.78	368.02	0.08		31.80	367.92	0.00	0.05	
	399.72	5/23/00	32.08	32.09	367.64	0.01	Product not removed due to time constraints					
	399.72	5/26/00	31.88	31.89	367.84	0.01	Product not removed					Measured during basewide water levels
	399.72	6/23/00	31.95	31.99	367.77	0.04	Product not removed					Measured during basewide water levels
	399.72	7/13/00	32.03	32.08	367.69	0.05	Product not removed					Measured for technology evaluation product recovery
MWT15-01	276.25	8/6/99	26.40	26.97	249.85	0.57	Product not removed					Diesel
	276.25	8/25/99	27.70	28.29	248.55	0.59		29.52	246.73	0.00	0.38	
	276.25	9/28/99	29.15	29.55	247.10	0.40	31.58	31.59	244.67	0.01	0.25	
	276.25	11/4/99	29.13	29.14	247.12	0.01		30.92	245.33	0.00	0.01	
	276.25	12/8/99	NP	24.48	251.77	0.00						
	276.25	1/18/00	NP	23.82	252.43	0.00						
	276.25	2/22/00	21.94	21.95	254.31	0.01		22.01	254.24	0.00	0.01	
	276.25	3/23/00	23.19	23.20	253.06	0.01	Product not removed					Measured during basewide water levels
	276.25	3/27/00	23.66	23.68	252.59	0.02		24.85	251.40	0.00	0.01	
	276.25	4/11/00	NP	24.15	252.10	0.00						
	276.25	4/18/00	NP	22.91	253.34	0.00						Measured during basewide water levels
	276.25	5/23/00	24.03	24.05	252.22	0.02		24.55	251.70	0.00	0.01	
	276.25	5/26/00	NP	24.28	251.97	0.00						Measured during basewide water levels
	276.25	6/21/00	NP	24.95	251.30	0.00						Measured during basewide water levels
	276.25	7/13/00	25.47	25.70	250.78	0.23	Product not removed					Measured for technology evaluation product recovery

NAVAL FUEL DEPOT POINT MOLATE
BASEWIDE PRODUCT REMOVAL
JUNE/JULY 2000 PRODUCT REMOVAL SUMMARY

Well Name	TOC Elevation	Date Measured	Prior to Product Removal				Following Product Removal				Volume of Product Removed (gallons)	Product Type and Comments
			Depth to Product (feet)	Depth to Water (feet)	Water/Product Elevations (feet)	Product Thickness (feet)	Depth to Product (feet)	Depth to Water (feet)	Water/Product Elevations (feet)	Product Thickness (feet)		
UST Monitoring Wells												
MWT03-01	136.99	11/9/99	23.20	23.47	113.79	0.27	23.65	23.70	113.34	0.05	0.14	
	136.99	12/8/99	23.12	23.27	113.87	0.15		23.95	113.04	0.00	0.10	
	136.99	1/18/00	23.02	23.12	113.97	0.10	22.92	22.93	114.07	0.01	0.06	
	136.99	2/22/00	22.05	22.06	114.94	0.01		22.10	114.89	0.00	0.01	
	136.99	3/24/00	NP	22.37	114.62	0.00						Measured during basewide water levels
	136.99	3/27/00	22.32	22.34	114.67	0.02	22.61	22.62	114.38	0.01	0.01	
	136.99	4/11/00	22.67	22.82	114.32	0.15		22.88	114.11	0.00	0.10	
	136.99	4/18/00	NP	22.52	114.47	0.00						Measured during basewide water levels
	136.99	4/25/00	22.80	22.85	114.19	0.05		23.90	113.09	0.00	0.03	
	136.99	5/9/00	23.02	23.16	113.97	0.14		23.32	113.67	0.00	0.09	
	136.99	5/23/00	23.06	23.16	113.93	0.10		23.80	113.19	0.00	0.07	
	136.99	5/26/00	23.09	23.14	113.90	0.05	Product not removed					Measured during basewide water levels
	136.99	6/23/00	23.08	23.18	113.91	0.10	Product not removed					Measured during basewide water levels
	136.99	7/13/00	23.12	23.22	113.87	0.10	Product not removed					Measured for technology evaluation product recovery
MWT18-01	174.40	2/14/00	20.93	24.66	153.47	3.73	Product not removed					Measured during basewide water levels
	174.40	2/15/00	21.60	24.76	152.80	3.16	Product not removed					Measured during basewide water levels
	174.40	2/22/00	21.75	24.60	152.65	2.85		23.77	150.63	0.00	1.86	Added to routine product removal list
	174.40	3/6/00	21.79	23.16	152.61	1.37	Product not removed					Checked prior to prod. removal at Tank 18 skim pit
	174.40	3/23/00	22.64	23.54	151.76	0.90	Product not removed					Measured during basewide water levels
	174.40	3/27/00	22.86	23.78	151.54	0.92		24.65	149.75	0.00	0.60	
	174.40	3/23/00	23.06	23.67	151.34	0.61	Product not removed					
	174.40	4/11/00	23.40	23.98	151.00	0.58		24.05	150.35	0.00	0.38	
	174.40	4/18/00	32.03	32.67	142.37	0.64	Product not removed					Measured during basewide water levels
	174.40	4/25/00	23.62	24.51	150.78	0.89	24.95	24.98	149.45	0.03	0.56	
	174.40	5/9/00	24.09	25.30	150.31	1.21	24.95	25.50	149.45	0.55	0.43	
	174.40	5/23/00	24.03	24.52	150.37	0.49	25.05	25.51	149.35	0.46	0.02	
	174.40	5/26/00	24.24	25.41	150.16	1.17	Product not removed					Measured during basewide water levels
	174.40	6/19/00	24.67	27.03	149.73	2.36	Product not removed					Measured for product removal evaluation
	174.40	6/21/00	24.72	27.15	149.68	2.43	Product not removed					Measured during basewide water levels
	174.40	6/28/00	24.85	26.67	149.55	1.82	25.26	26.28	149.14	1.02	1	Product recharging during removal
	174.40	7/13/00	25.01	26.95	149.39	1.94	Product not removed					Measured for technology evaluation product recovery

NAVAL FUEL DEPOT POINT MOLATE
BASEWIDE PRODUCT REMOVAL
JUNE/JULY 2000 PRODUCT REMOVAL SUMMARY

Well Name	TOC Elevation	Date Measured	Prior to Product Removal: Depth to Product (feet)	Depth to Water (feet)	Water/Product Elevations (feet)	Product Thickness (feet)	Following Product Removal: Depth to Product (feet)	Depth to Water (feet)	Water/Product Elevations (feet)	Product Thickness (feet)	Volume of Product Removed (gallons)	Product Type and Comments
UST Monitoring Wells												
Tank 18 Skim Pit		2/20/00	25.2	30.96		5.76	Product not removed					Skim pit product volume = 2,447 gallons
		3/6/00	24.81	28.3		3.49	Product not removed					Skim pit product volume = 1,487 gallons
		3/8/00					Product removed				~2100	Product pumped to on-site Baker tank
		3/17/00	25.78	26.45		0.67	Product not removed					Skim pit product volume = 285 gallons
		3/21/00					Product removed				~300	Product pumped to on-site Baker tank
		3/23/00	24.96	25.22		0.26	Product not removed					Vol. = 110 gallons; Baker tank has 2,400 gallons
		3/28/00	25.74	26.2		0.46	Product not removed					Skim pit product volume = 195 gallons
		4/4/00	26.15	26.9		0.75	Product not removed					Skim pit product volume = 318 gallons
		4/18/00	25.76	26.70		0.94	Product not removed					Skim pit product volume = 400 gallons
		4/25/00					Product removed				~400	Product pumped to on-site Baker tank
		5/26/00	30.97	30.99		0.02	Product not removed					Skim pit product volume = 8 gallons
		6/22/00				0	Tank 18 being cleaned by CKY; tank contents being pumped into skim pit and removed					

Total Product Removed To Date (not including Tank 18 skim pit)	36.54
Total Product Removed To Date (including Tank 18 skim pit)	~2836

Notes: Elevations are referenced to top of water or top of product (if present).
Volume calculated by subtracting the volume of free product in well casing after product extraction from the volume of product in the well casing before product extraction.

NA Not available UST Underground Storage Tank
NM Not measured TOC Top of casing
NP No product

ATTACHMENT B

ATTACHMENT B

NAVAL FUEL DEPOT POINT MOLATE
SITE 4 OPERATION AND MAINTENANCE
MW11-54 AND SKID-MOUNT PRODUCT RECOVERY SYSTEMS LOG (2000)

MW11-54 RECOVERY SYSTEM (500 GAL. CAPACITY)					MW10-03 RECOVERY SYSTEM (280 GAL. CAPACITY)				
Date	Time	Run Time (Hours)	Qty. Recov.[2] (Gallons)	Comments (Cycling frequency, tank level, etc.)	Date	Time	Run Time (Hours)	Qty. Recov.[2] (Gallons)	Comments (Cycling frequency, tank level, etc.)
2000 READINGS									
1/21/00	1430	179.1	~36	J. DeAngelis; shut down for pipeline removal	1/21/00	1430	380.9		J. DeAngelis; shut down for pipeline removal
3/16/00		179.1		Product thickness checked at specific Site 3/4 wells; PT=6.61'					
3/24/00		179.1		Product thickness checked during base-wide measurements; PT=3.89'					
3/28/00		179.1		Product thickness checked during monthly product removal; PT=5.13'					
			~48	12 gallons product bailed by hand.					
4/13/00		179.1		System is rewired by IT and operational	4/13/00				System shut down and to be moved to new location
4/18/00	1637	181.4		System running: checked by Joel Bauman during basewide water levels	4/18/00				System shut down and to be moved to new location
4/26/00	1500	183.41		Checked by Roy Glenn during construction oversight: 181.4 + 2 = 183.4	4/26/00				System shut down and to be moved to new location
				(0.25 hr/day x 8 days = 2 hrs)					
6/19/00	1545	188.2		System inactive, shut down again by I.T. (David West)	6/19/00	1400	380.9	3.7	System shut down and to be moved to EW-B; actual
									product volume measured inside tank (0.04 feet = 3.7 gallons)
6/22/00	1155	188.2		System reactivated (Steve Kelsoe and David West); system checked for	6/22/00	1300	380.9	3.7	System moved to EW-B; Steve Kelsoe to hook up electrical
				operation - hydrophobic screen was packed with product skum and					from EW-B to skid mount control panel and attach 3/8"
				removed; vacuum checked OK; MW11-54 product thickness was 0.03'					copper drop tube to fixed level within well EW-B.

Notes: 1. Quantity recovered can be determined by measuring height of fuel and water in tank (in feet) times tank inside length times tank inside width times 7.48 gallons/cubic foot;
MW11-54 dimensions: 6.67' (L) X 3.28' (W) X 3.05' (H); MW10-03 dimensions: 4.95' (L) X 2.5' (W) X 3.0' (H)
2. Quantity recovered includes product and water