

HTW BCT Meeting Agenda

Friday, February 28, 2014 at 1:30 p.m.

Fort Ord BRAC Conference Room

Item	Action	Comment
Community Relations BCT Minutes Status	Status Update	
OU1 Groundwater Remediation	Status Update	
OU1 Well and Plant Demolition	Status Update	
OU2 and 2/12 Treatment Systems Soil Vapor Treatment Plant Relocation	Status Update	
Other Groundwater Issues	Status Update	
OU2 Landfill Operations & Maintenance Closure	Status Update	
Basewide Range Assessment Lead Reevaluation	Status Update	
Site 39 Remediation Habitat Restoration	Status Update	
FFA Schedule Document Schedule	Status Update	
Calendar Update	Update	

Fort Ord Operable Unit 1 Update
Groundwater Remediation, Well Destruction, and Treatment Plant Decommissioning
Marina, California
1:30 p.m., 28 February 2014
Prepared by HydroGeoLogic, Inc.

OU-1 Treatment Plant Operations

HydroGeoLogic, Inc. (HGL) reported the Northwest Treatment System (NWTS) operated continuously from 29 January 2014 through 26 February 2014. Extraction wells EW-OU1-60-A, EW-OU1-66-A, and MW-OU1-87-A are operating and total pumping from those wells is approximately 19 gallons per minute. Since system startup in 2006, the NWTS has pumped approximately 208 million gallons of groundwater and removed approximately 6.0 pounds of total volatile organic compounds, primarily trichloroethene (TCE). An estimated 0.08 pound of TCE has been removed since the 18 September 2013 sampling event.

OU-1 Groundwater Quality Data

HGL collected the following samples from monitoring wells and the NWTS in December 2013:

- Extraction wells MW-OU1-87-A and IW-OU1-10-A (restarted on 14 October 2013 and shut down on 02 January 2014)
- Monitoring wells MW-OU1-88-A and MW-OU1-61-A

Unvalidated sampling results were presented and discussed at the January Base Closure Team (BCT) meeting. Validated results have been received and the results were unchanged. TCE concentrations were very similar to the previous result at each well and varied within ± 1 micrograms per liter ($\mu\text{g/L}$). MW-OU1-61-A and MW-OU1-88-A remain the only two wells where the TCE concentration exceeds the Aquifer Cleanup Level (ACL) of 5 $\mu\text{g/L}$. TCE was the only chemical with a concentration that exceeded the laboratory reporting limit of 0.5 $\mu\text{g/L}$ and it was detected in each well. Concentrations of cis-1,2-dichloroethene were detected in three of the four wells and chloroform was detected in two. The validated sampling results for the NWTS are presented in attached Tables 1A and 1B. Figure 1 presents the TCE concentration contours based on the validated September 2013 data because the December data did not alter the previous TCE concentration contours.

Reporting/Federal Facility Agreement Schedule

All scheduled submittals have been made for primary and secondary deliverables. The status of submitted and anticipated reports for 2014 is summarized in Table 2. We are awaiting comments on the Draft OU-1 2013 Annual and Third Quarter Groundwater Monitoring Report (submitted on 17 January 2014) and the Draft Well Destruction and Former OU-1 Treatment Plant Decommissioning Work Plan (submitted on 11 February 2014).

The Draft Unified Federal Program Quality Assurance Project Plan (UFP-QAPP) for OU-1 will be submitted in early March. The chemistry, reporting, and quality control elements of the UFP-QAPP were changed from the current QAPP only to reflect implementation of *DoD Quality Systems Manual*

for Environmental Laboratories, Version 5.0. The update is focused on integrating the current OU-1 QAPP into the Fort Ord-wide UFP-QAPP used to support the other Fort Ord operable units.

Weed Control and Rare Plant Monitoring

The 2013 Rare Plant Survey and Habitat Impact Report was submitted to the Army and the University of California Santa Cruz on 24 February 2014.

Well Destruction and Treatment Plant Demolition

The Fort Ord Base Realignment and Closure (BRAC) office determined that snowy plover nesting season schedule constraints do not apply to those wells to be destroyed on California State Park land. Assuming no delays in obtaining regulatory approval for the Well Destruction and Former OU-1 Treatment Plant Decommissioning Work Plan, the well destruction effort is scheduled to begin in May.

Action Items:

No new action items.

Ongoing:

- Submit draft minutes for previous BCT meeting(s)—complete. The draft January meeting minutes have been approved as submitted by the U. S. Environmental Protection Agency and the Regional Water Quality Control Board. We are awaiting approval or comments from the Department of Toxic Substances Control.
- Submit approved final minutes for previous BCT meeting(s) — approval and submittals are complete through December 2013 minutes.
- Prepare update for the next BCT meeting.

**Fort Ord HTW BCT Meeting
28 February 2014**

**Fort Ord Operable Unit 1
Groundwater Remediation, Well Destruction, and Treatment Plant Decommissioning**

ATTACHMENT 1

Reference Table(s) and Figure(s)

Table 1A
TCE in OU-1 FONR Groundwater Remediation System – Performance Monitoring
BCT Meeting for Former Fort Ord – 28 February 2014

Began:	FONR Extraction Well (listed from south to north)					Boundary Extraction Well (from west to east)				NWTS							
	Nov-10	Oct-07				Jul-06				INFLUENT	MIDPOINT	EFFLUENT					
Date	IW-10	MW-87	EW-71	MW-85	MW-46AD	EW-63	EW-60	EW-66	EW-62								
TCE (µg/L)																	
11/9/07	Used as monitoring well until pump installed in October 2010. Pumping began 03 November 2010.	16	13	19	14	ND	ND	1.7	ND	11	ND	ND					
1/18/08		11	11	8.9	8.2	ND	ND	1.2	ND	6.0	ND	ND					
3/18/08		11	14	6.7	5.8	ND	0.29	1.5	ND	5.6	ND	ND					
5/27/08		9.7	18	2.5	6.1	ND	ND	1.8	ND	3.9	ND	ND					
7/21/08		9.1	14	4.4	3.4	ND	0.78	1.4	ND	3.6	ND	ND					
9/29/08		9.3	15	4.3	2.9	J	ND	0.90	J	1.7	J	ND	3.8	J	0.19	J	ND
12/1/08		5.8	11	2.6	1.6	ND	0.82	0.91	ND	2.7	0.35	J	ND				
1/26/09		5.9	10	2.2	1.2	ND	0.48	J	0.78	ND	2.4	ND	ND				
3/9/09		5.8	9.9	2.1	1.2	ND	0.95	0.86	ND	2.7	ND	ND					
6/11/09		6.9	11	2.4	1.5	ND	0.88	1.7	ND	2.6	0.14	J	ND				
9/15/09		6.8	9.4	1.7	0.78	ND	inactive	1.1	0.036	J	2.3	0.35	J	ND			
12/14/09		6.9	7.5	0.84	not sampled	not sampled	inactive	0.94	not sampled	2.3	0.65	J	ND				
3/22/10		7.2	8.5	0.62	0.55	inactive	ND	0.90	inactive	2.3	ND	ND					
6/21/10		7.4	6.5	0.90	0.40	J	inactive	0.86	0.58	inactive	2.1	ND	ND				
9/20/10		7.7	6.6	0.83	0.35	J	discontinued	0.63	0.49	J	inactive	2.3	not sampled	ND			
12/16/10		5.2	6.9	5.2	0.58	0.28	J	discontinued	0.72	0.42	J	inactive	2.6	0.18	J	ND	
3/7/11	5.1	6.0	4.6	0.55	0.60	discontinued	0.87	0.42	J	inactive	2.5	0.59	ND				
6/7/11	4.2	6.1	4.0	0.78	0.63	discontinued	0.76	0.36	J	inactive	2.6	1.0	ND				
9/20/11	4.5	6.2	4.2	1.10	0.38	J	discontinued	0.57	0.36	J	inactive	2.5	1.7	ND			
12/7/11	3.8	5.1	3.7	not sampled		discontinued	inactive	0.27	J	inactive	1.8	2.1	0.13	J			
3/15/12	3.7	5.5	3.8	0.70	0.23	J	discontinued	inactive	0.38	J	inactive	0.81	0.32	J	ND		
9/25/12	--	5.3	4.4	--	--	discontinued	inactive	0.19	J	inactive	1.8	0.72	J	ND			
1/8/13	--	5.4	--	--	--	discontinued	ND	0.19	J	inactive	1.54	--	ND				
3/27/13	--	4.8	--	--	--	discontinued	ND	0.23	J	inactive	1.48	--	ND				
6/26/13	--	4.4	--	--	--	discontinued	--	--	inactive	1.90	--	ND					
9/18/13	--	4.7	1.9	--	--	discontinued	0.17	J	0.31	J	inactive	2.00	--	ND			
12/17/13	2.8	4.2	--	--	--	discontinued	--	--	inactive	1.48	--	--					
Notes:	Italics (if used) indicate data not yet validated					Bold font indicates concentration > ACL											
ACL - aquifer cleanup level	-- - Not sampled					µg/L - micrograms per liter				J - Data qualified as estimated							
ND - nondetect	TCE - trichloroethene					NWTS - Northwest Treatment System				FONR - Fort Ord Natural Reserve							
Blue font indicates the concentration is calculated using the weighted average of the active pumping wells.																	

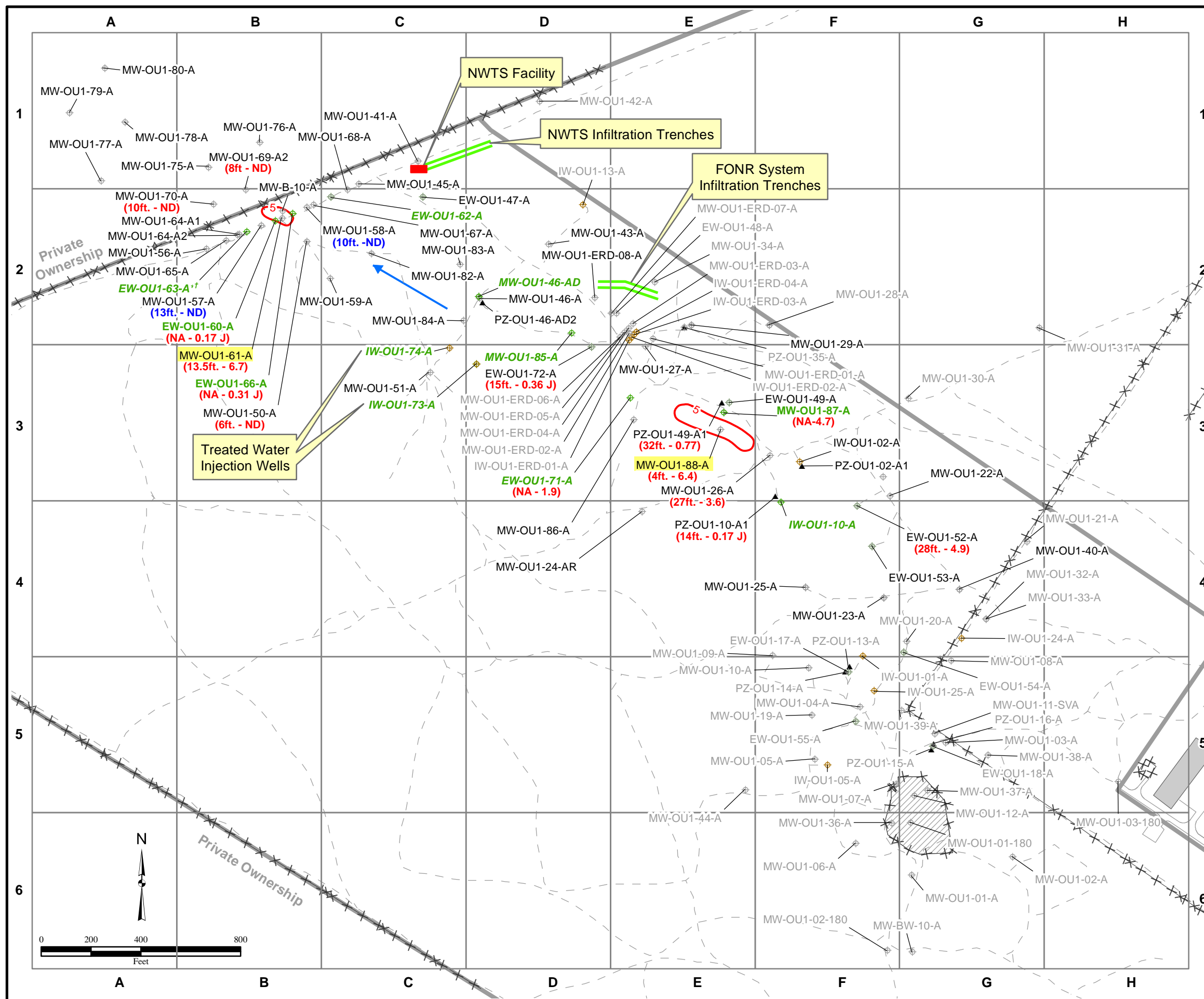
Table 1B
cis-1,2-DCE in OU-1 FONR Groundwater Remediation System – Performance Monitoring
BCT Meeting for Former Fort Ord – 28 February 2014

Began:	FONR Extraction Well (listed from south to north)					Boundary Extraction Well (from west to east)				NWTS						
	Nov-10	Oct-07				Jul-06				INFLUENT	MIDPOINT	EFFLUENT				
Date	IW-10	MW-87	EW-71	MW-85	MW-46AD	EW-63	EW-60	EW-66	EW-62							
cis-1,2-DCE (µg/L)																
11/09/07	Used as monitoring well until pump installed in October 2010. Pumping began 03 November 2010.	1.9	1.6	2.3	1.70	ND	ND	ND	ND	1.3	ND	ND				
01/18/08		1.20	1.40	1.00	1.20	ND	ND	0.11	ND	0.66	ND	ND				
03/18/08		1.20	1.50	0.74	0.63	ND	ND	ND	ND	0.59	0.11	ND				
05/27/08		0.88	2.10	0.26	0.74	ND	ND	ND	ND	0.36	0.21	ND				
07/21/08		0.80	1.50	0.52	0.37	ND	ND	ND	ND	0.41	0.34	ND				
09/29/08		0.99	1.60	0.54	0.30	ND	ND	0.13	ND	0.42	0.42	0.12				
12/01/08		0.67	1.30	0.33	0.21	J	ND	ND	ND	ND	0.27	J	0.37	J	0.19	J
01/26/09		0.63	1.20	0.29	J	0.12	J	ND	ND	ND	0.26	J	0.24	J	ND	
03/09/09		0.62	1.20	0.29	J	0.13	J	ND	ND	ND	0.23	J	0.26	J	ND	
06/11/09		0.71	1.10	0.30	J	0.13	J	ND	ND	0.14	J	ND	0.28	J	ND	
09/15/09		0.80	1.00	0.22	J	0.08	J	ND	inactive	0.03	J	ND	0.37	J	0.03	J
12/14/09		0.67	0.65	0.10	J	not sampled		not sampled	inactive	ND	J	not sampled	0.30	J	0.11	J
03/22/10		0.67	0.79	ND		ND		inactive	ND	ND		inactive	0.11	J	0.13	J
06/21/10		0.67	0.53	0.14	J	ND		inactive	ND	ND		inactive	0.23	J	ND	
9/20/10		0.66	0.46	J	ND	ND		discontinued	ND	ND		inactive	not sampled		ND	
12/16/10		0.55	0.66	0.35	J	ND	J	ND	discontinued	ND	ND	inactive	0.28	J	ND	
3/7/11	0.37	J	0.52	0.28	J	0.11	J	ND	discontinued	ND	ND	inactive	0.30	J	ND	
6/7/11	0.35	J	0.55	0.29	J	ND		ND	discontinued	ND	ND	inactive	0.31	J	0.15	J
9/20/11	0.25	J	0.46	J	0.21	J	ND	ND	discontinued	ND	ND	inactive	0.19	J	0.30	J
12/7/11	0.27	J	0.48	J	0.19	J	not sampled		discontinued	inactive	ND	inactive	0.17	J	0.23	J
3/15/12	0.15	J	0.40	J	0.22	J	0.15	J	ND	discontinued	inactive	ND	inactive	0.24	J	ND
9/25/12	--		0.39	J	0.23	J	--		--	discontinued	inactive	ND	inactive	0.24	J	ND
1/8/13	--		0.35	J	--		--		--	discontinued	ND	ND	inactive	0.12	--	--
3/27/13	--		0.34	J	--		--		--	discontinued	ND	ND	inactive	0.12	--	--
6/26/13	--		0.31	J	--		--		--	discontinued	--	--	inactive	0.27	--	--
9/18/13	--		ND		ND		--		--	discontinued	ND	ND	inactive	ND	--	ND
12/17/13	ND		0.19	J	--		--		--	discontinued	--	--	inactive	ND	--	--
Notes:																
Italics (if used) indicate data not yet validated					Bold font indicates concentration > ACL											
ACL - aquifer cleanup level	-- - Not sampled					µg/L - micrograms per liter				J - Data qualified as estimated						
ND - nondetect	TCE - trichloroethene					NWTS - Northwest Treatment System				FONR - Fort Ord Natural Reserve						
Blue font indicates the concentration is calculated using the weighted average of the active pumping wells.																

Table 2
Current Deliverable Schedule
Former Fort Ord, Marina, CA – 28 February 2014

Deliverable Title	Submittal	Review Comments Due	Status/Remarks
<i>Primary Deliverables</i>			
Draft UFP-QAPP	March 2014	May 2014	In preparation.
<i>Secondary Deliverables</i>			
Draft 2013 Annual and 3 rd Quarter Groundwater Monitoring Report	January 2014	March 2014	Submitted 17 January 2014.
Draft Work Plan for Well Destruction and Treatment Plant Demolition	February 2014	March 2014	Submitted 11 February 2014
Draft 2014 Semiannual Groundwater Monitoring Report	June 2014	August 2014	Sampling to be completed in March 2014.
Draft Well Destruction and Treatment Plant Demolition Completion Report	August 2014	September 2014	Fieldwork to be completed in June 2014.
<i>Completed Recent Submittals</i>			
Final Memorandum for Record for Optimizing Remediation Pumping	March 2012	February 2012	Accepted as final during July 2012 BCT meeting.
Final 2012 Annual and 3 rd Quarter Groundwater Monitoring Report	March 2013	NA	Submitted 21 March 2013.
2013 First Quarter Groundwater Monitoring Report	June 2013	August 2013	Submitted 1 July 2013.
Preliminary Draft Health & Safety Plan – OU-1 O&M / LTM	February 2014	February 2014	Submitted revised document addressing Army comments on preliminary draft.
Preliminary Draft UFP-QAPP	November 2013	February 2014	Army comments addressed.

Figure 1
OU-1 FONR A-Aquifer
TCE Concentration in Groundwater
September 2013
Former Fort Ord, CA



Legend

- ⊕ Well
- ⊕ Extraction Well
- ⊕ Injection Well
- ▲ Piezometer or 2-Inch Well
- Groundwater Flow Direction
- ⊕ MW-OU1-21-A Well Destroyed
- ⊕ MW-OU1-88-A Location with March 2013 TCE Concentrations at or above ACL (5 µg/L)
- MW-OU1-57-A Well ID
- (13.5ft. - 6.7) September 2013 TCE Result (µg/L)
- Sample Elevation (feet above mean sea level)
- (13ft. - ND) Jan/Feb/March 2013 Latest TCE Result (µg/L)
- Sample Elevation (feet above mean sea level)
- 5 TCE contour based on September 2013 Data
- - - Trail/Unimproved Road
- × Fence
- Treated Water Infiltration Trench
- Property Boundary
- Building
- ▨ Former Fire Drill Area

Notes:
 Units of TCE concentration are in micrograms per liter.
 FONR = Fort Ord Natural Reserve
 NWTS = Northwest Treatment System
 ACL = Aquifer Cleanup Level
 ND = nondetect
 NA = Depth is not applicable - sample is from pumping well
 µg/L = micrograms per liter
 Wells shown with an asterisk were not used to develop contour boundaries.
 Wells for which no data are posted were not sampled.
 J = Estimated value
 Green font indicates extraction or injection well.
 Italicized font shows pumping suspended.
 † = Disconnected extraction well. No longer operable.

\\gst-srv-01\hglgis\Ft_Ord_MSIW\O&M_H10203\
 (1)TCE_2013-09.mxd
 11/12/2013 CNL
 Source: HGL

PREPARATORY INSPECTION OUTLINE

Contract No.: W912DY-10-D-0023 CM03
Project: Groundwater Monitoring and Operations and Maintenance of Treatment System at Sites OU-1, Former Fort Ord, California
Date: 20 February 2014

Recurring work to be performed:

- 1) Inspect and maintain groundwater treatment plant and record system parameters on Table 2
- 2) Make repairs if needed to maintain groundwater treatment plant operations

Additional work to be performed:

- 3) None

Anticipated work start: 20 February 2014 **Anticipated Completion:** 20 February 2014

Access Requirements/Notifications: All work is on former Fort Ord property now owned and managed by University of California, Santa Cruz (UCSC). Provide courtesy notification to UCSC Site Steward Sean McStay.

Reference Maps / Figures: Attached Figure 1.4

A. Invited Attendants:

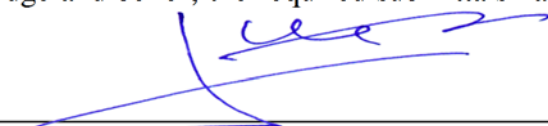
	<u>Name</u>	<u>Position</u>	<u>Company</u>
1)	Marc Edwards	QA	Chenega ¹
2)	Bart Kowalski	Biologist	Chenega ¹
3)	Peter Arroyo	Lead Plant Operator	HydroGeoLogic
4)	Albaro Pantoja	Plant Operator Assistant	HydroGeoLogic
5)			
6)			
7)			

¹Representing Fort Ord Base Realignment and Closure (BRAC) office

B. Submittals required to begin work:

- 1) Preliminary Draft Accident Prevention Plan / Site Safety and Health Plan
- 2) Preliminary Draft UFP-QAPP
- 3) Plant Operation and Maintenance Manual
- 4) Environmental Protection Plan (EPP) for Operable Unit 1 Former Fort Ord

I hereby certify that to the best of my knowledge and belief, the required submittals have been made.



Contractor Quality Control Program Manager

PREPARATORY INSPECTION OUTLINE (PART II)

Contract No.: W912DY-10-D-0023 CM03

Date: 20 February 2014

C. Equipment to be used in executing work:

- 1) Pickup truck
- 2) _____
- 3) _____
- 4) _____
- 5) _____
- 6) _____
- 7) _____
- 8) _____
- 9) _____


D. Biological and Habitat Protection Information / Concerns:

Multiple habitat surveys have been completed in the work area since 1998 and the planned work items have been performed regularly since 2004. The procedures and protocols provided in the EPP are protective of the habitat and species of concern.
No intrusive work will be performed.

E. Methods and procedures for performing Quality Control, including specific testing requirements:

Data validation procedures and quality control samples as specified in the UFP-QAPP.

The above methods and procedures have been identified from the project plans and will be performed as specified for the Definable Feature of Work.



Contractor Quality Control Program Manager

WORK VARIANCE NOTIFICATION
(TO BE COMPLETED IF NEEDED)

Project Name: Groundwater LTM and O&M of Treatment System OU-1 Fort Ord, CA	Variance Number:
Contract Number: W912DY-10-D-0023	Page:
Task Order Number: CMO3	Preliminary/Final:
	Date:

Original Requirements:

Proposed Change:

Technical Justification:

Cost Impact:	Date Funds Required:
Schedule Impact:	

Reason for Change:	<input type="checkbox"/> Addition	<input type="checkbox"/> Deletion	
Fee Bearing:	<input type="checkbox"/> No	<input type="checkbox"/> Yes	
Mod/Change Order Required:	<input type="checkbox"/> No	<input type="checkbox"/> Yes	<input type="checkbox"/> Mod/Change Order No. <input type="text"/>

Applicable Document(s):

WORK VARIANCE CONTRACTOR APPROVAL

Deputy Project Manager	Date	Project Manager	Date
Quality Control Manager	Date	Program Manager	Date

USACE Action

- 1. Stop Work; Proposed Change Not Approved []
- 2. Approved Cost Growth; Not Authorized/Un-negotiated Work []
- 3. Approved Authorized/Un-negotiated Work []

Note: Expenditure of additional funds is not authorized by this action.

_____ Technical Reviewer	_____ Date
_____ Contracting Officer's Representative	_____ Date

FORT ORD SITE HABITAT FORM

The following are requirements to minimize biological disturbances to protected species and habitat.

Please notify Matthew Johnson, HydroGeoLogic (HGL) subcontractor (Denise Duffy and Associates) Biologist (831-373-4341 x27 or 831-917-3242), before proceeding if work tasks or work boundaries change, vegetation removal is necessary, protected species are encountered, or any other conditions change. Field supervisors must receive a copy of this form.

SITE: Fort Ord Operable Unit 1

DATE: _____

WORK TO BE CONDUCTED: Collection of groundwater samples from existing monitoring and extraction wells as per schedule included as Table 1.0; total well depth measurements; and treatment plant operation and maintenance.

1. **LAND USE:** Habitat Reserve

2. **LAND OWNER:** Regents of the University of California

3. **ENDANGERED, THREATENED, RARE, OR HMP-LISTED SPECIES:** Yes
Species: Monterey Spineflower, Sand Gilia, and California Tiger Salamander
Location: The species listed above have not been detected in the February 2104 work areas in any rare plant survey conducted to date (1998 to 2013).
Restrictions: Follow the protective procedures specified in the Environmental Protection Plan (EPP).

4. **VERNAL POOLS/PONDS PRESENT:** No
Location: NA
Grid Numbers: NA
Restrictions: NA

5. **VEGETATION REMOVAL:** No removal needed
Location: NA
Restrictions: NA

6. **EROSION CONCERNS/SITE RESTORATION:** Follow traffic protocols specified in the EPP.

7. **SITE ACCESS:** Vehicle access should be limited to existing roads only.

8. **INVASIVE SPECIES:** Any heavy equipment coming from off-site must be pressure-washed prior to entering habitat reserve areas to reduce the potential for spread of invasive plant species.

9. **ADDITIONAL SITE CONCERNS:** NA

This form has been read, approved, and signed by the following:

Biologist (HGL Subcontractor): _____
Matthew Johnson
(Denise Duffy and Associates)

Date: _____

HGL Project Manager: _____
Roy Evans

Date: _____

BRAC Biologist or Representative: _____
Bart Kowalski
Chenega

Date: _____



Table 2
OU-1 Groundwater Treatment System
Process Log

Note: EW-OUI-63-A has been dis-connected

Date: _____

Recorder Initials: _____

Page 1 of 2

EW-60 (gpm):

Meter EW-60:

Time _____

EW-62 (gpm):

Meter EW-62:

Time _____

EW-63 (gpm):

Meter EW-63:

Time _____

EW-66 (gpm):

Meter EW-66:

Time _____

MW-46-AD (gpm):

Meter EW-46:

Time _____

MW-85 (gpm):

Meter EW-85:

Time _____

EW-71 (gpm):

Meter EW-71:

Time _____

MW-87 (gpm):

Meter EW-87:

Time _____

IW-10 (gpm):

Meter IW-10:

Time _____



Table 2
OU-1 Groundwater Treatment System
Process Log

IW-73 (gpm): _____ Depth to water (ft): _____
 Meter IW-73: Time _____

IW-74 (gpm): _____ Depth to water (ft): _____
 Meter IW-74: Time _____

Trench Vault Meter (gpm): _____
 Trench Vault Meter: Time _____

Transfer Pump (gpm): _____
 Transfer Pump Meter: **0** Time _____

EQ Tank LIT 101 (in.):

Transfer Pump (psi): _____ Bag Filter Influent (psi): _____

Bag Filter Effluent (psi): _____ Carbon Influent (psi): _____

Filters changed ? _____

Carbon Mid Bed (psi): _____ Carbon Effluent (psi): _____

Injection Pump Flow (gpm): _____ Injection Pump (psi): _____

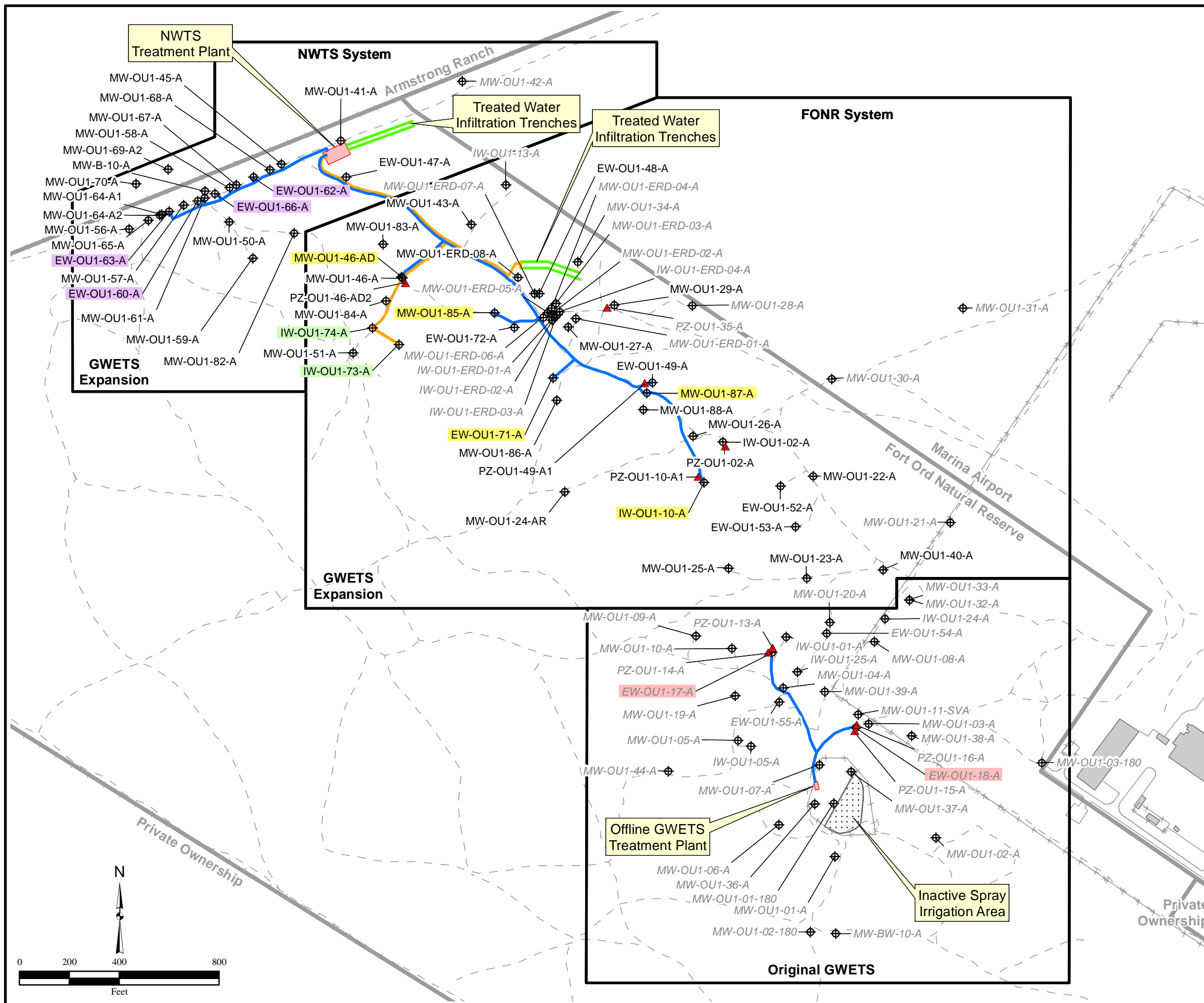
VALVE TREE POSITIONS (circle one position for each valve)

- | | |
|-------------------|-------------------|
| A1: Open / Closed | B1: Open / Closed |
| A2: Open / Closed | B2: Open / Closed |
| A3: Open / Closed | B3: Open / Closed |
| A4: Open / Closed | B4: Open / Closed |

Road erosion? Note location(s) if observed. _____

Photo IDs of eroded area(s) if observed: _____

Figure 1.4
Fort Ord Natural Reserve (FONR)
OU-1 Remediation System Areas



Legend

- ⊕ Well
- ▲ Piezometer
- EW-OU1-18-A Original GWETS Extraction Well
- IW-OU1-74-A FONR Injection Well
- MW-OU1-46-AD FONR Extraction Well
- EW-OU1-63-A NWTS Extraction Well
- MW-OU1-31-A Well Destroyed September 2011
- - - Trail/Unimproved Road
- ×××× Fence
- Extraction Pipeline
- Treated Water Pipeline
- Treated Water Infiltration Trench
- Property Boundary
- Treatment Plant
- Inactive Spray Irrigation Area
- Building

Notes:
The treated water and extraction water pipelines are located in separate trenches within or near the existing roadway. The separation shown in this figure is exaggerated for clarity.

FONR=Fort Ord Natural Reserve
GWETS=Groundwater Extraction and Treatment System
NWTS=Northwest Treatment System
OU-1=Operable Unit 1

\\gst-srv-01\hglgis\Ft_Ord_MSIWIA_Survey_Report_2012\
(1-04)GW_Remediation_Sys.mxd
1/9/2013 CNL
Source: HGL



U.S. Army Community Outreach Update

Long Term Actions Underway:

1. Update all fact sheets – on-going
2. Web site reformat – on-going

Recent Activities:

1. Provided a 7JAN Munitions Safety Presentation to the Peninsula Adventist School (30)
2. Participated in 22FEB14 ESCA Users Group Meeting to present information on BLM Area B RI/FS
3. Participated in 27JAN Munitions Safety presentation for Toro Park Elementary School (430)

Upcoming Activities:

1. 1MAR14 Community Involvement Mobile Workshop—landfill, groundwater cleanup, and ESCA
2. 4MAR14 Technical Review Committee—landfill, groundwater cleanup, and ESCA
3. 6MAR13 Cleanup Bus Tour for Naval Postgraduate School Internal Class IT 1500 (30)
4. TBD Cleanup bus tour for 4-6 community members (requested during 23MAY13 Community Survey interview)
5. TBD Cleanup bus tour for League of Women Voters (may be combined with tour listed above)
6. TBD Provide Munitions Safety presentation to Fort Ord Bicycle, Equestrian Trails Assistance (BETA) organization
7. TBD Provide Munitions Safety presentation to Fort Ord Equestrian Center
8. 29APR Earth Day Booth at Presidio of Monterey
9. April: Various local Earth Day events (DMDC, Naval Postgraduate School, California State University Monterey Bay...)
10. April Cleanup presentation to the Monterey County Chapter of the Military Officers Association of America
11. TBD May Nature Walk inside the Impact Area- date to be determined by rainy season results

STATUS: RESPONSE to COMMUNITY COMMENTS (RTC)

AR Number	Title/Subject	Status
BW-2674.2	Comments submitted by Mike Weaver, Fort Ord Community Advisory Group - on the Draft Technical Memorandum Evaluation of Lead Concentrations at Selected Sites, Former Fort Ord, California	In progress
ESCA-0267.2	Comments submitted by community member, Gail Youngblood, on the Group 2 Proposed Plan, CSUMB Off-Campus MRA, FORA ESCA RP	In Progress/Part of CSUMB Off-Campus Group 2 ROD Responsiveness Summary
ESCA-0267.3	Comments submitted by community group member Mike Weaver, Fort Ord Community Advisory Group, on the Group 2 Proposed Plan, CSUMB Off-Campus MRA, FORA ESCA RP - at the June 19, 2013 public meeting	In Progress/Part of CSUMB Off-Campus Group 2 ROD Responsiveness Summary
OE-0793.4	Comments submitted by community member, Mike Weaver, Fort Ord Community Advisory Group, on the Group 2 Proposed Plan, CSUMB Off-Campus MRA, FORA ESCA RP	In Progress/Part of MRS-34 ROD Responsiveness Summary



**Other Groundwater Issues
Fort Ord HTW BCT Meeting
February 28, 2014**

December (Q4) Groundwater Data

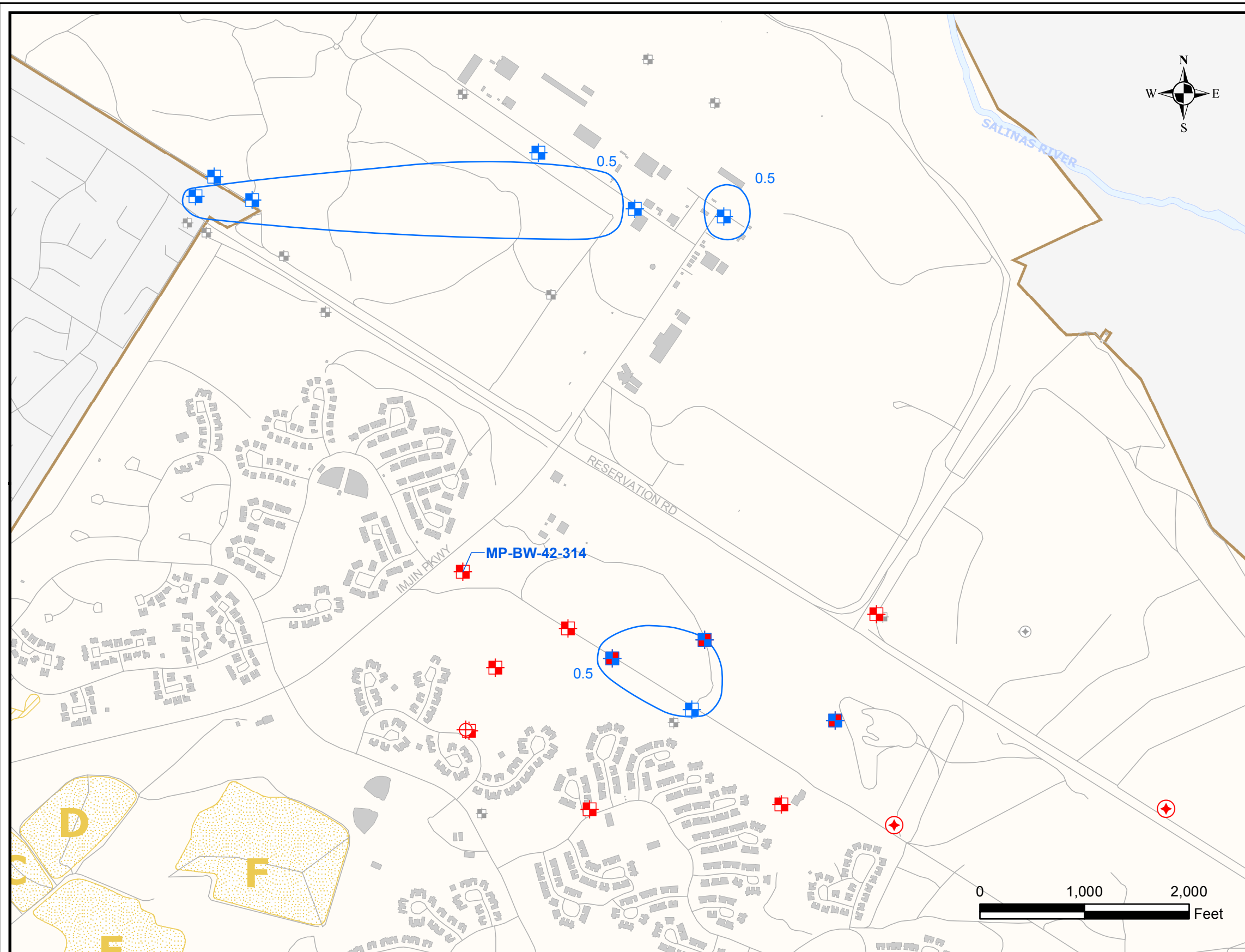
- The fourth quarter groundwater data was uploaded to GEOTRACKER on January 23.
- The fourth quarter groundwater data deliverable was sent to the regulatory agencies on January 29
- Evaluation of the fourth quarter groundwater data identified one well (MP-BW-42-314) that meets the QAPP criteria for sample frequency reduction (see handouts)

First (Q1) Sampling

- First quarter groundwater sampling began on Monday and is scheduled to be completed today

Deliverables

- The 2012-2013 Annual Groundwater Report is undergoing internal review. Submittal of the draft report for agency review is expected in approximately two weeks
- The fourth quarter groundwater report is also undergoing internal review and submittal of the quarterly report is expected in approximately three weeks



EXPLANATION

- Monitoring Well with TCE Detection
- Remediation Extraction Well with TCE Detection
- Active Supply Well with TCE Detection
- Monitoring Well with Carbon Tetrachloride Detection
- Monitoring Well with TCE and CT Detections
- Monitoring Well - TCE or Carbon Tetrachloride not detected
- Active Supply Well - TCE or Carbon Tetrachloride not detected
- Monitoring Well not sampled this quarter

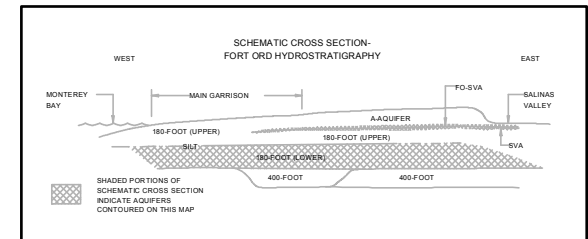
MP-BW-42-314 Meets decision criteria to reduce from quarterly sampling to annual sampling as defined in Volume I, Appendix A of the Final UFP QAPP, Army 2012.

Chemical of Concern (COC) Aquifer Cleanup Level (ACL)
Exceedance Contour in µg/L

- 5 Trichloroethene (TCE)
- 0.5 Carbon Tetrachloride (CT)

- Facilities
- Roads
- Approximate outline of former Fort Ord Landfill Cell A (clean closed)
- Approximate extent of Fort Ord Landfill Cells
- Fort Ord Base Boundary

- NOTES:**
- (1) CONTOURS ARE BASED ON ONE INTERPRETATION OF THE DATA THAT WERE AVAILABLE AT THE TIME THIS REPORT WAS PREPARED; OTHER INTERPRETATIONS MAY BE POSSIBLE.
 - (3) CONTOURS BASED ON HIGHEST VALUE OBTAINED FROM MULTIPLE BAGS WHERE APPLICABLE.
 - (4) SUPPLY WELLS FO-29, FO-30 AND FO-31 HAVE BEEN RENAMED AS 29(A), 30(B) AND 31(C) RESPECTIVELY. THE WELLS ARE REFERRED TO BY THE ORIGINAL NAMES IN THIS REPORT FOR CONSISTENCY.
 - (5) OTHER COC ACL EXCEEDANCES DETECTED BEYOND THE EXTENTS OF THE TCE AND CT PLUMES ARE ILLUSTRATED WHEN PRESENT



DRAWN	RJP	JOB NUMBER	OD13164600
ENGINEER		SCALE	AS SHOWN
CHECKED	JJF	DATE	2/2014
APPROVED		DATE	



Based On Fourth Quarter Monitoring
October through December 2013
Former Fort Ord, California

Sample Frequency Changes
OUCTP and OU2
Lower 180-Foot Aquifer

FIGURE
1

Wells Meeting Criteria for Sample Frequency Change

**Figure 1, Lower 180-Foot
Aquifer
OUCTP**

Chemical of
Concern

MP-BW-42-314

Q Meets decision criteria to reduce from quarterly sampling to annual sampling¹

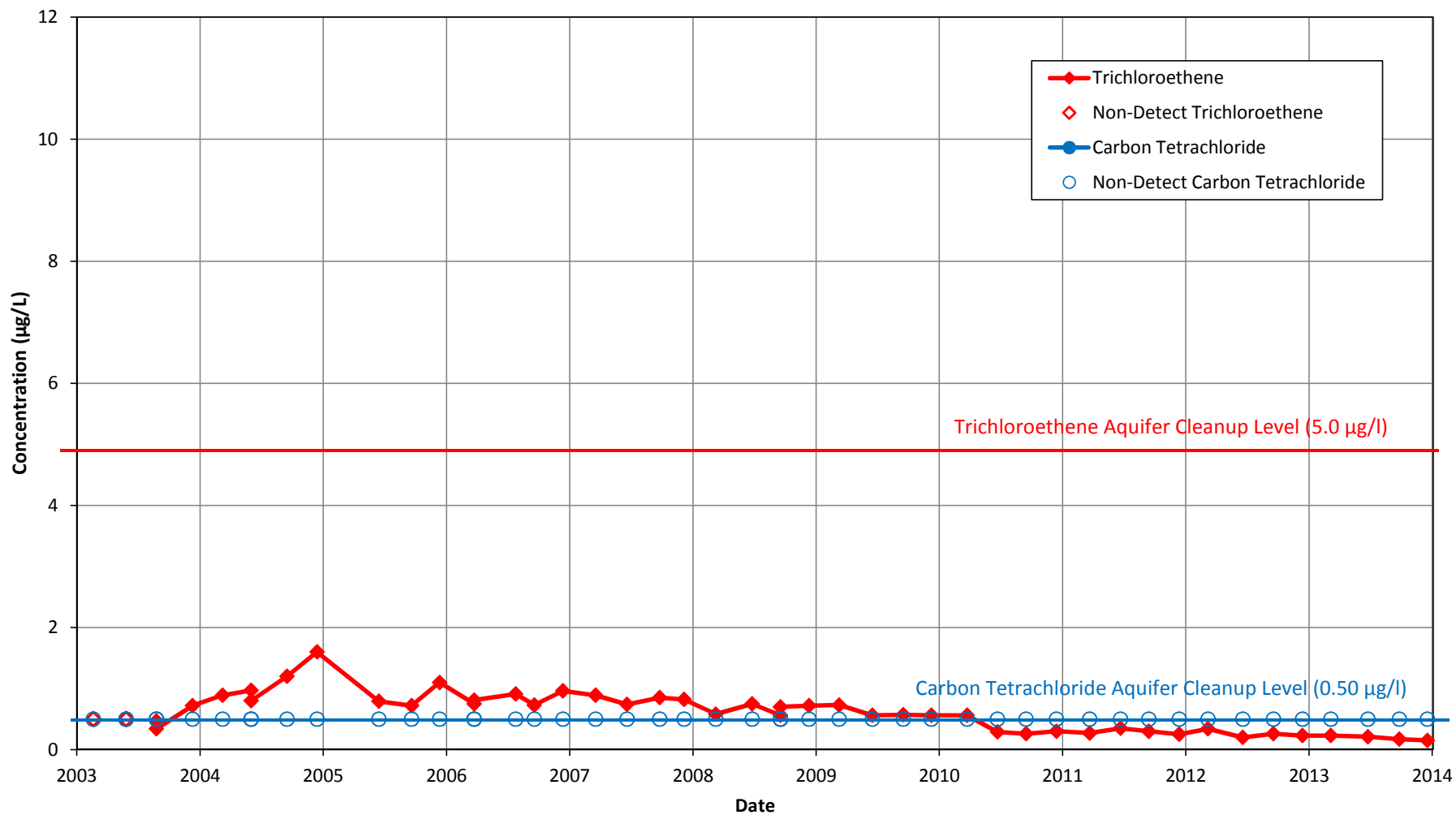
Carbon tetrachloride (CT)
and trichloroethene (TCE)

Notes: Q Currently sampled on a quarterly schedule


¹ If four consecutive quarters of monitoring data show concentrations of COCs below their respective limits of quantitation (LOQs), or below 10% of their respective aquifer cleanup levels (ACLs), whichever is greater, then the well may be proposed for annual sampling (Army, 2012).

Department of the Army
(Army), 2012

Final Quality Assurance Project Plan (QAPP), Former Fort Ord, California, Volume I, Appendix A, Groundwater Extraction and Treatment Systems at Operable Unit 2 and Sites 2 and 12, Groundwater Monitoring Program at Sites 2 and 12, Operable Unit 1, Operable unit 2, and Operable Unit Carbon Tetrachloride Plume, December. (QAPP, BW# AR-2640)



Note: Non-detect values are posted as the reporting limit

	Carbon Tetrachloride and Trichloroethene Concentrations Over Time MP-BW-42-314 Results from 2003 through 4th Quarter 2013 Former Fort Ord Former Fort Ord, California			Figure <h1 style="text-align: center;">1</h1>
	DRAWN ZC	JOB NUMBER OD13164600	CHECKED	CHECKED DATE



BRA, Lead Evaluation, and Site 39 Status
Fort Ord HTW BCT
28 February 2014

Basewide Range Assessment

- ITSI Gilbane submitted the draft of the technical memorandum to describe the BRA sampling results and further recommendations for Units 4, 11, and 12 on January 27, 2014.
- Separate handout provided on assessment and recommendation for Unit 6.
- A BRA sampling plan for Units 10, 7, and 33 will be prepared following the completion of surface MEC removal activities.

Lead Evaluation Technical Memorandum

- Lead Evaluation TM comment period was extended to 14 February 2014.
- The Army has provided responses to comments received from DTSC and FOCAG.

HA 28

- Erosion control activities at HA 28 are completed.

HA 34

- Erosion control activities at HA 34 are completed with the final step of hydroseeding being completed the week of 27 January 2014.

HA 37

- Erosion control activities at HA 37 are completed.

Site 39 MPPEH/MEC/MD List

- No MEC removal under Site 39 this period.

Site 39 Remedial Action Completion Report

- Site 39 RACR was submitted draft at the end of November. Comments received from EPA.



**OU2 Landfills and TTU
Operation and Maintenance
Status Update
February 28, 2014**



Landfill Maintenance

- Monterey County inspection 10/30 – no issues. Next inspection not yet scheduled.
- Annual inspection by P.E. (Mick Williams) 10/30. No issues; minor erosion repairs have been addressed.
- Landfill holding up well to recent rains.
- 2012 annual report issued final 2/7/14.
- 2013 report to be issued to Army by 3/31/14.

TTU Operations/Landfill Gas Monitoring

- Operating every other week since 2/6/12 (approx. 90 hrs in each 2 week cycle)
- Data summary attached
 - Methane at TTU generally downward in first half of 2013, increasing after July; same trend observed in 2012 – concentrations tend to be higher in winter than summer but TTU also operated less in second part of year.
 - Current concentration is acceptable - approx. 38% (graph attached).
- Methane removed in 2013: 18% less than 2012.
- COCs removed in 2013: 12% less than 2012 (90% reduction since 2006).
- Continued downward trend for total VOCs and vinyl chloride in probe 4E-12 near new treatment plant location.
- No operational problems.
- Next quarterly perimeter probe monitoring March.

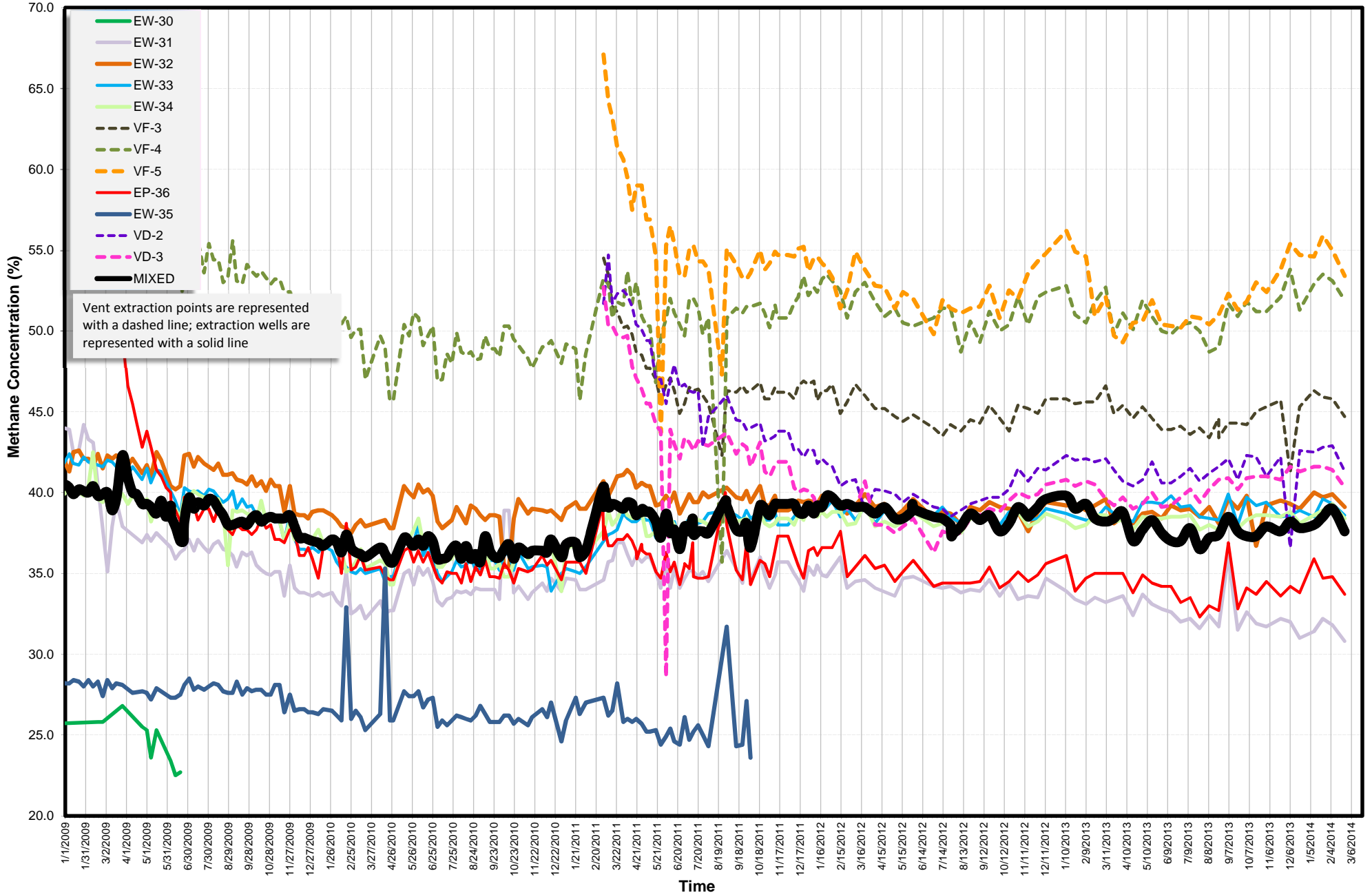
**Thermal Treatment Unit
Operation Summary
2006 - 2014**

TREATMENT SYSTEM OPERATION SUMMARY	
Treatment System Start Date:	6/4/2001
TTU Start Date:	4/4/2006
Last Reading Date/Time:	2/24/2014 11:43
Historical through 2013 (TTU only):	
Total TTU Hours:	67,872
Total TTU Hours Operated:	23,903
% TTU Operation:	35.2%
Total Pounds of Methane Removed:	2,638,229
Current Year 2014:	
Total Hours:	1,344
Total Hours Operated:	347
% TTU Operation:	26%
Total Pounds of Methane Removed:	31,270
Cumulative (since TTU startup in 2006):	
% TTU Operation:	35.0%
Total Pounds of Methane Removed:	2,669,499

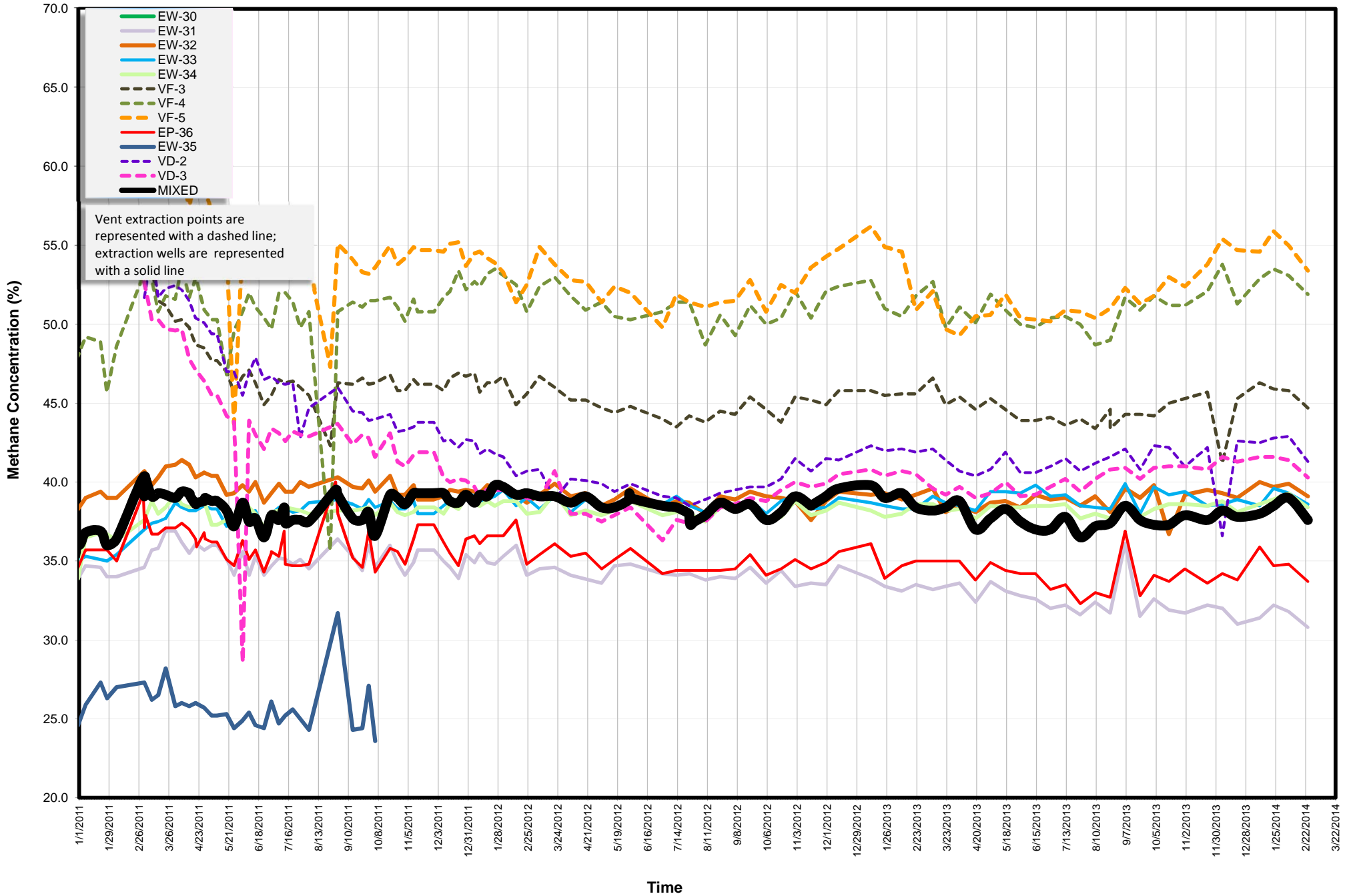
	Total Pounds Removed	Pounds/week		Total Pounds COCs Removed
Pounds of Methane Removed (2007)	532,181	10,206	2007	6.2
Pounds of Methane Removed (2008)	288,433	5,532	2008	3.1
Pounds of Methane Removed (2009)	448,148	8,595	2009	3.4
Pounds of Methane Removed (2010)	212,684	4,079	2010	1.4
Pounds of Methane Removed (2011)	228,085	4,374	2011	1.4
Pounds of Methane Removed (2012)	229,400	4,399	2012	1.2
Pounds of Methane Removed (2013)	187,782	3,601	2013	1.1
Pounds of Methane Removed (2014)	31,270	3,909	2014	0.04

EXTRACTION SYSTEM (2013)						
Location	Last Instantaneous Methane Reading (%)	Last Instantaneous Flow Rate Reading (scfm)	Current Methane Removal Rate (lbs/day)	2014 % Operation	2014 Methane Removed (Lbs)	% Contribution of Each Extraction Source
Area E						
EP-36	33.7	25.0	497	26	7378	22%
Area F						
EW-31	30.8	19.0	345	26	4120	12%
EW-32	39.1	19.0	438	26	5338	16%
EW-33	38.6	14.0	319	26	3963	12%
EW-34	38.4	26.0	589	26	7362	22%
VF-3	44.7	6.0	158	26	1813	5%
VF-4	51.9	4.0	122	26	1074	3%
VF-5	53.4	1.0	31	26	1699	5%
Area D						
EW-35	32.6	0.0	0	0	0	0%
VD-2	41.3	3.0	73	26	789	2%
VD-3	40.3	1.0	24	26	482	1%
MIXED						
MIXED	37.6	96.0	2129	26	31270	100%

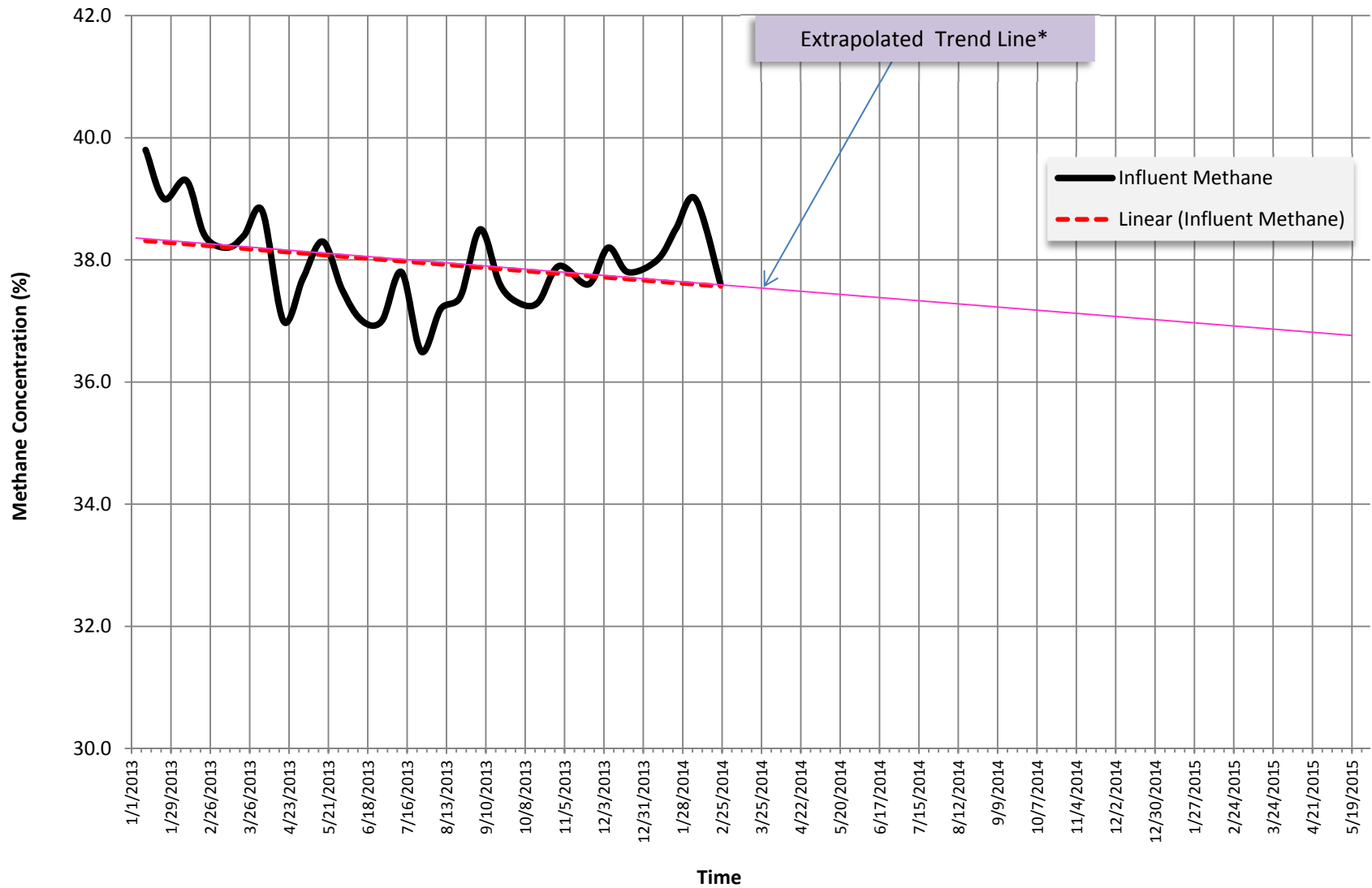
Methane Concentration vs. Time
OU2 Landfill Extraction Sources
1/1/2009 to present



Methane Concentration vs. Time
OU2 Landfill Extraction Sources
1/1/2011 to present

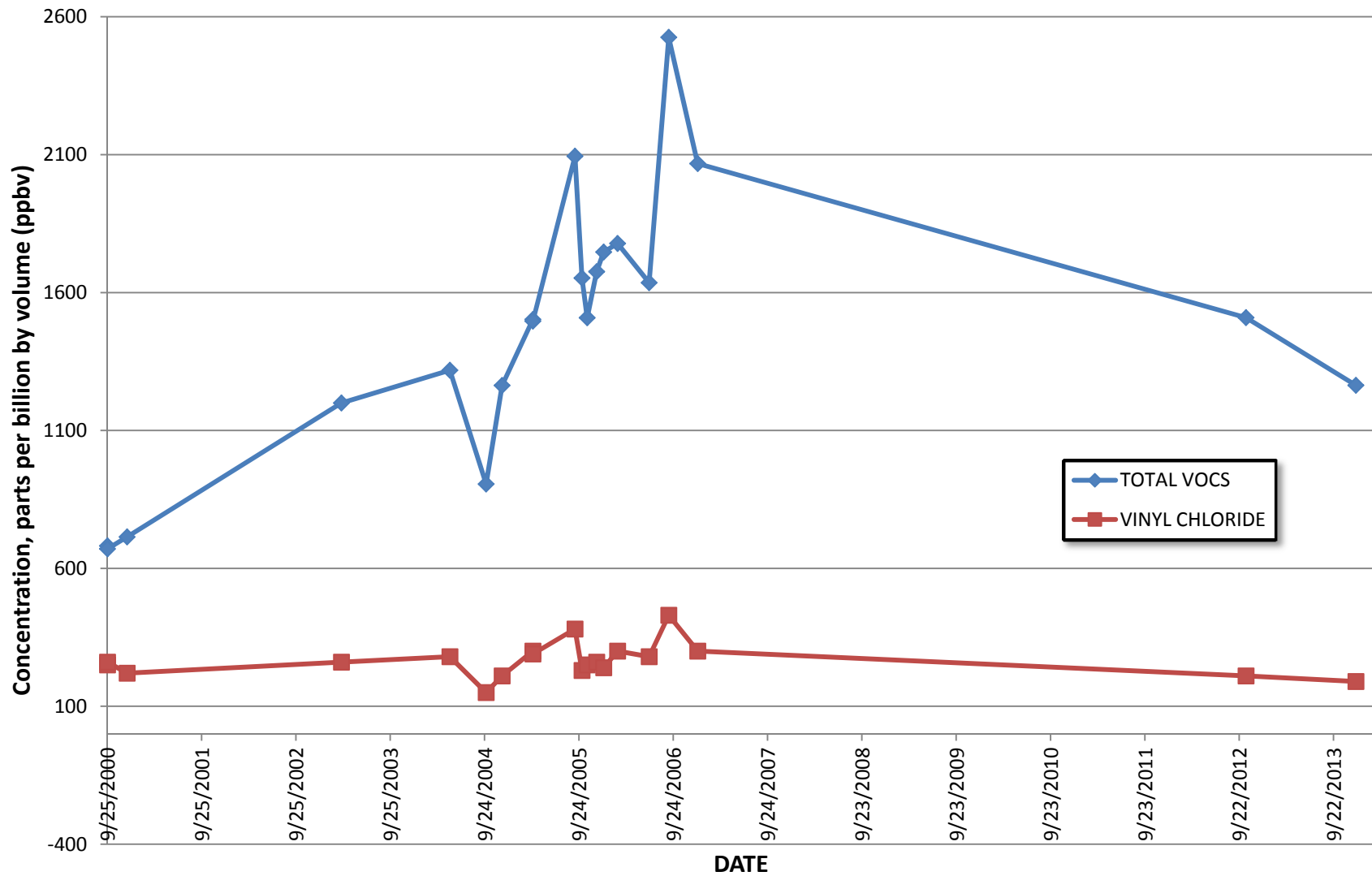


Methane Concentration vs. Time
OU2 Landfill Extraction Sources
01/01/2013 to present



* Trend line generated from all data 1/1/13 to present

SGP-4E-12'



Unit 6 Assessment and Recommendation

1) Introduction

This presentation provides a brief synopsis of the investigations and site work performed relative to Unit 6 within the inland ranges of former Fort Ord, and a summary of the associated data evaluations performed as part of the Basewide Range Assessment process. Based on evaluation of data collected to date, no further action is needed to achieve the criteria established for subsequent use of the site. Presentation of this synopsis is intended to provide an overview of the basis for the Army's recommendation for No Further Action within Unit 6 for the February 2014 BCT meeting. Remaining questions or concerns regarding the No Further Action recommendation can be addressed at the March 2014 BCT meeting.

2) Brief site history

- i) Unit 6 includes the former small arms training range (HA-27A) designated as a 10 meter machine gun/25 meter rifle range with backstop that was in use from at least 1973 through 1991
- ii) Weapons authorized for use at the range included M-60 machine gun, M-14 and M-16 rifles, and 38-caliber and 45-caliber pistols
- iii) No other established ranges other than HA-27A were identified within Unit 6

3) Previous site evaluation

- i) Literature review and site reconnaissance confirmed the presence and former use of the HA-27A range
- ii) BRA evaluation identified areas of elevated lead concentrations within the former range
- iii) Remediation of selected areas within the former range was completed in accordance with the RD/RAWP
 - (1) Approximately 1,740 cubic yards of soil containing elevated concentrations of lead were removed and transported to the OU2 landfill
 - (2) Post-excavation sampling confirmed a lead concentration reduction within the excavated area from an average of 4,762 mg/kg to 27.6 mg/kg
 - (3) The post-remediation range-wide weighted average concentration was 90.5 mg/kg, which was compliant with RAOs identified in the FS and RD/RAWP
- iv) Unit-Wide MEC removal action was performed
 - (a) 68 percent of site grids contained no MD
 - (b) Only 3 site grids contained more than 10 pounds (less than 20 pounds) of MD
 - (c) Only one MEC item was found within Unit 6 (M125 ground illumination signal, found near the eastern perimeter of the unit)
 - (d) Target features or significant accumulations of lead or other materials that typically indicate potentially elevated COCs were absent outside the footprint of HA-27A

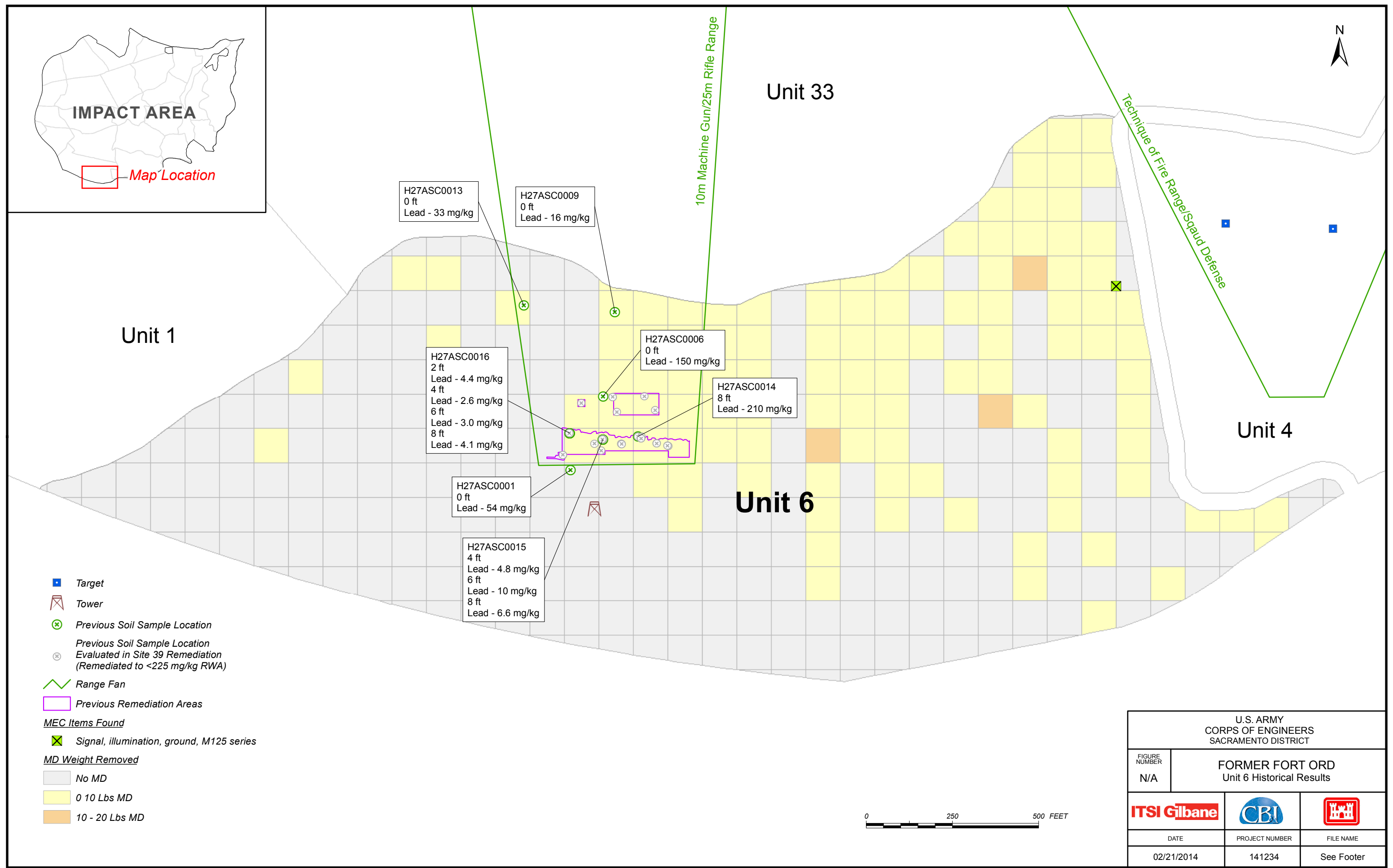
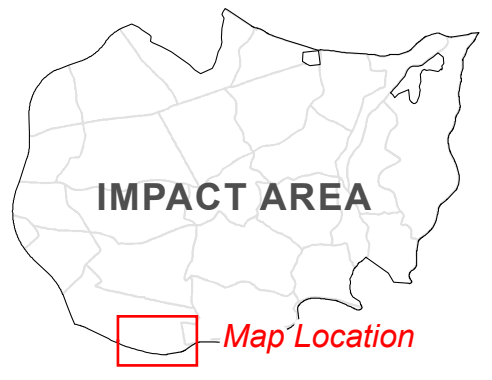
4) Applicable Criteria for Unit 6 status determination

- i) Areas of elevated COCs in soil have been remediated to a RAO-compliant range-weighted average
- ii) Significant accumulations of MEC/MD were not found outside the perimeter of former range HA-27A

- iii) Physical features typically associated with elevated concentrations of COCs or accumulations of materials potentially contributing to the presence of elevated COCs were not found outside the footprint of former range HA-27A.
- iv) Applicable BRAWP-specified status determination criteria (from BRAWP Section 3.5 DQO Decision Rules and Sections 4.2 through 4.4):
 - (a) If COCs are not expected, the area will be proposed for No Further Action
 - (b) If no evidence of small arms use or other chemical contamination is identified during the site reconnaissance, No Further Action will be recommended.
 - (c) If reconnaissance and literature review indicate that the presence of elevated COCs are unlikely, No Further Action will be recommended

5) Conclusions

- i) The areas within former Range HA-27A where elevated concentrations of COCs were identified have been remediated in accordance with the RAWP.
- ii) Site reconnaissance and MEC/MD removal activities identified no significant physical features or accumulations of materials typically associated with elevated concentrations of COCs outside the footprint of the remediated areas within former range HA-27A.
- iii) Based on previously completed remediation within the former range and the absence of significant accumulations of materials potentially contributing to elevated COCs outside the former range, No Further Action is recommended.



H27ASC0013
0 ft
Lead - 33 mg/kg

H27ASC0009
0 ft
Lead - 16 mg/kg

H27ASC0016
2 ft
Lead - 4.4 mg/kg
4 ft
Lead - 2.6 mg/kg
6 ft
Lead - 3.0 mg/kg
8 ft
Lead - 4.1 mg/kg

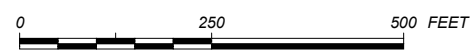
H27ASC0006
0 ft
Lead - 150 mg/kg

H27ASC0014
8 ft
Lead - 210 mg/kg

H27ASC0001
0 ft
Lead - 54 mg/kg

H27ASC0015
4 ft
Lead - 4.8 mg/kg
6 ft
Lead - 10 mg/kg
8 ft
Lead - 6.6 mg/kg

- Target
- Tower
- Previous Soil Sample Location
- Previous Soil Sample Location Evaluated in Site 39 Remediation (Remediated to <225 mg/kg RWA)
- Range Fan
- Previous Remediation Areas
- MEC Items Found**
- Signal, illumination, ground, M125 series
- MD Weight Removed**
- No MD
- 0 - 10 Lbs MD
- 10 - 20 Lbs MD



U.S. ARMY CORPS OF ENGINEERS SACRAMENTO DISTRICT		
FIGURE NUMBER N/A	FORMER FORT ORD Unit 6 Historical Results	
DATE 02/21/2014	PROJECT NUMBER 141234	FILE NAME See Footer

Former Fort Ord Groundwater Treatment Systems Operational Data and Status

BCT Meeting, February 28, 2014

Table 1: OU2 and Sites 2/12 GWTP Treatment Statistics as of January 31, 2014

Monthly Statistics	Volume Treated (gallons)	Average Flow (gallons per minute)	Percent of Time Online	COC Mass Removed (pounds)
OU2				
January 2014	25,492,250	571	97.7	1.9
Total since October 1995	6.159 Billion			753
Sites 2/12				
January 2014	7,507,300	168	99.7	0.59
Total since April 1999	1.715 Billion			462

Table 2: January 2014 – OU2 Analytical Results at TS-OU2-INJ

COC	Discharge Limit (µg/L)	Sample Date/ Analytical Results	
		1/2/2014	1/20/2014
1,1-DCA	5.0*	0.66	0.70
1,2-DCA	0.50	0.24	0.28
1,2-DCP	0.50	ND	ND
Benzene	0.50	ND	ND
CT	0.50	ND	ND
Chloroform	2.0*	0.36	0.37
cis-1,2-DCE	6.0*	1.2	1.3
Methylene Chloride	0.50	ND	ND
PCE	0.50	ND	ND
TCE	0.50	ND	ND
VC	0.10	ND	ND

NOTES:

* Discharge limits for low carbon affinity compounds were increased to the Aquifer Cleanup Level (ACL).

ND The analyte was not detected above the limit of quantitation.

Table 3: January 2014 – Sites 2/12 Analytical Results at TS-212-INJ

COC	Discharge Limit (µg/L) ‡	Sample Date / Analytical Results
		Not Sampled
1,1-DCE	6.0	The 2/12 GWTP was not sampled during January 2014 per the sample schedule in Worksheet #17a2 of the QAPP (Army, 2013). TS-212-INJ is scheduled to be sampled in February 2014.
1,2-DCA	0.50	
1,3-DCP †	0.50	
Chloroform	2.0	
cis-1,2 DCE	6.0	
PCE	3.0	
TCE	5.0	
VC	0.10	

NOTES:

ND The analyte was not detected above the limit of quantitation.

NS not sampled.

† The reported value is the sum of both cis- and trans-isomers.

‡ Discharge limits are the ACLs for injection over the plume.

Table 4: January 2014 Key Events for OU2 and Sites 2/12 GWTS

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
			1	2 OU2 GWTP Sampling	3	4 OU2 GWTP Offline for 7.5 hours due to VFD fault in OU2 XS Pump (P410)
5	6	7	8 EW-OU2-05-180 offline for 10 hours due to inoperable VFD fan (fan repaired)	9	10	11
12	13	14	15 OU2 GWTP Offline for 1.5 hours due to VFD fault in OU2 XS Pump (P410)	16	17	18
19	20 OU2 GWTP Sampling	21	22	23 Marina Public Works (MPW) notified Ahtna of a missing vault lid in the Cypress Knolls area after a single car accident damaged a fence and exposed the vault ¹	24 Installed a temporary wood cover on the vault associated with the OU2 Eastern Network Influent Pipeline (MPW repaired fence)	25
26	27	28 2/12 GWTP offline for 2 hours to clean the air stripper	29	30	31 Replaced failed VFD on the OU2 SW INJ Pump (P510)	

February 2014 Scheduled Events for OU2 and Sites 2/12 GWTS

- OU2 and 2/12 GWTP sampling.
- February 4 – Restarted operation of OU2 SW INJ.
- February 26 – First Quarter 2014 OU2 and 2/12 Extraction Well Sampling.

Table 5: AES Document Submittals - Status Summary

GWM QAPP 2013 Update, personnel changes and OUCTP post-injection water quality parameter monitoring and new decision rules added. Draft issued November 22, 2013; no comments received; final to be issued by February 28, 2014.
OUCTP Work Plan Addendum, OUCTP post-injection water quality parameter monitoring and new decision rules. Draft issued for 30-day review on February 21, 2014; comments requested by March 21, 2014.
2013 Fort Ord Sites OU2 and 2/12 O&M Annual Report, draft in progress. Expected draft issue date is March 7, 2014.

¹ Utility Vault No. 31 is located north of Imjin Parkway in between 4th Avenue and California Avenue in the former Cypress Knolls development area. This vault is the location where the original 8-inch PVC extracted water and treated water pipelines from the OU2 GWTP are tied into the newer HDPE pipelines installed as part of the Phase II Expansion in 2002.

Table 6: January 2014 OU2 Extraction Well Status (as of January 31)

Well Identification	Comments	Select COC Concentrations (µg/L) 4Q 2013†				
		TCE	PCE	1,2-DCA	VC	CT
<i>Western Network</i>						
EW-OU2-01-A	Offline due to low concentrations, sampled with PDBs [^]	ND	ND	ND	ND	ND
EW-OU2-02-A	Online to capture western TCE plume	0.50	ND	ND	ND	ND
EW-OU2-03-A	Offline due to low concentrations, sampled with PDBs‡	Not Sampled				
EW-OU2-04-A	Online to capture western TCE plume	1.2	ND	ND	ND	ND
EW-OU2-05-A	Adjacent to MW-OU2-40-A**, offline due to pump failure	Not Sampled				
EW-OU2-06-A	Adjacent to MW-OU2-40-A**	4.1	0.34	ND	ND	ND
EW-OU2-01-180	No pump in well, sampled with PDBs	7.2	ND	ND	ND	ND
<i>Total gallons extracted: 6,789,360</i>						
<i>Eastern Network</i>						
EW-OU2-07-A	Offline due to low concentrations‡	Not Sampled				
EW-OU2-08-A	Offline due to low concentrations [^] ‡	Not Sampled				
EW-OU2-09-A		0.80	0.52	0.55	ND	ND
EW-OU2-10-A		2.4	1.2	0.92	0.11	ND
EW-OU2-11-A	Offline due to biofouling, screen damaged, sampled with PDBs.	1.4	0.84	0.38	ND	ND
EW-OU2-12-A		5.9	1.1	0.76	ND	ND
EW-OU2-13-A		9.4	2.4	2.3	0.058	ND
EW-OU2-02-180	Offline due to breach in well casing	Not Sampled				
<i>Total gallons extracted: 3,056,490</i>						
<i>Shoppette</i>						
EW-OU2-05-180		4.9	0.43	ND	ND	ND
EW-OU2-06-180	Offline due to pump failure	Not Sampled				
EW-OU2-16-A*	Pump cycling due to low water level	6.1	6.0	2.9	0.78	ND
<i>Total gallons extracted: 7,488,400</i>						
<i>CSUMB</i>						
EW-OU2-14-A	Offline due to low concentrations	2.4	0.47	ND	ND	ND
EW-OU2-15-A	Offline due to low concentrations, pump failure	Not Sampled				
<i>Total gallons extracted: 0</i>						
<i>Landfill</i>						
EW-OU2-03-180		13.7	0.69	ND	ND	0.17
EW-OU2-04-180	Offline due to low concentrations‡	Not Sampled				
<i>Total gallons extracted: 6,892,300</i>						
<i>Bunker Hill</i>						
EW-OU2-07-180	No pump in well, sampled with PDBs	3.0	0.74	ND	ND	ND
EW-OU2-08-180	Offline due to low concentrations	0.42	0.19	ND	ND	ND
EW-OU2-09-180	OUCTP Upper 180-Foot Aquifer remedy§	ND	0.18	ND	ND	ND
<i>Total gallons extracted: 2,281,000</i>						
<i>Total OU2 gallons treated: 25,492,250</i>						

NOTES:

ND The analyte was not detected above the limit of quantitation.

† Concentrations in bold type exceed the ACL.

‡ Meets QAPP decision rules to be removed from the GWMP.

[^] Sampled annually per QAPP decision rules.

* EW-OU2-16-A concentration of 1,1-DCA = 14.1 µg/L.

** MW-OU2-40-A concentration of TCE = 14.2 µg/L.

§ cis-1,2-DCE also detected at 1.4 µg/L.

Table 7: January 2014 Sites 2/12 Extraction Well and Select Monitoring Well Status (as of January 31)

Well Identification	Comments	Select COC Concentrations (µg/L) 4Q 2013†			
		TCE	PCE	cis-1,2-DCE	VC
EW-12-05-180M		4.7	8.5	1.3	ND
EW-12-06-180M		2.9	0.62	1.0	ND
EW-12-07-180M	Offline due to low concentrations	3.3	0.50	1.0	ND
EW-12-03-180U	Offline due to low concentrations, sampled with PDBs‡	Not Sampled			
EW-12-03-180M	Offline due to low concentrations, sampled with PDBs	2.8	0.56	1.2	ND
EW-12-04-180U	Offline due to low concentrations, sample with PDBs‡	Not Sampled			
EW-12-04-180M	Offline due to low concentrations, sampled with PDBs*	Not Sampled			
MW-12-09R-180	MW east of and upgradient from EW-12-05-180M	0.46	5.2	ND	ND
MW-12-14-180M	MW north of and upgradient from EW-12-05-180M	2.3	0.40	0.13	ND
MW-12-17-180U ¹	New MW east of EW-12-06-180M	6.8	0.29	ND	ND
MW-12-24-180U ²	New MW adjacent to MW-12-09R-180	8.1	95.7	ND	ND
MW-12-20-180U ³	New MW northeast of MW-12-09R-180	0.16	6.4	ND	ND
Total 2/12 Extraction Well gallons treated: 7,507,300					

NOTES:

ND The analyte was not detected above the limit of quantitation.

† Concentrations in bold type exceeded the ACL.

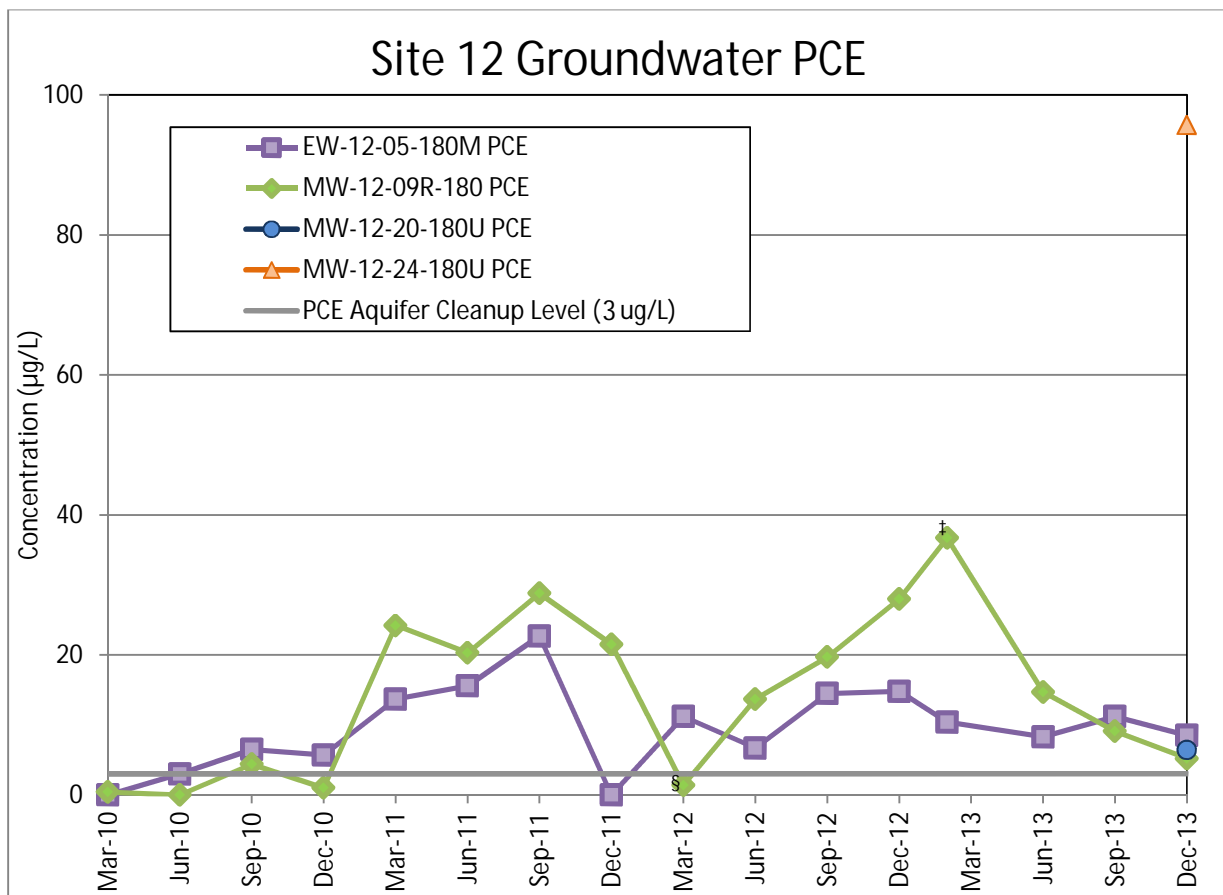
‡ Sampled annually per QAPP decision rules.

* Meets QAPP decision rules to be removed from the GWMP.

¹ New MW profiled, highest COC concentrations at 76 and 81 feet below ground surface (ft bgs) (results same at both Stations 3 and 4).

² New MW profiled, highest COC concentrations at 75 ft bgs (Station 3).

³ New MW profiled, highest COC concentrations at 71 ft bgs (Station 2).



§ The PCE detection from MW-12-09R-180 in March 2012 was flagged with a J- qualifier which indicates a low bias.

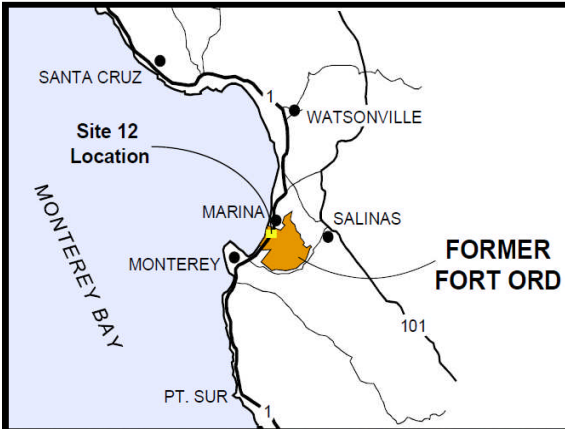
‡ The PCE detection from MW-12-09R-180 in March 2013 was flagged with a J+ qualifier which indicates a high bias.

RI/FS Addendum at Sites 2/12, Pilot Study Work Plan Summary

- VOCs identified in soil gas and groundwater at Site 12
- Pilot study objectives:
 - Provide sufficient data to:
 - Develop and evaluate treatment alternatives, and
 - Support design of a selected remedial alternative
 - Reduce performance and cost uncertainties for treatment alternatives to allow for remedy selection.
- Five SVE and five AS wells
- One GW monitoring well
- Treatment with GAC
- Shakedown and startup, 30-day pilot test

RI/FS Addendum at Sites 2/12, Pilot Study Schedule

- Work plan issued February 25, 2014
- Comments requested by March 27, 2014
- Field work scheduled to start April 2014
- 1 week shakedown and startup
- 30-day pilot test
 - SVE step testing to determine ROI
 - SVE extended test to determine mass removal rates
 - AS test to evaluate sparging VOCs from groundwater
- Results in RI/FS Addendum Report



- Sites 2/12 GWTP
- Proposed Pilot Study Area
- Retail Development Tracts
- Target Tract
- Stormwater Drain Infiltration



250 500 750 1,000
 Feet

Sites 2/12 Location Map
 Remedial Investigation/Feasibility Study
 Pilot Study Work Plan
 at Sites 2/12, Former Fort Ord, California

Figure
1

Legend

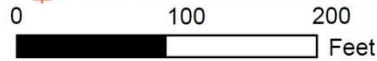
- TCE 70 ft bgs soil gas contour (ug/m³)
- - - TCE contour estimated
- ⬡ Nested Permanent Soil Gas Probe Location

TCE screening level 888 ug/m³

Previous Soil Gas Investigations:

- ▲ June 2013 Soil Gas Sample (temporary-probe abandoned)

- ⊕ Proposed SVE/AS Well Location
- ⊠ Proposed Groundwater Monitoring Well Location
- Proposed SVE Conveyance Piping
- Proposed Data Gap Investigation Soil Gas Probe
- ⊕ Proposed Data Gap Investigation Monitoring Well



Proposed Well Locations and System Conveyance Piping

Remedial Investigation/Feasibility Study
Pilot Study Work Plan
at Sites 2/12, Former Fort Ord, California

Figure

3



Each location will be cleared for underground utilities through Underground Service Alert and geophysical methods

Impact to traffic flow is anticipated to be minimal

Temporary road closures where conveyance crosses service road



Basewide RI/FS Addendum at Sites 2 and 12 Update, February 2014

Completed

- Soil gas investigation at the Phase 1B proposed cinema site
 - Four soil borings and 28 soil gas probes installed
 - Soil, groundwater and soil gas samples collected for VOC analysis
 - All 28 probes over drilled and destroyed
- Soil Gas Investigation Report – Phase 1B Cinema
 - Final issued August 12, 2013
 - Letter from DTSC dated August 26, 2013 states comments provided on the draft report were adequately addressed and DTSC has no comments on the final.
- Basewide RI/FS Addendum at Sites 2/12 Work Plan
 - Final issued September 13, 2013
 - Includes QAPP and Site Specific Health and Safety Plan
- Field Work
 - 18 borings, 125 soil gas probes installed and sampled
 - 15 monitoring wells installed and profiled
 - 25 indoor air samples collected
 - 25 sub-slab samples collected
 - 137 soil samples collected
- Letter reports summarizing indoor air and sub-slab analytical data sent to Target and Shea Properties on November 15, 2013
- Pilot Study Work Plan – draft issued February 25, 2014 for regulatory agency/public review; comments requested by March 27, 2014

Upcoming

- Data Gap Investigation Technical Memorandum
- Pilot study system construction in April 2014
- Data gap investigation field work in April – May 2014

Attachments

- Soil gas model update
- Pilot study summary

Sites 2/12 RI/FS Addendum Soil Gas Model 2.0

GMS Software Version 9.0.3

Inverse Distance Weighted Gradient
Plane and Kriging Models

DRAFT

Model Development

Inverse Distance Weighted (IDW) and Kriging Interpolation used to model PCE and TCE soil gas plume extents. For IDW:

- Interpolated plane is a weighted average of soil gas data points
 - Weight of each point is inversely proportional to its distance from point x
 - The further away the point the lesser its weight in defining the value at point x
- “Bull’s eye” effect that may not be representative
- Best for interpolation of high density or regularly spaced points
- Several options available for IDW, but stayed with Gradient Plane Nodal Functions for Round 2 of modeling (best results from Round 1)

Kriging:

- Assigns weights according to a data-driven weighting function rather than an arbitrary function
- Compensates for effects of data clustering by assigning individual points within a cluster less weight than isolated data points (treats clusters more like single points)
- Two types of Kriging:
 - Simple Kriging (produced unusable results)
 - Ordinary Kriging (produced results most similar to hand-drawn contours)

DRAFT

Model Development

Boundary conditions added to model for Round 2:

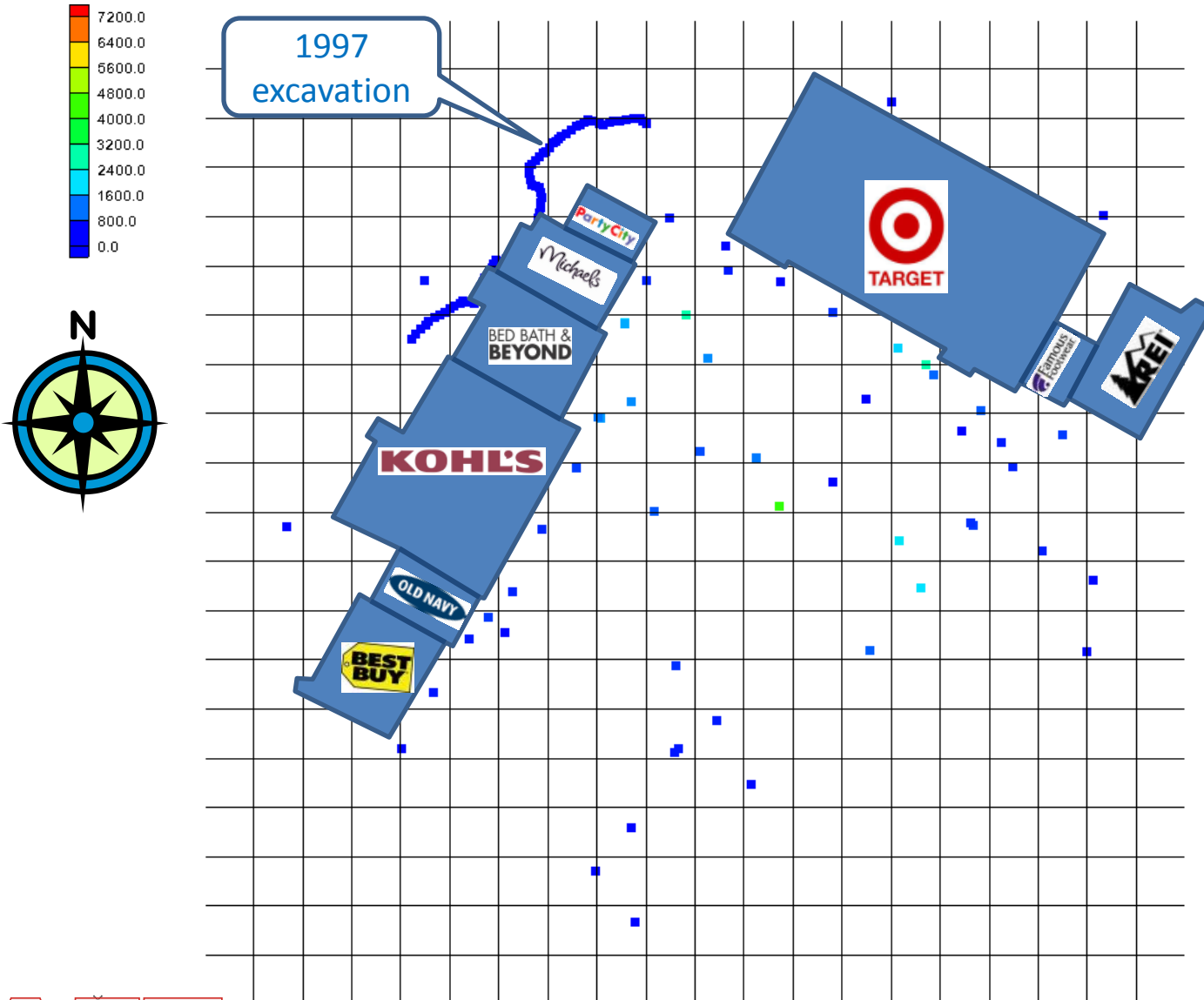
- Northwestern wall of excavation from 1997 Lower Meadow soil remediation activities (to 35 feet bgs)
- Analytical results for PCE and TCE from specific temporary 5-foot probes completed by USACE were extrapolated to 70 feet bgs based on arbitrary cut-off of $100 \mu\text{g}/\text{m}^3$ (FOO-S212-SG-1, -3, -6, -19, -26, -27, -38)

For each method, GMS allowed use of 32 closest data points or 64 closest data points for interpolation algorithms. With boundary conditions imposed:

- IDW with 64 closest points appeared to provide a better interpretation than 32 closest points (i.e., “over-interpolation” minimized)
- There was no observable difference between Kriging results using either 32 or 64 closest points

DRAFT

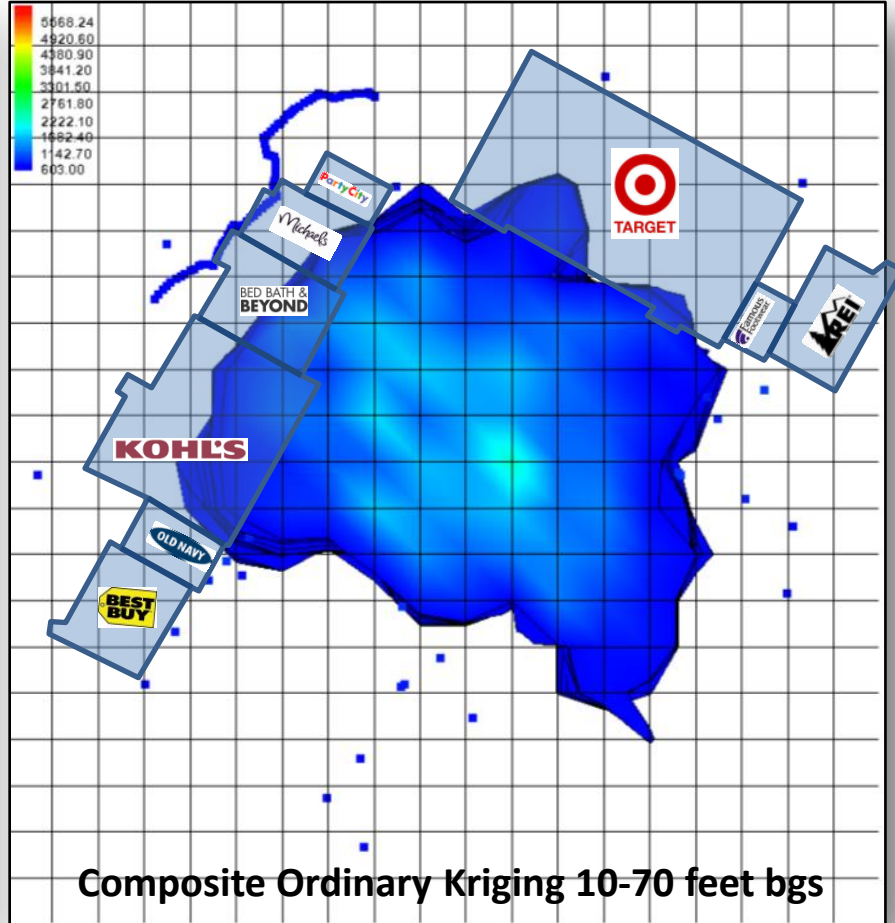
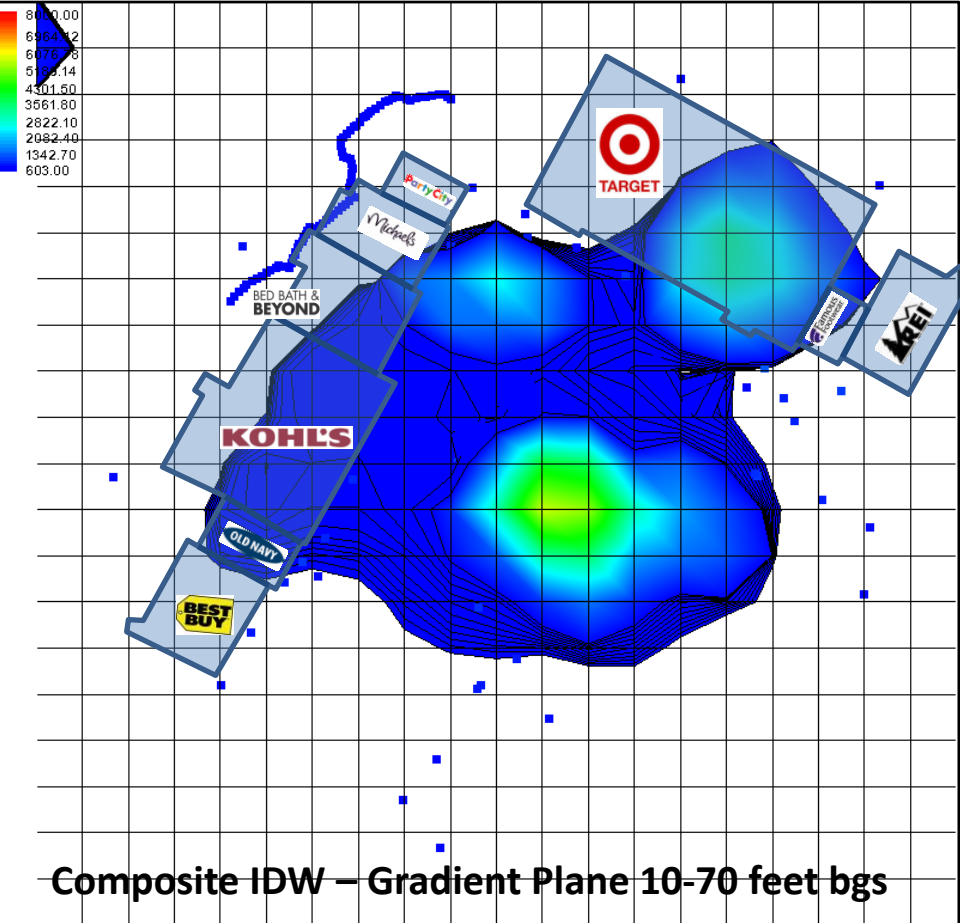
Soil gas probe locations. PCE concentration ranges are color coded.



DRAFT

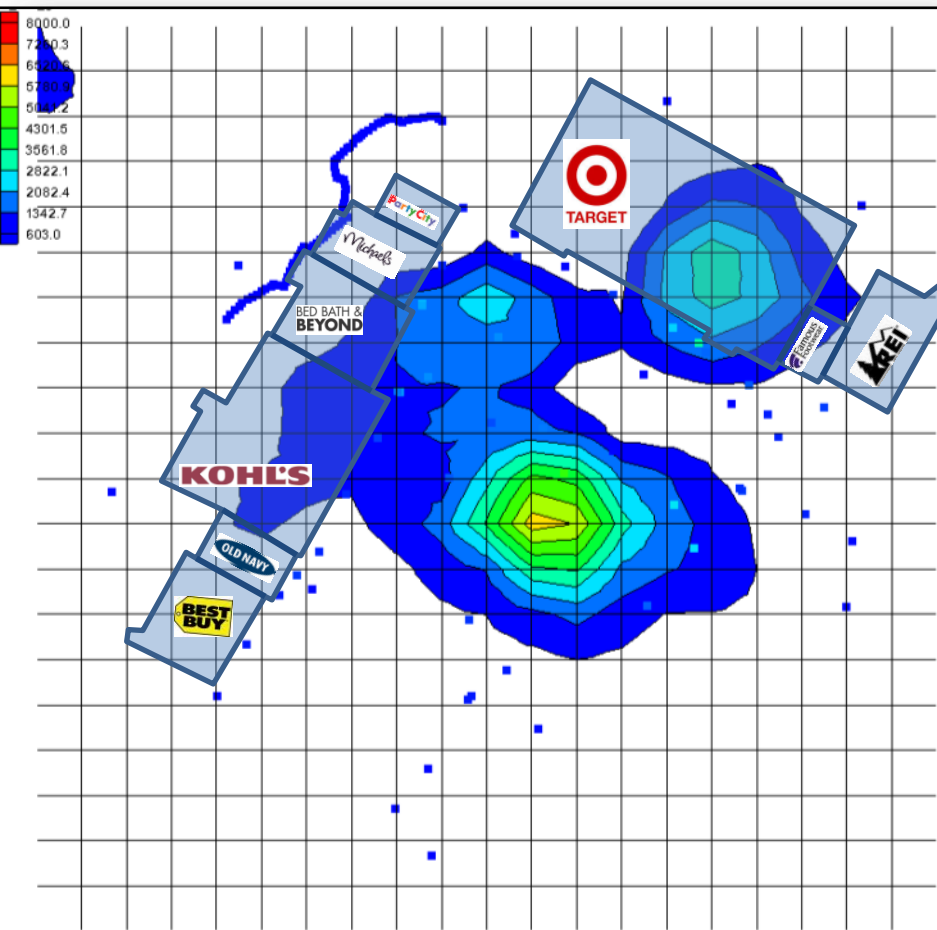
IDW – Gradient Plane model of the PCE plume with 64 nearest points used for computation of interpolation weights and nodal function coefficients. 603 $\mu\text{g}/\text{m}^3$ is the outer limit.

Ordinary Kriging model of the PCE plume with 32 nearest points used for semivariogram computation. 603 $\mu\text{g}/\text{m}^3$ is the outer limit.

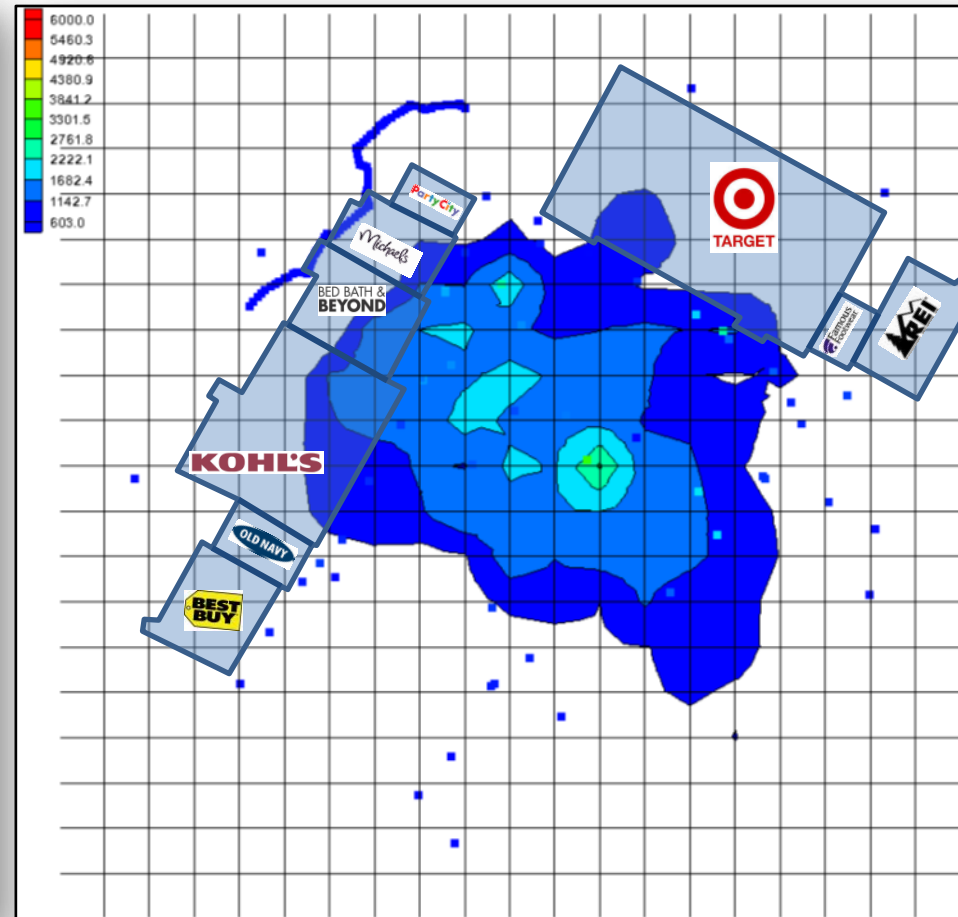


DRAFT

PCE at 20 feet below ground surface (bgs) contoured with 603 $\mu\text{g}/\text{m}^3$ as the outer limit.



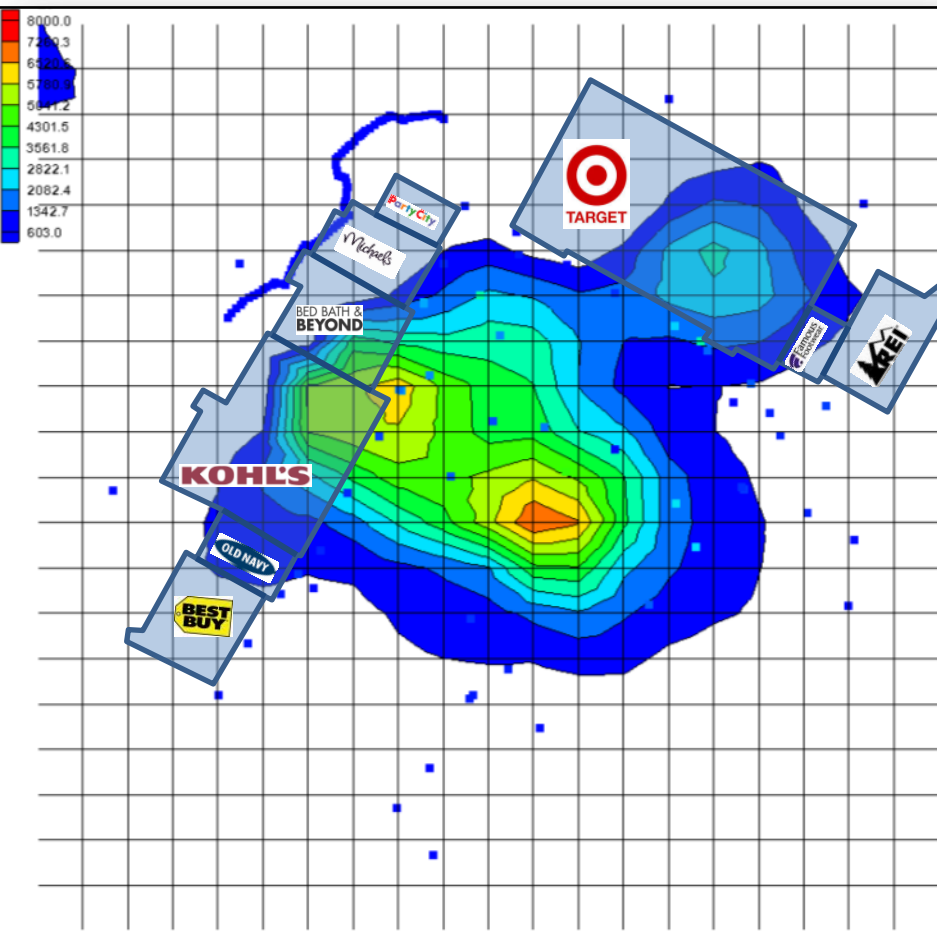
IDW – Gradient Plane



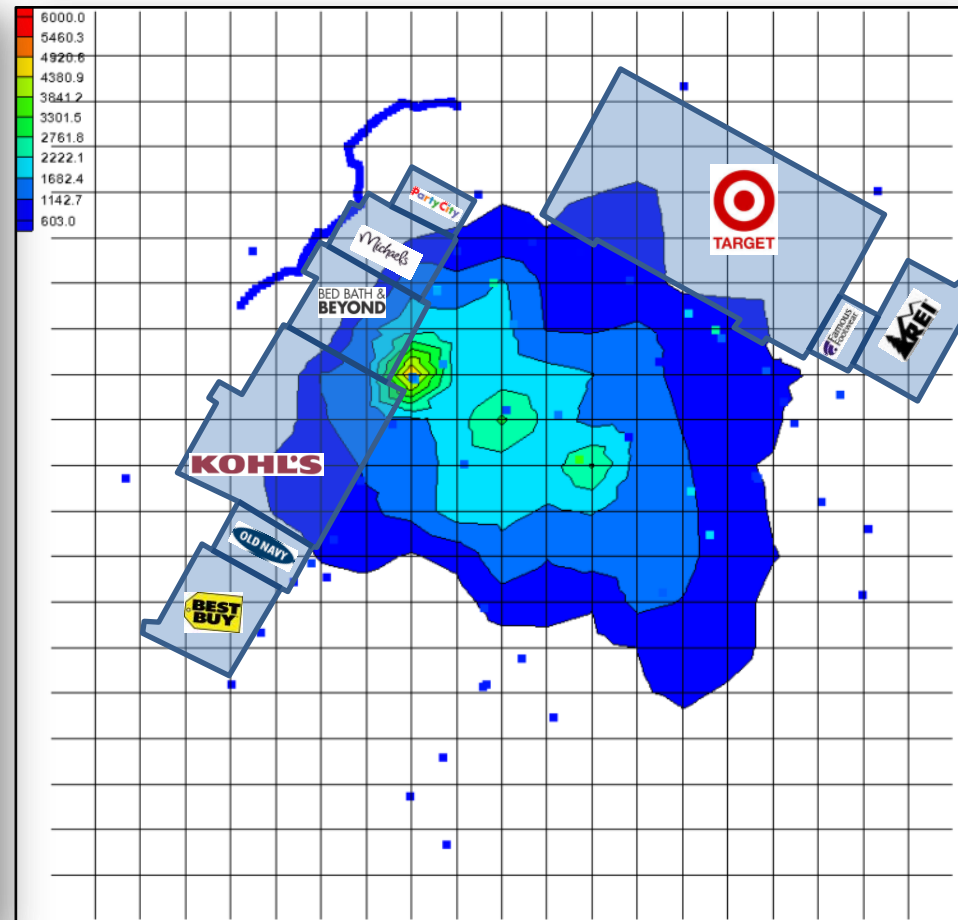
Ordinary Kriging

DRAFT

PCE at 70 feet bgs contoured with 603 $\mu\text{g}/\text{m}^3$ as the outer limit.



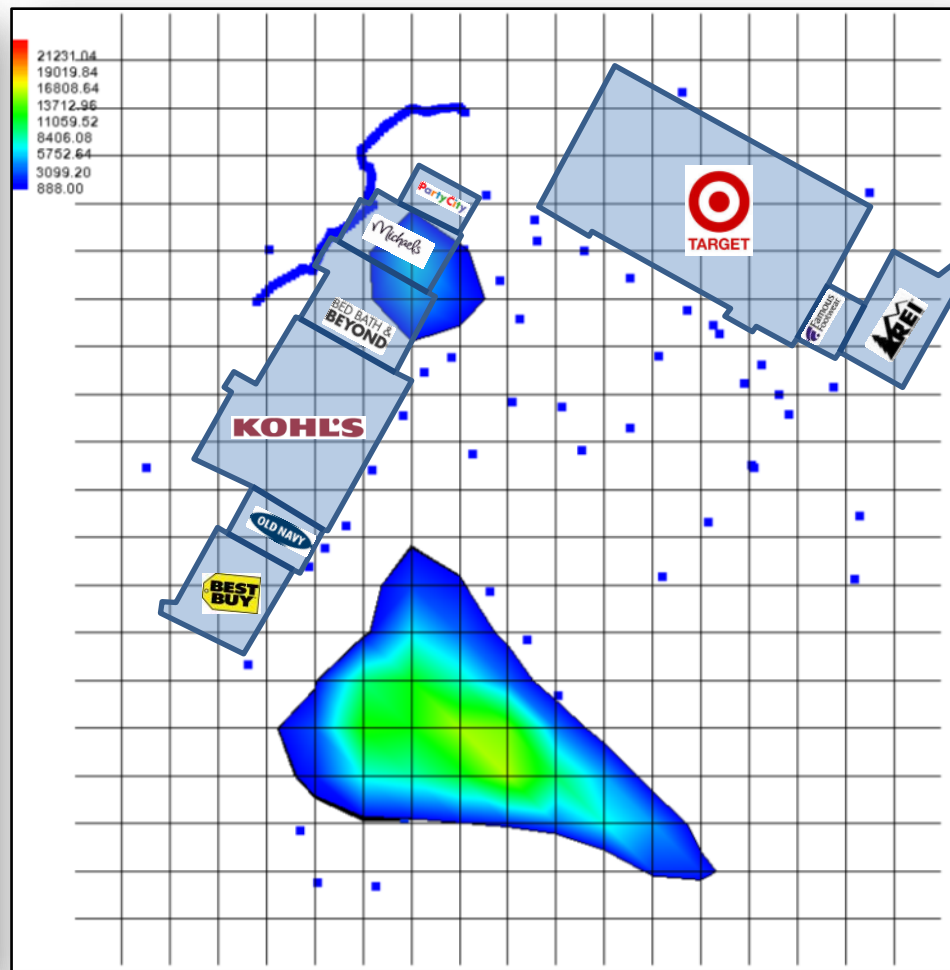
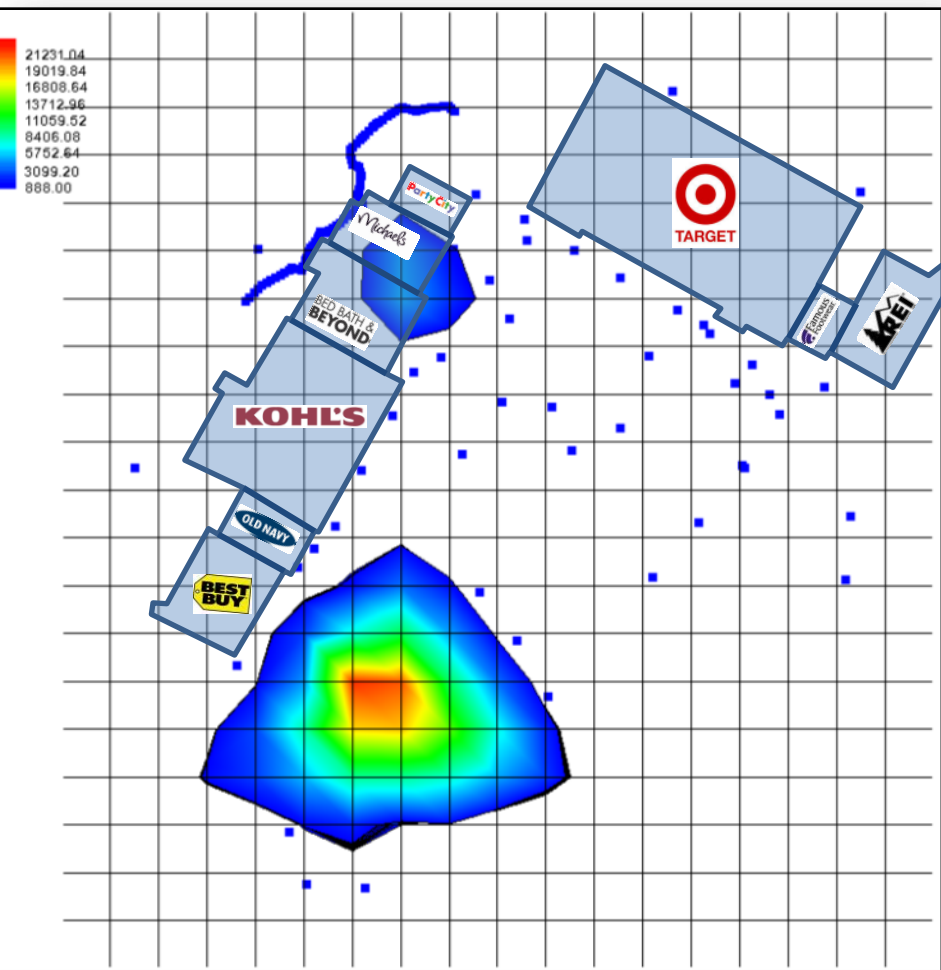
IDW – Gradient Plane



Ordinary Kriging

DRAFT

Composite View 10-70 feet bgs IDW – Gradient Plane model of the TCE plume with 888 $\mu\text{g}/\text{m}^3$ as the outer limit



64 nearest points used for computation of interpolation weights and nodal function coefficients.

32 nearest points used for computation of interpolation weights and nodal function coefficients.

DRAFT

February 2014 HTW BCT
Deliverable Schedule

	A	B	C	D	E	F	G	H	I
1	Issue Year	Site	Document Title	Version	Issue Date	DocGroup	DocType	Author Org	Notes
2	2014	OU2	OU2 Groundwater Treatment Plant Relocation Design	FINAL	<u>31-Jan-14</u>	Secondary	External	ITSI Gilbane	Received
3	2014	RI Sites	Pilot Study Work Plan, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	PREDRAFT	<u>3-Feb-14</u>	Secondary	Internal	Ahtna	Received
4	2014	OU2	Annual Report, 2012, Operations and Maintenance, Operable Unit 2 Landfills, Former Fort Ord, California	FINAL	<u>6-Feb-14</u>	Secondary	External	ITSI Gilbane	Received
5	2014	OU1	Well Destruction and Former OU1 Treatment Plant Decommissioning Work Plan, Former Fort Ord, California	DRAFT	<u>13-Feb-14</u>	Secondary	External	HydroGeoLogic, Inc.	Received
6	2014	RI Sites	Pilot Study Work Plan, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT	<u>24-Feb-14</u>	Secondary	External	Ahtna	Received
7	2014	Basewide	2013 Habitat Restoration and Monitoring Report, Non-Remediated Areas, Fort Ord Dunes State Park (Formerly Site 3), Former Fort Ord, California	DRAFT FINAL	28-Feb-14	Secondary	External	California State Parks	
8	2014	Basewide	Quality Assurance Project Plan, Superfund Response Actions, Former Fort Ord, California, Volume 1, Groundwater, Appendix A (Revision 2)	FINAL	28-Feb-14	Secondary	External	Ahtna	
9	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigation, Units 4, 11, and 12, Former Fort Ord, California	DRAFT FINAL	28-Feb-14	Secondary	External	ITSI Gilbane	
10	2014	Basewide	Annual Report of Quarterly Monitoring, October 2012 through September 2013, Groundwater Monitoring Program, Sites 2 and 12, OU2, OUCTP, and OU1 Off-Site	PREDRAFT	3-Mar-14	Secondary	Internal	Ahtna / AMEC	
11	2014	RI Sites	Remedial Action Completion Report, Site 39 Inland Ranges Habitat Reserve, Former Fort Ord, California	DRAFT FINAL	14-Mar-14	Primary	External	ITSI Gilbane	
12	2014	OU1	Uniform Federal Policy Quality Assurance Project Plan Groundwater Monitoring and Operations and Maintenance of Treatment System at OU-1 Former Fort Ord, California	DRAFT	14-Mar-14	Primary	External	HydroGeoLogic, Inc.	New Date
13	2014	Basewide	2013 Habitat Restoration and Monitoring Report, Non-Remediated Areas, Fort Ord Dunes State Park (Formerly Site 3), Former Fort Ord, California	FINAL	31-Mar-14	Secondary	External	California State Parks	
14	2014	OU2	Quality Assurance Project Plan, Superfund Response Actions, Former Fort Ord, California, Volume 3, OU2 Landfill, Appendix A (TTU)	DRAFT	31-Mar-14	Secondary	External	ITSI Gilbane	
15	2014	Basewide	Report of Quarterly Monitoring, Fourth Quarter 2013, Groundwater Monitoring Program, Sites 2 and 12, OU2, and OUCTP	FINAL	31-Mar-14	Secondary	External	Ahtna / AMEC	
16	2014	Basewide	Technical Memorandum Evaluation of Lead Concentrations at Selected Sites, Former Fort Ord, California	DRAFT FINAL	31-Mar-14	Secondary	External	ITSI Gilbane	
17	2014	RI Sites	Technical Memorandum - Data Gap Investigation, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	PREDRAFT	March 2014	Secondary	Internal	Ahtna	New Date; Immediately issue upon the award of the contract mod
18	2014	RI Sites	Pilot Study Work Plan, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT FINAL	2-Apr-14	Secondary	External	Ahtna	
19	2014	Basewide	Annual Report of Quarterly Monitoring, October 2012 through September 2013, Groundwater Monitoring Program, Sites 2 and 12, OU2, OUCTP, and OU1 Off-Site	DRAFT	4-Apr-14	Secondary	External	Ahtna / AMEC	
20	2014	OU1	2013 Annual and Third Quarter Groundwater Monitoring Report, Operable Unit 1, Fritzsche Army Airfield Fire Drill Area, Former Fort Ord, CA	DRAFT FINAL	6-Apr-14	Secondary	External	HydroGeoLogic, Inc.	New Date
21	2014	OU1	Well Destruction and Former OU1 Treatment Plant Decommissioning Work Plan, Former Fort Ord, California	DRAFT FINAL	11-Apr-14	Secondary	External	HydroGeoLogic, Inc.	New Date
22	2014	OU2	Construction QC and QA Report, OU2 Landfills, Area E Phase 1	DRAFT	14-Apr-14	Primary	External	ITSI Gilbane	
23	2014	Basewide	Technical Memorandum Evaluation of Lead Concentrations at Selected Sites, Former Fort Ord, California	FINAL	30-Apr-14	Secondary	External	ITSI Gilbane	
24	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigation, Units 4, 11, and 12, Former Fort Ord, California	FINAL	30-Apr-14	Secondary	External	ITSI Gilbane	
25	2014	RI Sites	Technical Memorandum - Data Gap Investigation, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT	April 2014	Secondary	External	Ahtna	New Date
26	2014	OU1	2013 Annual and Third Quarter Groundwater Monitoring Report, Operable Unit 1, Fritzsche Army Airfield Fire Drill Area, Former Fort Ord, CA	FINAL	7-May-14	Secondary	External	HydroGeoLogic, Inc.	New Date
27	2014	OU1	Well Destruction and Former OU1 Treatment Plant Decommissioning Work Plan, Former Fort Ord, California	FINAL	23-May-14	Secondary	External	HydroGeoLogic, Inc.	New Date
28	2014	OU1	Uniform Federal Policy Quality Assurance Project Plan Groundwater Monitoring and Operations and Maintenance of Treatment System at OU-1 Former Fort Ord, California	DRAFT FINAL	30-May-14	Primary	External	HydroGeoLogic, Inc.	New Date

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29	2014	OU2	Quality Assurance Project Plan, Superfund Response Actions, Former Fort Ord, California, Volume 3, OU2 Landfill, Appendix A (TTU)	DRAFT FINAL	31-May-14	Secondary	External	ITSI Gilbane	
30	2014	RI Sites	Technical Memorandum - Data Gap Investigation, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT FINAL	May 2014	Secondary	External	Ahtna	New Date
31	2014	RI Sites	Remedial Action Completion Report, Site 39 Inland Ranges Habitat Reserve, Former Fort Ord, California	FINAL	14-Jun-14	Primary	External	ITSI Gilbane	
32	2014	OU1	2014 Semi Annual Groundwater Monitoring Report, Operable Unit 1, Fritzsche Army Airfield Fire Drill Area, Former Fort Ord, CA	FINAL	20-Jun-14	Secondary	External	HydroGeoLogic, Inc.	
33	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	PREDRAFT	26-Jun-14	Primary	Internal	Ahtna	
34	2014	OU1	Uniform Federal Policy Quality Assurance Project Plan Groundwater Monitoring and Operations and Maintenance of Treatment System at OU-1 Former Fort Ord, California	FINAL	30-Jun-14	Primary	External	HydroGeoLogic, Inc.	New Date
35	2014	Basewide	Annual Report of Quarterly Monitoring, October 2012 through September 2013, Groundwater Monitoring Program, Sites 2 and 12, OU2, OU2TP, and OU1 Off-Site	DRAFT FINAL	1-Jul-14	Secondary	External	Ahtna / AMEC	
36	2014	OU2	Construction QC and QA Report, OU2 Landfills, Area E Phase 1	DRAFT FINAL	14-Jul-14	Primary	External	ITSI Gilbane	
37	2014	OU2	Annual Report, 2013, Operations and Maintenance, Operable Unit 2 Landfills, Former Fort Ord, California	FINAL	31-Jul-14	Secondary	External	ITSI Gilbane	
38	2014	OU2	Quality Assurance Project Plan, Superfund Response Actions, Former Fort Ord, California, Volume 3, OU2 Landfill, Appendix A (TTU)	FINAL	31-Jul-14	Secondary	External	ITSI Gilbane	
39	2014	Basewide	Report of Quarterly Monitoring, First Quarter 2014, Groundwater Monitoring Program, Sites 2 and 12, OU2, and OU2TP	FINAL	31-Jul-14	Secondary	External	Ahtna / AMEC	
40	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Units 7, 10, 33, Former Fort Ord, California	DRAFT	31-Jul-14	Secondary	External	ITSI Gilbane	
41	2014	OU1	Well Destruction and Former OU-1 Treatment Plant Decommissioning Completion Report Former Fort Ord, California	DRAFT	4-Aug-14	Secondary	External	HydroGeoLogic, Inc.	New Date
42	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT	11-Aug-14	Primary	External	Ahtna	
43	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Watkins Gate Burn Area, Former Fort Ord, California	DRAFT	31-Aug-14	Secondary	External	ITSI Gilbane	
44	2014	OU2	Construction QC and QA Report, OU2 Landfills, Area E Phase 1	FINAL	14-Sep-14	Primary	External	ITSI Gilbane	
45	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Units 7, 10, 33, Former Fort Ord, California	DRAFT FINAL	30-Sep-14	Secondary	External	ITSI Gilbane	
46	2014	OU1	Well Destruction and Former OU-1 Treatment Plant Decommissioning Completion Report Former Fort Ord, California	DRAFT FINAL	30-Sep-14	Secondary	External	HydroGeoLogic, Inc.	New Date
47	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT FINAL	24-Oct-14	Primary	External	Ahtna	
48	2014	Basewide	Report of Quarterly Monitoring, Second Quarter 2014, Groundwater Monitoring Program, Sites 2 and 12, OU2, and OU2TP	FINAL	31-Oct-14	Secondary	External	Ahtna / AMEC	
49	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Units 7, 10, 33, Former Fort Ord, California	FINAL	31-Oct-14	Secondary	External	ITSI Gilbane	
50	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Watkins Gate Burn Area, Former Fort Ord, California	DRAFT FINAL	31-Oct-14	Secondary	External	ITSI Gilbane	
51	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	FINAL	3-Dec-14	Primary	External	Ahtna	
52	2014	Basewide	Analysis of the 2013 Community Survey and 2013-2014 Community Outreach Program, Fort Ord, California	DRAFT	30-Dec-14	Secondary	External	Fort Ord BRAC	

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9	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	PREDRAFT	26-Jun-14	Primary	Internal	Ahtna	
10	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT	11-Aug-14	Primary	External	Ahtna	
11	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	DRAFT FINAL	24-Oct-14	Primary	External	Ahtna	
12	2014	RI Sites	Report, Remedial Investigation/Feasibility Study Addendum at Sites 2 and 12	FINAL	3-Dec-14	Primary	External	Ahtna	
13	2014	Basewide	Annual Report of Quarterly Monitoring, October 2012 through September 2013, Groundwater Monitoring Program, Sites 2 and 12, OU2, OUCTP, and OU1 Off-Site	PREDRAFT	3-Mar-14	Secondary	Internal	Ahtna / AMEC	
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17	2014	Basewide	Report of Quarterly Monitoring, First Quarter 2014, Groundwater Monitoring Program, Sites 2 and 12, OU2, and OUCTP	FINAL	31-Jul-14	Secondary	External	Ahtna / AMEC	
18	2014	Basewide	Report of Quarterly Monitoring, Second Quarter 2014, Groundwater Monitoring Program, Sites 2 and 12, OU2, and OUCTP	FINAL	31-Oct-14	Secondary	External	Ahtna / AMEC	
19	2014	Basewide	2013 Habitat Restoration and Monitoring Report, Non-Remediated Areas, Fort Ord Dunes State Park (Formerly Site 3), Former Fort Ord, California	DRAFT FINAL	28-Feb-14	Secondary	External	California State Parks	
20	2014	Basewide	2013 Habitat Restoration and Monitoring Report, Non-Remediated Areas, Fort Ord Dunes State Park (Formerly Site 3), Former Fort Ord, California	FINAL	31-Mar-14	Secondary	External	California State Parks	
21	2014	Basewide	Analysis of the 2013 Community Survey and 2013-2014 Community Outreach Program, Fort Ord, California	DRAFT	30-Dec-14	Secondary	External	Fort Ord BRAC	
22	2014	OU1	2013 Annual and Third Quarter Groundwater Monitoring Report, Operable Unit 1, Fritzsche Army Airfield Fire Drill Area, Former Fort Ord, CA	DRAFT FINAL	6-Apr-14	Secondary	External	HydroGeoLogic, Inc.	New Date
23	2014	OU1	2013 Annual and Third Quarter Groundwater Monitoring Report, Operable Unit 1, Fritzsche Army Airfield Fire Drill Area, Former Fort Ord, CA	FINAL	7-May-14	Secondary	External	HydroGeoLogic, Inc.	New Date
24	2014	OU1	2014 Semi Annual Groundwater Monitoring Report, Operable Unit 1, Fritzsche Army Airfield Fire Drill Area, Former Fort Ord, CA	FINAL	20-Jun-14	Secondary	External	HydroGeoLogic, Inc.	
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26	2014	OU1	Uniform Federal Policy Quality Assurance Project Plan Groundwater Monitoring and Operations and Maintenance of Treatment System at OU-1 Former Fort Ord, California	DRAFT FINAL	30-May-14	Primary	External	HydroGeoLogic, Inc.	New Date
27	2014	OU1	Uniform Federal Policy Quality Assurance Project Plan Groundwater Monitoring and Operations and Maintenance of Treatment System at OU-1 Former Fort Ord, California	FINAL	30-Jun-14	Primary	External	HydroGeoLogic, Inc.	New Date
28	2014	OU1	Well Destruction and Former OU1 Treatment Plant Decommissioning Work Plan, Former Fort Ord, California	DRAFT	<u>13-Feb-14</u>	Secondary	External	HydroGeoLogic, Inc.	Received
29	2014	OU1	Well Destruction and Former OU1 Treatment Plant Decommissioning Work Plan, Former Fort Ord, California	DRAFT FINAL	11-Apr-14	Secondary	External	HydroGeoLogic, Inc.	New Date
30	2014	OU1	Well Destruction and Former OU1 Treatment Plant Decommissioning Work Plan, Former Fort Ord, California	FINAL	23-May-14	Secondary	External	HydroGeoLogic, Inc.	New Date
31	2014	OU1	Well Destruction and Former OU-1 Treatment Plant Decommissioning Completion Report Former Fort Ord, California	DRAFT	4-Aug-14	Secondary	External	HydroGeoLogic, Inc.	New Date
32	2014	OU1	Well Destruction and Former OU-1 Treatment Plant Decommissioning Completion Report Former Fort Ord, California	DRAFT FINAL	30-Sep-14	Secondary	External	HydroGeoLogic, Inc.	New Date
33	2014	OU2	OU2 Groundwater Treatment Plant Relocation Design	FINAL	<u>31-Jan-14</u>	Secondary	External	ITSI Gilbane	Received
34	2014	OU2	Annual Report, 2012, Operations and Maintenance, Operable Unit 2 Landfills, Former Fort Ord, California	FINAL	<u>6-Feb-14</u>	Secondary	External	ITSI Gilbane	Received
35	2014	OU2	Annual Report, 2013, Operations and Maintenance, Operable Unit 2 Landfills, Former Fort Ord, California	FINAL	31-Jul-14	Secondary	External	ITSI Gilbane	
36	2014	OU2	Construction QC and QA Report, OU2 Landfills, Area E Phase 1	DRAFT	14-Apr-14	Primary	External	ITSI Gilbane	
37	2014	OU2	Construction QC and QA Report, OU2 Landfills, Area E Phase 1	DRAFT FINAL	14-Jul-14	Primary	External	ITSI Gilbane	
38	2014	OU2	Construction QC and QA Report, OU2 Landfills, Area E Phase 1	FINAL	14-Sep-14	Primary	External	ITSI Gilbane	
39	2014	OU2	Quality Assurance Project Plan, Superfund Response Actions, Former Fort Ord, California, Volume 3, OU2 Landfill, Appendix A (TTU)	DRAFT	31-Mar-14	Secondary	External	ITSI Gilbane	
40	2014	OU2	Quality Assurance Project Plan, Superfund Response Actions, Former Fort Ord, California, Volume 3, OU2 Landfill, Appendix A (TTU)	DRAFT FINAL	31-May-14	Secondary	External	ITSI Gilbane	
41	2014	OU2	Quality Assurance Project Plan, Superfund Response Actions, Former Fort Ord, California, Volume 3, OU2 Landfill, Appendix A (TTU)	FINAL	31-Jul-14	Secondary	External	ITSI Gilbane	
42	2014	RI Sites	Remedial Action Completion Report, Site 39 Inland Ranges Habitat Reserve, Former Fort Ord, California	DRAFT FINAL	14-Mar-14	Primary	External	ITSI Gilbane	
43	2014	RI Sites	Remedial Action Completion Report, Site 39 Inland Ranges Habitat Reserve, Former Fort Ord, California	FINAL	14-Jun-14	Primary	External	ITSI Gilbane	
44	2014	Basewide	Technical Memorandum Evaluation of Lead Concentrations at Selected Sites, Former Fort Ord, California	DRAFT FINAL	31-Mar-14	Secondary	External	ITSI Gilbane	
45	2014	Basewide	Technical Memorandum Evaluation of Lead Concentrations at Selected Sites, Former Fort Ord, California	FINAL	30-Apr-14	Secondary	External	ITSI Gilbane	
46	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigation, Units 4, 11, and 12, Former Fort Ord, California	DRAFT FINAL	28-Feb-14	Secondary	External	ITSI Gilbane	
47	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigation, Units 4, 11, and 12, Former Fort Ord, California	FINAL	30-Apr-14	Secondary	External	ITSI Gilbane	
48	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Units 7, 10, 33, Former Fort Ord, California	DRAFT	31-Jul-14	Secondary	External	ITSI Gilbane	
49	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Units 7, 10, 33, Former Fort Ord, California	DRAFT FINAL	30-Sep-14	Secondary	External	ITSI Gilbane	
50	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Units 7, 10, 33, Former Fort Ord, California	FINAL	31-Oct-14	Secondary	External	ITSI Gilbane	
51	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Watkins Gate Burn Area, Former Fort Ord, California	DRAFT	31-Aug-14	Secondary	External	ITSI Gilbane	
52	2014	RI Sites	Technical Memorandum, Basewide Range Assessment Investigations, Watkins Gate Burn Area, Former Fort Ord, California	DRAFT FINAL	31-Oct-14	Secondary	External	ITSI Gilbane	