

**WEEKLY PROGRESS UPDATE
FOR JUNE 21-JUNE 25, 1999**

**EPA REGION I ADMINISTRATIVE ORDER SDWA I-97-1019
MASSACHUSETTS MILITARY RESERVATION
TRAINING RANGE AND IMPACT AREA**

The following summary of progress is for the period for June 21 to June 25, 1999.

1. SUMMARY OF ACTIONS TAKEN

No drilling was completed during this reporting period. Samples collected during the reporting period are summarized in Table 1. Groundwater samples were collected from three wells located at the PAVE PAWS station, including one monitoring and two water supply wells. Profile samples were collected from three IRP drive point borings (DP-4, DP-8, and DP-9) in the Raccoon Lane Investigation.

The Guard, EPA, and MADEP had a meeting on June 24 to discuss technical issues, including the following:

- A letter from Ogden to EPA and MADEP was provided that proposes locations of far field monitoring wells for the Bourne water supply wells. Also, a letter from the Guard to EPA was provided that describes the current schedule for identification and installation of far field monitoring wells.
- A memo received from Dave Hill regarding LF-1 explosive data was handed out and discussed. The memo indicates that RDX was confirmed in well 27MW0108A. EPA will follow up with AFCEE.
- There was a discussion of the Phase IIa results and future investigations of RDX detections in groundwater. Ogden provided a map of the Phase I detections and particle tracks, with the Phase IIa detections sketched on in cross-section view. It was agreed that delineation of the widths of the source areas may provide the most cost-effective initial approach, since this involves drilling at shallower depths. Once the source areas have been delineated, deeper wells can be installed downgradient with a greater chance for successful delineation of extent. A major factor will be whether the faster and cheaper direct push drilling technologies can achieve the required depths of investigation in the source areas. This may not be known for several more weeks, as demonstrations by drilling vendors are completed.

Ogden will prepare an outline of the investigation approach for the source areas of MW-26/59, MW-1/38, and MW-23/43 by 7/19/99. This will include maps with Phase IIa results (similar to the handout) and proposed locations of wells. For the MW-26/59 area the outline will include proposed soil sampling. The outline will also include a schedule that takes into account available funding.

- A handout was provided summarizing schedule and funding status for major activities in a horizontal bar chart, updated from April. Current funding is at \$8.0M and no additional funding is expected to be available before the end of the fiscal year (9/30). Current funded activities include Far Field Group 2 wells (five clusters), ongoing meetings, KD Range groundwater sampling, and Demo Area 1 groundwater investigation (partially funded). Activities scheduled to be funded and start in FY 99/00 include additional rounds of groundwater sampling, gun/mortar position soil and groundwater sampling, artillery and mortar targets soil sampling, completion of Demo Area 1 groundwater investigation, additional Far Field Group 2 wells, fate and transport modeling, and investigations of new areas (Phase IIa and IIb).

- The format for presentation of validated data from Round 2 of groundwater sampling was discussed. Ogden will begin preparing concentration box maps similar to Phase I but using the "areas" identified in February, and if possible showing both rounds of detections.
- The schedule for drilling was discussed: MW-63 will begin the week of 6/28, and MW-60 (KD Range) will begin the week of 7/12.
- Additional investigation of the NG detections in the J-3 Wetland was discussed. Ogden will check with Camp Good News regarding access to the wetland area for additional sediment samples. An expert for evaluation of wetland plant condition will be identified for approval by EPA.
- An update was provided on the Raccoon Lane investigation. Ogden has received split samples for drive point 8 and is working with AFCEE to obtain the remaining splits.
- The schedule for results for non-explosive analytes in KD/U Range soil samples was discussed. Ogden expects to have these for next week's (7/1/99) technical meeting. It was agreed to use the non-validated results for any decisions regarding well locations.
- The schedule for sampling on-site water supply wells was discussed. Ogden will determine if the Textron supply wells can be sampled in the next two weeks. If so, all supply wells will be sampled together. If not, all but the Textron wells will be sampled together and the Textron wells will be sampled ASAP.
- The Guard asked for EPA comments on the draft PEP Analytical Report. EPA indicated these are underway.

2. SUMMARY OF DATA RECEIVED

New detections of explosives are summarized in Table 2 for the non-validated data received during the reporting period. Several explosive compounds were identified in groundwater at 90LWA0007, which is located in the FS-12 area. HMX was detected in groundwater at MW-30, located at the J-3 Range. HMX and RDX were detected in several deep soil samples from Demo Area 1. Photo Diode Array (PDA) spectra have not yet been evaluated to confirm the new detections.

Detections of other compounds are being reported in the monthly progress reports and updates for the Impact Area Review Team (IART).

3. DELIVERABLES SUBMITTED

Deliverables submitted during the reporting period include the following:

Weekly Progress Report (June 14 – June 18)

June 22, 1999

4. SCHEDULED ACTIONS

Scheduled actions for the week of June 28 include commence drilling of MW-63, complete the UXO clearance of the drilling locations at the KD Range, and collect additional split samples from the Raccoon Lane Investigation.

TABLE 1
 SAMPLING PROGRESS
 6/21-6/25

OGDEN_ID	LOCID OR WELL ID	DATE SAMPLED	SAMPLE TYPE	SBD	SED
OT-Y011009	FIELDQC	6/25/1999	FIELDQC	0	0
OT-Y012301	FIELDQC	6/23/1999	FIELDQC	0	0
OT-Y012901	FIELDQC	6/25/1999	FIELDQC	0	0
OT-Y012901F	FIELDQC	6/25/1999	FIELDQC	0	0
PPAWSMW-1E	FIELDQC	6/22/1999	FIELDQC	0	0
PPAWSMW-1T	FIELDQC	6/22/1999	FIELDQC	0	0
PPAWSMW-1	PPAWSMW-1	6/22/1999	GROUNDWATER	10	20
PPAWSPW-1	PPAWSPW-1	6/22/1999	GROUNDWATER	158	178
PPAWSPW-2	PPAWSPW-2	6/22/1999	GROUNDWATER	85	105
OT-Y010501	OT-Y010501	6/23/1999	PROFILE	5	10
OT-Y010501F	OT-Y010501F	6/24/1999	PROFILE	5	10
OT-Y010507	OT-Y010507	6/23/1999	PROFILE	15	20
OT-Y010507F	OT-Y010507F	6/23/1999	PROFILE	15	20
OT-Y010603	OT-Y010603	6/23/1999	PROFILE	25	30
OT-Y010603F	OT-Y010603F	6/23/1999	PROFILE	25	30
OT-Y010607	OT-Y010607	6/23/1999	PROFILE	35	40
OT-Y010607F	OT-Y010607F	6/23/1999	PROFILE	35	40
OT-Y010705	OT-Y010705	6/23/1999	PROFILE	45	50
OT-Y010705F	OT-Y010705F	6/23/1999	PROFILE	45	50
OT-Y010801	OT-Y010801	6/23/1999	PROFILE	55	60
OT-Y010801F	OT-Y010801F	6/23/1999	PROFILE	55	60
OT-Y010805	OT-Y010805	6/23/1999	PROFILE	65	70
OT-Y010805F	OT-Y010805F	6/23/1999	PROFILE	65	70
OT-Y010901	OT-Y010901	6/23/1999	PROFILE	75	80
OT-Y010905	OT-Y010905	6/23/1999	PROFILE	85	90
OT-Y010909	OT-Y010909	6/23/1999	PROFILE	95	100
OT-Y011001	OT-Y011001	6/25/1999	PROFILE	35	40
OT-Y011007	OT-Y011007	6/25/1999	PROFILE	45	50
OT-Y011103	OT-Y011103	6/25/1999	PROFILE	55	60
OT-Y011107	OT-Y011107	6/25/1999	PROFILE	65	70
OT-Y011205	OT-Y011205	6/25/1999	PROFILE	75	80
OT-Y011205F	OT-Y011205F	6/25/1999	PROFILE	75	80
OT-Y011301	OT-Y011301	6/25/1999	PROFILE	85	90
OT-Y011301D	OT-Y011301D	6/25/1999	PROFILE	85	90
OT-Y011301DF	OT-Y011301DF	6/25/1999	PROFILE	85	90
OT-Y011301F	OT-Y011301F	6/25/1999	PROFILE	85	90
OT-Y011305	OT-Y011305	6/25/1999	PROFILE	95	100
OT-Y011305F	OT-Y011305F	6/25/1999	PROFILE	95	100
OT-Y011501	OT-Y011501	6/25/1999	PROFILE	10	15
OT-Y011501F	OT-Y011501F	6/25/1999	PROFILE	10	15

Profiling methods include: Volatiles and Explosives

Groundwater methods include: Volatiles, Semivolatiles, Explosives, Pesticides, Herbicides, Metals, and Wet Chemistry

Other Sample Types methods are variable

SBD = Sample Begin Depth, measured in feet bgs for profile and soil boring, and feet below water table for groundwater

SED = Sample End Depth, measured in feet bgs for profile and soil boring, and feet below water table for groundwater

TABLE 1
 SAMPLING PROGRESS
 6/21-6/25

OGDEN_ID	LOCID OR WELL ID	DATE SAMPLED	SAMPLE TYPE	SBD	SED
OT-Y011507	OT-Y011507	6/25/1999	PROFILE	20	25
OT-Y011507F	OT-Y011507F	6/25/1999	PROFILE	20	25
OT-Y011603	OT-Y011603	6/25/1999	PROFILE	30	35
OT-Y011603F	OT-Y011603F	6/25/1999	PROFILE	30	35
OT-Y011607	OT-Y011607	6/25/1999	PROFILE	40	45
OT-Y011607F	OT-Y011607F	6/25/1999	PROFILE	40	45
OT-Y011705	OT-Y011705	6/25/1999	PROFILE	50	55
OT-Y011705F	OT-Y011705F	6/25/1999	PROFILE	50	55
OT-Y011801	OT-Y011801	6/25/1999	PROFILE	60	65
OT-Y011801D	OT-Y011801D	6/25/1999	PROFILE	60	65
OT-Y011801DF	OT-Y011801DF	6/25/1999	PROFILE	60	65
OT-Y011801F	OT-Y011801F	6/25/1999	PROFILE	60	65
OT-Y011805	OT-Y011805	6/25/1999	PROFILE	70	75
OT-Y011805F	OT-Y011805F	6/25/1999	PROFILE	70	75
OT-Y011901	OT-Y011901	6/25/1999	PROFILE	80	85
OT-Y011905	OT-Y011905	6/25/1999	PROFILE	90	95
OT-Y012301F	FIELDQC	6/24/1999	PROFILE	0	0

Profiling methods include: Volatiles and Explosives

Groundwater methods include: Volatiles, Semivolatiles, Explosives, Pesticides, Herbicides, Metals, and Wet Chemistry

Other Sample Types methods are variable

SBD = Sample Begin Depth, measured in feet bgs for profile and soil boring, and feet below water table for groundwater

SED = Sample End Depth, measured in feet bgs for profile and soil boring, and feet below water table for groundwater

TABLE 2
 DETECTED COMPOUNDS-UNVALIDATED
 SAMPLES COLLECTED 6/6/99-6/25/99

OGDEN_ID	LOCID OR WELL ID	DATE SAMPLED	SAMP_TYPE	SBD	SED	LAB_METHOD	OGDEN_ANALYTE	PDA
90LWA0007	90LWA0007	6/18/1999	GROUNDWATER	0	10	8330N	3-NITROTOLUENE	
90LWA0007	90LWA0007	6/18/1999	GROUNDWATER	0	10	8330N	4-NITROTOLUENE	
90LWA0007	90LWA0007	6/18/1999	GROUNDWATER	0	10	8330N	PICRIC ACID	
W30SSA	MW-30	6/14/1999	GROUNDWATER	0	10	8330N	OCTAHYDRO-1,3,5,7-TETRANITRO-1,3,5,7	
ABB006QAA	B-6	6/7/1999	SOIL BORING	22	24	8330N	OCTAHYDRO-1,3,5,7-TETRANITRO-1,3,5,7	
ABB006UAA	B-6	6/7/1999	SOIL BORING	30	32	8330N	HEXAHYDRO-1,3,5-TRINITRO-1,3,5-TRIAZI	
ABB006VAA	B-6	6/7/1999	SOIL BORING	32	34	8330N	HEXAHYDRO-1,3,5-TRINITRO-1,3,5-TRIAZI	
ABB006WAA	B-6	6/7/1999	SOIL BORING	34	36	8330N	HEXAHYDRO-1,3,5-TRINITRO-1,3,5-TRIAZI	

DATA REPORTED REFLECT CURRENT DATABASE FOR SAMPLES COLLECTED IN SPECIFIED TIMEFRAME. NOT ALL RESULTS ARE COMPLETE.
 SBD = SAMPLE COLLECTION BEGIN DEPTH (FEET BGS FOR SOILS AND PROFILE, FEET BELOW WATER TABLE FOR GROUNDWATER)
 SED = SAMPLE COLLECTION END DEPTH (FEET BGS FOR SOILS AND PROFILE, FEET BELOW WATER TABLE FOR GROUNDWATER)
 PDA/YES = Photo Diode Array, Detect Confirmed
 PDA/NO = Photo Diode Array, Detect Not Confirmed