

FINAL
NAVAL AIR STATION ALAMEDA RESTORATION ADVISORY BOARD
MEETING SUMMARY

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Building 1, Suite 140, Community Conference Center
Alameda Point
Alameda, California

December 6, 2007

The following participants attended the meeting:

Co-Chairs:

George Humphreys	Restoration Advisory Board (RAB) Community Co-chair
Thomas Macchiarella	Base Realignment and Closure (BRAC) Program Management Office (PMO) West, BRAC Environmental Coordinator (BEC), Navy Co-chair

Attendees:

Jim Barse	Community Member
Anna-Marie Cook	U.S. Environmental Protection Agency (EPA)
Tommie Jean Damrel	Tetra Tech EM Inc.
Doug DeLong	BRAC PMO West, Environmental Compliance Manager
Fred Hoffman	Community member
Michelle Hurst	Navy BRAC PMO West Remedial Project Manager (RPM)
John Kaiser	San Francisco Bay Regional Water Quality Control Board (Water Board)
Jeff Knoth	RAB
Joan Konrad	RAB
Dot Lofstrom	California Environmental Protection Agency (Cal/EPA) Department of Toxic Substances Control (DTSC)
Frank Matarrese	Alameda City Council
John McMillan	Shaw Environmental
Kurt Peterson	RAB
Peter Russell	Russell Resources/City of Alameda
Stan Schiffman	Community member/Alameda County Medical Center Trustee
Dale Smith	RAB/Sierra Club/Audubon Society

Jean Sweeney	RAB
Jim Sweeney	RAB
Michael John Torrey	RAB/Housing Authority of the City
Kent Weingardt	Tetra Tech EC Inc.
John West	Water Board
Jessica Woloshun	Sullivan International Group, Inc. (Sullivan)

The meeting agenda is provided in Attachment A.

MEETING SUMMARY

I. Approval of Minutes

Mr. Humphreys called the meeting to order at 6:36 p.m. and distributed a list of documents and correspondence he received during November 2007. The list is provided as Attachment B-1.

Mr. Humphreys provided the following comments:

- Page 4 of 11, last paragraph, the first sentence will be revised from “Mr. Humphreys mentioned that the report prepared by Neptune and Company assumed that birds and fish were present only 10 percent of the time,” to “Mr. Humphreys mentioned that the report prepared by Battelle and Neptune and Company assumed that birds and fish were present only 10 percent of the time.”
- Page 4 of 11, last paragraph, the fourth sentence will be revised from “Mr. Humphreys recalled that the report assumed numerous site-use factors even though the area is small,” to “Mr. Humphreys said that cleanup levels for Seaplane Lagoon will set a precedent for the cleanup of Navy shoreline sites, such as IR Sites 1 and 2, along the estuary, as well as for private polluters.”
- Page 4 of 11, last paragraph, ninth sentence will be revised from “Mr. Humphreys said that he does not agree with the use of the site-use factors in a broad bay-wide area because the factors are assumed,” to “Mr. Humphreys said that he does not agree with the use of the site-use factors in a broad bay-wide area because the least terns will forage for their chicks within reasonably close proximity to their nests.”
- Page 10 of 11, fifth paragraph, second sentence, “Mr. Humphreys said that his concern was directed toward Area 1A and said that the Navy excavated essentially a quarter of the contaminated area,” will be revised to “Mr. Humphreys said that his concern was directed toward Area 1A and said essentially a quarter of the material excavated by trenching was radioactively contaminated.”

- Page 10 of 11, fifth paragraph, third sentence, “He said it is reasonable to assume that the area that the Navy has not excavated is deeply contaminated,” will be revised to “He said it is reasonable to that assume that the portion of Area 1A that the Navy has not excavated is similarly contaminated with radioactivity.”

Ms. Smith provided the following comment:

- Page 7 of 11, fourth paragraph, third sentence, “Mr. Macchiarella agreed it is a maritime dolphin,” will be revised to “Mr. Macchiarella stated it is a maritime dolphin.”
- Page 9 of 11, third sentence, “Ms. Smith confirmed that the equipment would freeze the rainwater,” will be revised to “Mr. Weingardt confirmed that the equipment would freeze the rainwater.”
- Each presenter should be identified with his or her full title at the beginning of a presentation in the minutes.

The minutes were approved as amended.

II. Co-Chair Announcements

Mr. Humphreys referred to his list of documents received (Attachment B-1) and noted that item six defined the petroleum site investigation area of concern (AOC) 23G, which is in the area of airplane runways. He asked if the petroleum pipelines under the runway has been sampled or excavated. Mr. Macchiarella responded that an answer to his question would be addressed in the Alameda Point petroleum program progress report that Mr. McMillan will present during the RAB meeting. Mr. Macchiarella said that petroleum pipelines or historical fuel lines are underground in corrective action area (CAA) A, which recently received concurrence for closeout from the Water Board and was one of Mr. West’s major projects. Mr. Macchiarella noted the “no further action” status site closeout for CAA A. He said the sampling plan is under way for the AOC 23 G. Mr. West announced his office has become paperless and he requested e-mail addresses for all RAB members. Mr. Humphreys requested a hard copy. Ms. Smith said there is an optional mailing list, and an updated list should be sent to all members.

Mr. Humphreys said that Jim Leach and Neil Coe were excused from the meeting.

Mr. Macchiarella announced that the January RAB meeting was changed from January 3, 2008, to January 10, 2008.

Mr. Macchiarella announced the scheduled election for community co-chair. Mr. Macchiarella said Mr. James D. Leach, RAB (not present), declined his nomination for co-chair because he is not available.

Mr. Macchiarella announced that the Fleet and Industrial Supply Center Oakland, Alameda Facility/Alameda Annex (FISCA), is under the cognizance of the Alameda Point RAB since the FISCA RAB dissolved and merged with the Alameda Point RAB. He said the developer for the property and the City of Alameda wanted to revise the land use plan to allow for residential use. The plan required additional cleanup to achieve the desired residential use. The developer and DTSC created a remedial action plan and risk assessment. DTSC is scheduled to notify the

community in January 2008 about an open forum meeting for the public to provide input on the remedial action plan for FISCA. Mr. Macchiarella said the intended plan is to excavate and surcharge, which means compact the soil for a clean zone in residential area and to implement additional institutional and engineering controls. He clarified that the developer and DTSC are working on the project and that the remedial action plan is not a Navy document.

Mr. Humphreys asked if FISCA was a National Priorities List (NPL) Superfund site.

Mr. Macchiarella said it is not a part of Alameda Point and is not on the National Priorities List (NPL).

Mrs. Sweeney thanked Mr. Macchiarella for his help in preparation of the presentation to the Alameda City Council regarding Mr. Ken Hansen and his role as former Community Co-Chair for FISCA RAB.

Mr. Macchiarella addressed comments during the previous meeting about asbestos and health and safety at IR Site 1. He said activities by the contractors during the excavations at Site 1 have not located any evidence of asbestos containing materials except for one asbestos containing pipe that was removed and disposed of accordingly. Mr. Macchiarella said data collected by the contractors confirmed adequate dust control measures and that the low levels of radium were not a threat to workers.

A question from a community member addressed the status of Kollman Circle. She identified herself as an Alameda resident and educator of children near Kollman Circle. Mr. Macchiarella said there are three activities ongoing near Kollman Circle: one, a pilot test in Operable Unit (OU)-5 on the groundwater plume; two, road paving; and three, the city is attempting to identify whether homeless providers, as well as public benefit conveyance parties, may be interested in obtaining the North Village Housing property. Mr. Macchiarella said the City is seeking users for the property because the U.S. Coast Guard needed only a small portion of the property. The OU-5 pilot test will contribute design data for the site to a final design for a full-scale system. Kollman Circle was a suitable location for the pilot test. The road paving portion of the plan is routine roadway pavement maintenance. The community member asked if the property is habitable and also about the scheduled timeline for the project. Mr. Macchiarella said the property is habitable but he could not answer the question about the timeline for the City of Alameda to identify a suitable use for the property. Mr. Macchiarella is aware that the City of Alameda and Navy are no longer advancing into an interim lease for the North Housing property.

III. Summary of Progress in 2007 and Planned Milestones for 2008

Mr. Macchiarella presented a summary of the Alameda Point environmental progress in 2007 and planned milestones for 2008 (Attachment B-2). He explained that the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) process is a stepwise approach; many documents are created to complete the CERCLA process, and there is a document for each step before the targeted cleanup initiative begins. Mr. Macchiarella noted the completed CERCLA documentation for 2007, as well as the amount of acres each document covered to characterize how many acres of the property are advancing (Slides 2 through 4). He identified the 2007 calendar year deliverables sorted by the following types:

- Slide 5, remedial investigations (RI)

- Slide 6, feasibility studies (FS)
- Slide 7, proposed plans (PP) and record of decisions (ROD)
- Slide 8, site investigations (SI)
- Slide 9, time critical removal actions (TCRA)
- Slide 10, sampling plans
- Slide 11 and 12, miscellaneous deliverables
- Slide 13, remedial design and pilot testing

Mr. Macchiarella highlighted the IR Site 35 draft final RI/FS report from March (Slide 5). He said that IR Site 35 was a large property and a significant milestone. Ms. Sweeney asked if a revised schedule had been slowed down for IR Site 35 because she knew that it was previously accelerated but is no longer. Mr. Macchiarella responded that the Site Management Plan (SMP) is based on standard review periods at this point. He said that a slowed review schedule occurs when the Navy and regulatory agencies (EPA, DTSC, and Water Board) agree on an extension, which most frequently happens when they are overwhelmed with report reviews.

Mr. Macchiarella identified the three final SI reports completed: Western Bayside — Breakwater Beach, final SI in October; Economic Development Conveyance (EDC) Parcel 12, final SI in October; and EDC 17 final SI in September (Slide 8).

Mr. Macchiarella identified some miscellaneous deliverables, including the industrial waste treatment plant (IWTP) 360 closure summary report (Slide 10). He said only one Resource Conservation and Recovery Act (RCRA) regulated unit remains to be closed.

Mr. Macchiarella mentioned the IR Site 17 remedial design and announced that a fact sheet regarding the Sites 5 and 10 TCRA was distributed to nearby tenants. Ms. Smith asked if the RAB received a copy of the fact sheet. He said the same information in the fact sheet was previously presented to the RAB. Mr. Macchiarella said that the fact sheet was geared toward individuals who had not previously been informed via the RAB. Ms. Smith said the RAB should receive a copy. Mr. Macchiarella said he would distribute the fact sheet to the RAB.

Following up on the fact sheet discussion, Mr. Peterson asked if the Navy provided workshops for community members. Mr. Macchiarella responded that the Navy provides meetings for Proposed Plans. Mr. Peterson suggested an additional meeting aside from the formal RAB meeting for community members. Mr. Macchiarella suggested attaching a reminder of the RAB meetings onto each fact sheet. Mr. Macchiarella said he would consider all suggestions and respond in the future.

Mr. Macchiarella announced that 51 out of 87 total documents were primary documents sent to the RAB and the regulatory agencies to describe work done in 2007.

Mr. Macchiarella identified key cleanup items (Slides 15 through 16). Approximately 120 discrete radiological source items and approximately 15 tons of unexploded ordnance (UXO) 5X (inert) scrap were recovered and disposed for the removal action at Sites 1, 2, and 32. He also mentioned a bench test of metals immobilization compound (MIC). In addition, he mentioned the electrical resistance heating (ERH), also known as six-phase heating, at IR Site 5. He said

the RAB toured the site when the first of three ERH operational stages at Plume 5-3 began and the results of each stage were analyzed (Slide 16). Mr. Macchiarella described the in-situ chemical oxidation (ISCO) pilot tests at IR Site 14 and IR Site 26 (Slide 16).

Mr. Macchiarella continued to describe key cleanup items and results of ERH treatment, which lasted 9 months at IR Site 4 (Slide 17). He also mentioned the bench tests at IR Site 4, which were previously presented by Mr. Steve Peck (Navy); he added that the associated pilot testing is scheduled to commence in January 2008.

Mr. Peterson asked about the goal for contaminant concentrations in groundwater at IR Site 4. Mr. Macchiarella said that the treatment action was not a final remedial action, but instead was an interim removal action with a goal of 10,000 micrograms per liter ($\mu\text{g/L}$). The treatment was intended to be a quick and aggressive approach to reduce contaminant concentrations. In this case, groundwater concentrations were reduced from 400,000 $\mu\text{g/L}$ to less than 1,400 $\mu\text{g/L}$; the system removed more than 150 pounds of chemicals of concern (COC). A community member asked what major COC were removed. Mr. Macchiarella said the major COC included chlorinated solvents; he believes the resistant COC was 1,1-dichloroethane (1,1, DCA) or 1,1-dichloroethene (1,1, DCE), but he will confirm this COC for IR Site 4 in the future.

Mr. Macchiarella identified a slide from the 2007 planned major milestones presented in December 2006 (Slide 18). He said many of the documents the Navy planned to finalize in 2007 were completed.

Ms. Konrad asked if IR Site 2 was cleaned up, and Mr. Macchiarella responded that the landfill will continue to be addressed and that the remedial phase is scheduled for completion in March 2012.

Mr. Macchiarella presented the planned projects for 2008 at Alameda Point. A final amendment to the site management plan (SMP) was finalized in September 2007, and site schedules are continuously updated as necessary between the Navy and the regulatory agencies. He said about 60 primary documents scheduled for calendar year 2008. Noteworthy planned milestones include IR Site 17 remedial action initiation; final OU-2A FS; IR Site 1 and 27 final ROD; as well as proposed plan and public meeting for IR Site 31, 20, 35.

IV. Progress Report on the Alameda Point Petroleum Program

Dr. John McMillan, Ph.D., P.E., Project Manager, Shaw Environmental, presented a progress report on the Alameda Point petroleum program (Attachment B-3). He acknowledged Ms. Hurst, the Navy RPM.

Dr. McMillan introduced and identified specific features and buildings of CAA 3A, 3B, and 3C (Slides 2 and 3). Dr. McMillan identified the approximate extent of total petroleum hydrocarbons (TPH) in soil and groundwater from CAA 3A, 3B, and 3C in April and August 2007 (Slides 3 and 4). He said the extent of the TPH contamination surrounded the approximate location of a fuel pipeline break. He also mentioned that storm sewers are located throughout the site and are considered paths to the bay. Dr. McMillan said that NEESA (Naval Energy and

Environmental Support Activity) estimated 365,000 gallons of petroleum inventory was spilled over two decades, but the correlation of this amount to the conditions at CAA 3 is not clear. [Note that the NEESA 1983 Initial Assessment Study of NAS Alameda says, "Supply Fuels Branch personnel estimate that up to 365,000 gallons of AVGAS may have leaked to the shallow groundwater in Area 97 in the 1960's and early 1970's, based on the amount of AVGAS lost from storage tanks."]. Ms. Konrad asked about the location of CAA 4C (the Exchange Service Station Annex) in comparison to CAA 3, and Dr. McMillan responded that CAA 4C was east of Central just north of Pacific. Ms. Sweeney asked about the treatment of soil and groundwater, and Dr. McMillan responded that dual vapor extraction (DVE) and biosparging were used at CAA 4C. He said there was no vapor loss to the surface because the biosparge system never ran without DVE being on. Dr. McMillan said that a pilot Chemox test was also run at CAA 4C, with peroxide being injected as the oxidant. Ms. Smith asked about the possibility of fuel pipelines at the main jet runways, and Dr. McMillan responded he is not familiar with that area, but said he thought all the fuel pipelines were removed or grouted in the Western Hangar tarmac area.

Dr. McMillan explained the current DVE system at CAA 3A, 3B, and 3C (Slides 5 through 7). He said the DVE system consists of extracting soil vapors through a series of extraction wells in conjunction with a dewatering system. The vapors were extracted by a high vacuum blower, which treats the petroleum vapors using a catalytic oxidizer before they are discharged to the atmosphere. Ms. Smith asked if carbon dioxide (CO₂) was released by the catalytic converter. Dr. McMillan responded that CO₂ is released when hydrocarbons are oxidized and that catalytic oxidation (catox) units are used for moderate concentrations of soil vapor. In addition, the team is considering using a thermal oxidizer unit which allows the treatment of higher concentration vapor flows and thus allows an increased mass removal rate. Contaminated water from the dewatering system is treated with activated carbon before it is discharged to the publicly owned treatment works (POTW).

Dr. McMillan identified the approximate extent of TPH in groundwater in CAA C (Slide 10) and said that some of the contamination was a fairly pure aviation gasoline, which was tinted for identification. He explained the conceptual layout of the DVE with sparge system for CAA C (Slide 11). He said a work plan is scheduled to be delivered to the agencies by the end of December 2007 and construction is scheduled to begin in spring 2008. Mr. McMillan also said that field work is scheduled in 2008 at AOC-23G, which includes Buildings 71 and 332 (Slides 12 and 13).

Dr. McMillan showed the approximate extent of TPH in soil and groundwater for CAA 5B West (Slides 14 and 15).

Dr. McMillan showed the DVE and biosparging system configuration for CAA 4C (Slide 17). The cumulative mass of TPH recovered in the vapor phase was 52,000 pounds, which was mostly gasoline (Slide 18). He showed the pre-remediation and post-remediation concentrations of TPH for soil (Slide 19) and groundwater (Slide 20) at CAA 4C. Mr. Peterson asked about the depth of groundwater. Dr. McMillan responded that the groundwater is at a depth of 5 to 6 feet below ground surface (bgs) and that drawdown to a depth of 8 to 9 feet bgs was pursued with the DVE system.

Dr. McMillan concluded the presentation by explaining the upcoming field activities for the petroleum program (Slide 21).

V. RAB Community Co-Chair Election for 2008

Mr. Macchiarella announced the nominee list, which included Mr. Humphreys. He asked the RAB for other nominations for the community co-chair position, and there were no further nominations. Mr. Macchiarella called for a vote, and the RAB voted unanimously for Mr. Humphreys to continue his position as RAB community co-chair for 2008. Mr. Macchiarella thanked Mr. Humphreys for his participation with the RAB.

VI. Community and RAB Comment Period

Ms. Konrad reported that she attended the Alameda Reuse and Redevelopment Authority (ARRA) meeting on December 5, 2007. She said there was a Department of Veterans Affairs (VA) presentation on the VA's proposed plans for the federal-to-federal transfer (FED) parcels. She believes that the RAB would be interested in the issues presented and requested a discussion of the issues during the RAB meetings. Mr. Torrey said many of the topics discussed were cleanup issues and asked about the VA and ARRA plans. Mr. Macchiarella said a federal to federal transfer of land is proposed. He said that IR Site 33 is minor and IR Site 2 is prominent within the FED parcel. Mr. Macchiarella said the VA and Navy are working on an agreement for the environmental responsibilities. The current thought is that long-term management of the remedy for the sites would be taken by the VA after the Navy achieves remedy implementation. Mr. Macchiarella said the Navy would fulfill the remediation objectives and then hand over responsibility for maintenance to the VA. Mr. Macchiarella said a columbarium or other feature is proposed. Ms. Konrad asked who would assume responsibility for maintenance. Mr. Macchiarella gave two examples: first, if the remediation objective includes a biosparging system, the Navy will install, run, and hand over the responsibility to the VA; or, if the remediation objective includes a landfill, the Navy will cap or cover and then transfer responsibility to the VA. Mr. Macchiarella said the ARRA normally decides reuse, but not in the case of FED parcels. Mr. Macchiarella said the Navy does not decide future land use and that a planning process is needed to make decisions. Mr. Macchiarella said that the objective of the RAB is to focus on environmental cleanup, and not on planning issues.

Mrs. Sweeney said the City of Alameda accepted applications for homeless groups for the north housing parcel. Mr. Torrey said the city considered leasing on a short-term basis, but agreed to long-term leasing. Mr. Macchiarella said that, although he did not know the details, it was not included in the surplus determination.

Mr. Matarrese expressed three areas of concern with the ARRA meeting. First, he was concerned with how the environmental cleanup of Site 2 would be completed. Second, he was concerned with competition between a privately operated VA hospital and the City of Alameda hospital. Lastly, he was concerned with who would cover the infrastructure cost. In addition, Mr. Matarrese announced a public workshop on December 13, 2007, hosted by SunCal, the

master developer, to discuss transportation and the future use of land that is currently undergoing the cleanup process

VII. RAB Meeting Adjournment

The meeting was adjourned at 8:21 PM.

ATTACHMENT A

**NAVAL AIR STATION ALAMEDA
RESTORATION ADVISORY BOARD MEETING AGENDA
December 6, 2007**

(One Page)

RESTORATION ADVISORY BOARD

NAVAL AIR STATION, ALAMEDA

AGENDA

DECEMBER 6, 2007, 6:30 – 8:00 PM

ALAMEDA POINT – BUILDING 1 – SUITE 140

COMMUNITY CONFERENCE ROOM

(FROM PARKING LOT ON W MIDWAY AVE, ENTER THROUGH MIDDLE WING)

<u>TIME</u>	<u>SUBJECT</u>	<u>PRESENTER</u>
6:30 - 6:40	Approval of Minutes	Mr. George Humphreys
6:40 - 6:50	Co-Chair Announcements	Co-Chairs
6:50 – 7:05	Summary of Progress in 2007 and Planned Milestones for 2008	Mr. Thomas Macchiarella
7:05 – 7:30	Petroleum Program Update	Mr. John McMillan
7:30 – 7:40	Vote for Community Co-chair	Mr. Thomas Macchiarella
7:40 – 8:00	Community & RAB Comment Period	Community & RAB
8:00	RAB Meeting Adjournment	
8:00 – 8:30	Informal Discussions and Holiday Party*	All

*** RAB Members: Bring your favorite small potluck item if you wish!**

ATTACHMENT B

NAVAL AIR STATION ALAMEDA RESTORATION ADVISORY BOARD MEETING HANDOUT MATERIALS

- B-1 List of Reports and Correspondence Received during November 2007, distributed by George Humphreys, RAB Community Co-Chair (1 page)
- B-2 Summary of Progress in 2007 and Planned Milestones for 2008, presented by Mr. Thomas Macchiarella, Navy (11 pages)
- B-3 A Progress Report on the Alameda Point Petroleum Program, presented by Dr. John McMillan, Shaw (11 pages)

ATTACHMENT B-1

**List of Reports and Correspondence Received during November 2007
(1 page)**

Restoration Advisory Board
List of Document and Correspondence
Received during November 2007

Reports

1. November 2, 2007, "In Situ Chemical Oxidation Pilot Test Workplan, Appendix J, Preliminary Remedial Design Draft Remedial Action Workplan Installation Restoration Site 26, Alameda Point, Alameda, California", prepared by Innovative Technical Solutions, Inc. for BRAC Program Management Office West.
2. October 17, 2007 (Received Nov. 16, 2007), "Final Work Plan SCAPS Laser Induced Fluorescence Tarry Refinery Waste Investigation, Former Oil Refinery, Alameda Point, Alameda, California", prepared by Richard Brady & Associates for BRAC Program Management Office West.
3. November 19, 2007, "Draft, Data Gap Sampling Investigation Report, Installation Restoration Site 28, Alameda Point, Alameda, California", prepared by Innovative Technical Solutions, Inc. for BRAC Program Management Office West.
4. November 20, 2007, "Draft, Remedial Investigation Addendum for IR Site 30, Alameda Point, Alameda, California", prepared by Bechtel Environmental, Inc. for BRAC Program Management Office West.
5. November 28, 2007, "Draft, Feasibility Study Report for IR Site 24, Alameda Point, Alameda, California", prepared by Bechtel Environmental, Inc. for BRAC Program Management Office West.
6. November 28, 2007, "Draft, Project Plans, Petroleum Site Investigation AOC 23G, Alameda Point, Alameda, California", prepared by Shaw Environmental Inc. for BRAC Program Management Office West..

Correspondence

1. November 27, 2007, "Final Site Inspection Report, Transfer Parcel Economic Development Conveyance (EDC)-17, Alameda Point, Alameda County, California, October 10, 2007", letter from Ms. Dot Lofstrom, P. G., DTSC, to Mr. Thomas L. Macchiarella, BRAC Program Office West.

ATTACHMENT B-2

**Summary of Progress in 2007 and Planned Milestones for 2008
(11 pages)**

2007 at a Glance

Environmental Progress at Alameda Point

Thomas L. Macchiarella
Alameda BRAC Environmental Coordinator
December 6, 2007

Completed CERCLA Documentation

- Final Site Investigations: 3 SIs, 86 acres
- Final Remedial Investigation Workplans:
1 Operable Unit, 25 acres
- Final Remedial Investigations: 5 Sites, 487
acres

Completed CERCLA Documentation **BRAC**
(continued) **PMO WEST**

- Final Feasibility Studies: 1 Site, 359 acres
- Draft Proposed Plans to agencies:
 - 3 PPs, 431 acres
- Final RODs: 4 Sites, 147 acres

Completed CERCLA Documentation **BRAC**
(continued) **PMO WEST**

- Final Datagap & Pre-Design Workplans:
 - 4 Sites
 - 4 OUs
 - Sites + OUs = 258 acres
- Final Pilot Test Workplans: 1 site, 32 acres
- Bench Tests applicable to multiple sites
- Remedial Design and/or RD/RAWP
 - 2 sites 142 acres

2007 Calendar Year Deliverables sorted by type -- RI



Sites 20,24: Draft RI Report, Feb
Site 32: Draft Final RI Report, Mar
Site 32, Final RI Report, Apr
Site 31: Draft Final Soil RI, Jul
Sites 20,24: Draft Final RI Report, Jul
Site 31: Final Soil RI Report, Aug
Sites 20,24: Final RI Report, Aug
Site 34: Draft RI Report, Sep
Site 30, Draft RI Addendum, Nov
Site 35, Draft Final RI/FS Report, Mar
Site 35: Final RI/FS Report, Apr

Site 2: Draft Final FS Report, Apr
Site 32, Draft Final FS Report, Jun
Site 24, Draft FS, Nov
Site 35, Draft Final RI/FS Report, Mar
Site 35: Final RI/FS Report, Apr
OU2C: Final Workplan Supplemental RI Sampling, May

2007 Calendar Year deliverables sorted by type -- FS



Site 2: Draft Final FS Report, Apr
Site 32, Draft Final FS Report, Jun
Site 24, Draft FS, Nov
Site 35, Draft Final RI/FS Report, Mar
Site 35: Final RI/FS Report, Apr

2007 Calendar Year deliverables sorted by type – PP & ROD



Site 35, Draft PP, Jul	Site 28: Draft ROD, Mar
Site 20, Draft PP, Oct	Site 1, Draft ROD, Apr
Site 31, Draft PP, Nov	Site 27, Draft ROD, Apr
	OU-1: Draft Final ROD, Apr
	OU5: Draft Final ROD, May
	Site 28: Draft Final ROD, Aug
	Site 25, Draft Final ROD, Aug
	OU5: Final ROD, Sep
	OU1: Final ROD, Oct
	Site 28: Final ROD, Oct
	Site 25: Final ROD, Oct

2007 Calendar Year deliverables sorted by type -- SI



Draft SI Western Bayside and Breakwater Beach, Mar
EDC 17 Draft Final SI Report, Aug
EDC 12, Draft Final SI Report, Aug
Draft Final Western Bayside and Breakwater Beach SI Report, Aug
Western Bayside and Breakwater Beach, Final SI, Oct
EDC 12, Final SI Report, Oct
EDC 17 Final SI Report, Sep

2007 Calendar Year Deliverables sorted by type -- TCRA



Sites 1,2,32: Draft Final TCRA Removal Action Workplan, Jan
Sites 1,2,32: Draft TCRA Final Workplan, Feb
Sites 1,2,32: Final TCRA Action Memo, Feb
Sites 5,10: Draft TCRA Workplan, May
Sites 5,10: Draft Action Memo, May
Sites 1,2,32: Final TCRA Workplan Addendum (Exploratory Trenching), Aug
Sites 1,2,32: Final TCRA Workplan, Mar

2007 Calendar Year deliverables sorted by type -- Sampling



Site 14: Draft Datagap Sampling Workplan, Jan
Site 28: Draft Datagap Sampling Workplan, Jan
Site 14: Draft Final Datagap Sampling Plan, Apr
Site 26: Draft Final Datagap Sampling Plan, Apr
Site 14: Final Datagap Sampling Workplan, Jun
Site 28, Final Workplan for Datagaps Sampling, Jun
Site 26: Final Datagap Sampling Report, Jul
OU1: Draft Final Datagap Sampling Workplan, Jul
Site 13: Draft Workplan for SCAPS, Jul
OU1: Final Datagap Sampling Workplan, Aug
OU 2A/2B: Datagap Sampling Workplan, Sep
OU2A/2B: Final Datagaps Workplan, Oct
Site 13, Final Workplan SCAPS, Nov
OU2B: Draft Tech Memo Subslab Soilgas, Aug
Sites 1, 2, 32: Radiological Survey Characterization Report, Sep

2007 Calendar Year deliverables sorted by type – Misc.



Site 28 Final Tech Memo, Jan
OU5: Final Pre-Design Workplan, May
IWTP 360: Revised Amendment to Closure Summary Report, Jan
Basewide: Draft Final Spring 2006 Annual Groundwater Monitoring Report, Jan
CAA: Draft SMP for CAAs 6&7, Feb
CAA: Final Field Action Reports for CAAs 6,7,13, Feb
OU2B: Final Implementation Memo for Bench Scale Test, Feb
CAA: Floating Product Investigation Report, CAAs 3A and 5B, Feb
CAA: Quarterly Tech Memo CAA 4C, Feb
CAA: Draft Project Plans, CAAs 3A, 2B, 3C, 5B west, 13 east, and C, Feb
Basewide: Final Spring 2006 Annual Groundwater Monitoring Report, Feb
Draft FOST PBC 1, Mar
CAA: Quarterly Tech Memo CAA 4C & Final ISCO WP Addendum, May

2007 Calendar Year deliverables sorted by type – Misc. (continued)



CAA: Final Project Plans CAA 3A, 3B, 3C, 5B west, 13 east, and C, May
IWTP 360: Certification of Closure, May
Final Historical Radiological Assessment, Jun
Draft Environmental Summary Document, Sites 31 and portion of Site 25, Jun
SMP: Draft Amendment, Jun
SMP: Draft Final Amendment, Aug
Site 14: Draft Pilot Test Workplan, Aug
Final Environmental Summary Document, Sites 31 and portion of Site 25, Aug
SMP: Final 2008 Amendment, Sep
Basewide: Spring 2007 Annual Groundwater Monitoring Report, Sep
Site 28: Final Bench Scale Test Workplan, Oct

**2007 Calendar Year deliverables
sorted by type Remedial Design & Pilot test**



Site 26: Preliminary Remedial Design/Remedial Action Workplan, Aug
Site 17, Preliminary Remedial Design, Oct
Fact Sheet to area residents -- OU-5 Pilot Test
Site 26, Draft Pilot Test Workplan, Sep
Site 26, Final Pilot Test Workplan

Summary of 2007 Documents



	<u>FY06</u>	<u>2007</u> <u>Calendar</u>
Total Docs	65	87
“Primary” Docs	53	51

Key “Cleanup” Items

- Sites 1, 2, 32: Approximately 120 discrete radiological source items were recovered, analyzed, and containerized for disposal
- Sites 1, 2, 32: Approximately 15 tons of “UXO 5X” scrap recovered and disposed (inert UXO)
- Site 28: Bench Test for Metals Immobilization Compound

Key “Cleanup” Items (continued)

- Site 5: The first of three ERH operational stages at Plume 5-3 was completed in February 2007, removing over 250 pounds of COCs and reducing groundwater concentrations from 100,000 µg/L to less than 400 µg/L.
- Site 14: In October 2007, two ISCO pilot tests were conducted. One test used potassium permanganate as the reagent. The other test used sodium persulfate as the reagent.
- Site 26: In November and December 2007, the first two of three planned ISCO injections were conducted to pilot test the use of modified Fenton's Reagent as the reagent.

Key “Cleanup” Items (continued)

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- Site 4: The ERH treatment duration was 9 months, with completion in July 2007. Greater than 150 pounds of COCs were removed and groundwater concentrations were reduced from 400,000 µg/L to less than 1,400 µg/L.
- Site 4: In July and September 2007, bench testing of nano-scale Zero Valent Iron (ZVI) was completed. Pilot testing will commence in January 2008.

FY07 Planned Major Milestones

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REPRINT

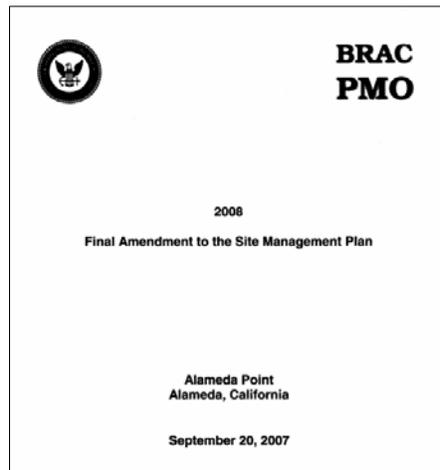
- Finalize 7 RODs. **We did 6.**
- Finalize 3 RIs, 2 or 3 FSES. **We did 4 RIs for 5 sites. We did 1 FS, 2nd is imminent.**
- 2 Action Memos. **We did 1. The 2nd is imminent.**
- 2 Final TCRA Workplans. **We did 1. The 2nd is nearly finalized. We also did 1 amendment (trenching).**
- Draft Remedial Action Workplans for 2 sites (1 will become Final). **We did 2 Drafts.**
- Final Remedial Designs for 2 Sites. **We did 2 Drafts.**
- Data gathering events at multiple sites. **Yes indeed.**
- 3 more Sis. **We did 3.**

Planned New Projects for 2008 at Alameda Point

Thomas L. Macchiarella
Alameda BRAC Environmental Coordinator
December 6, 2007

Site Management Plan for 2008

- Finalized in Sept, 2007
- Site schedules are continuously updated as necessary



Site Management Plan 2008 (continued)

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- About 60 primary docs planned for calendar 2008
- Noteworthy 2008 planned milestones:
 - Initiate remedial action at Site 17
 - Final OU-2A FS
 - Final ROD, Sites 1 & 27
 - Proposed Plan/Public Meetings for
 - Sites 31, 20, 35



ATTACHMENT B-3

**A Progress Report on the Alameda Point Petroleum Program
(11 pages)**



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A Progress Report on the Alameda Point Petroleum Program

Michelle Hurst
Remedial Project Manager
Alameda Point BRAC Team

John McMillan, Ph.D., P.E.
Project Manager
Shaw Environmental, Inc.

December 6, 2007

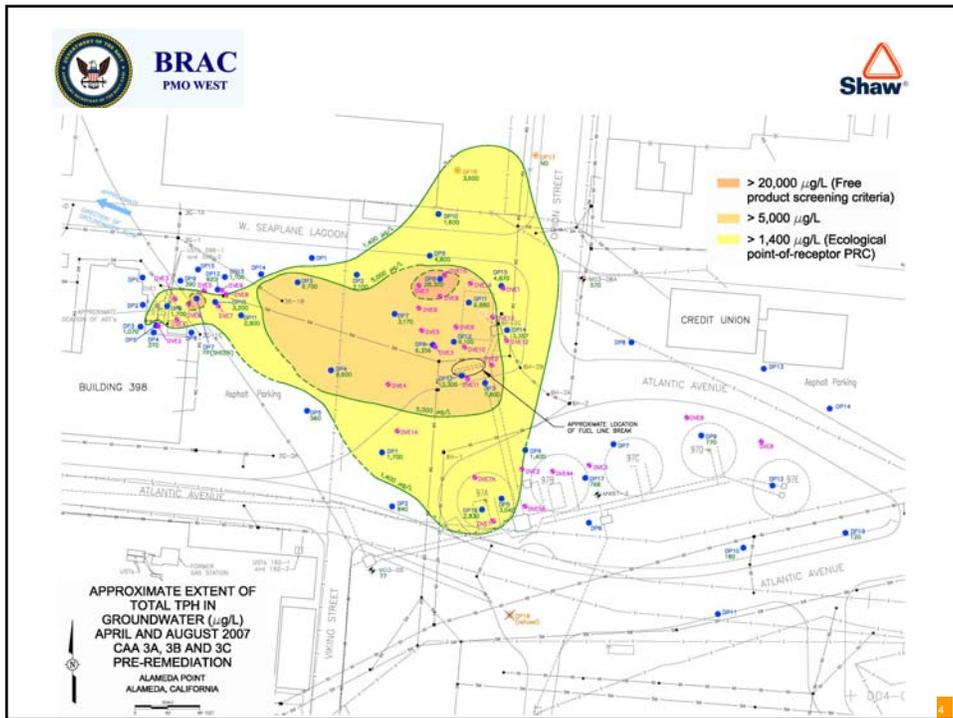
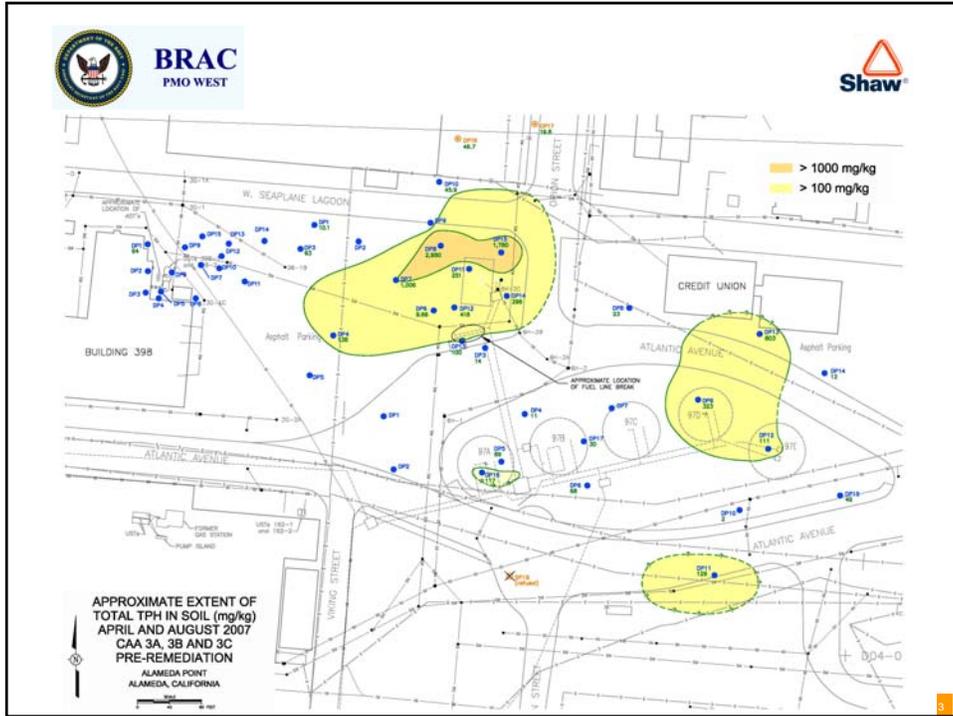
1



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2





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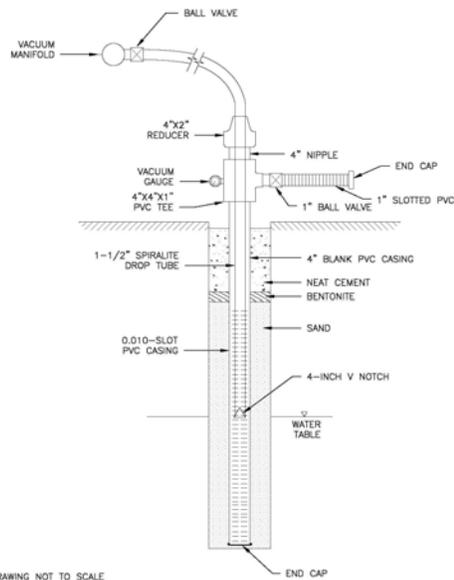
- Legend**
- Sample Point
 - Environmental Remediation Utility Area
 - Fence
 - Above Grade Piping Site 3A
 - Below Grade Piping Site 3A
 - Above Grade Piping Site 3B
 - Below Grade Piping Site 3B
 - Above Grade Piping Site 3C
 - Below Grade Piping Site 3C

Current DVE System at Site
CAA 3A, 3B, and 3C

6



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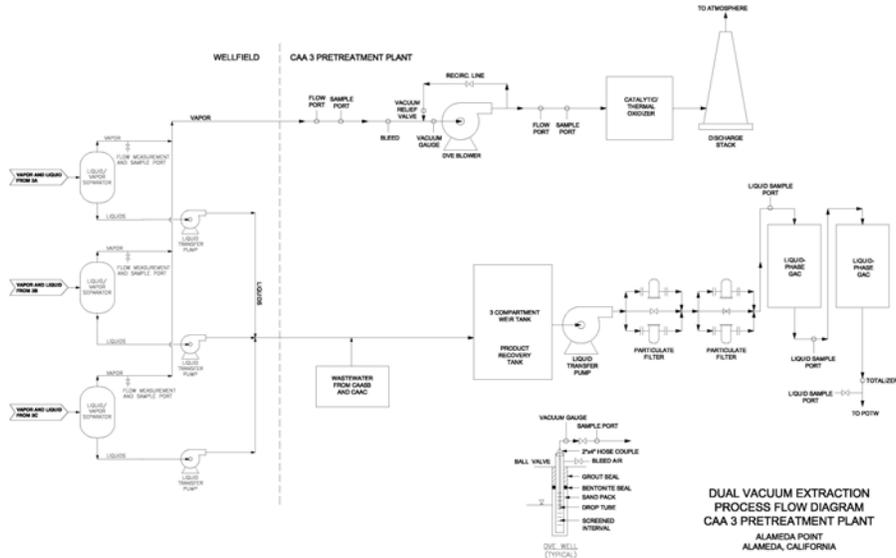
DVE WELL SCHEMATIC
ALAMEDA POINT
ALAMEDA, CALIFORNIA

DRAWING NOT TO SCALE

6



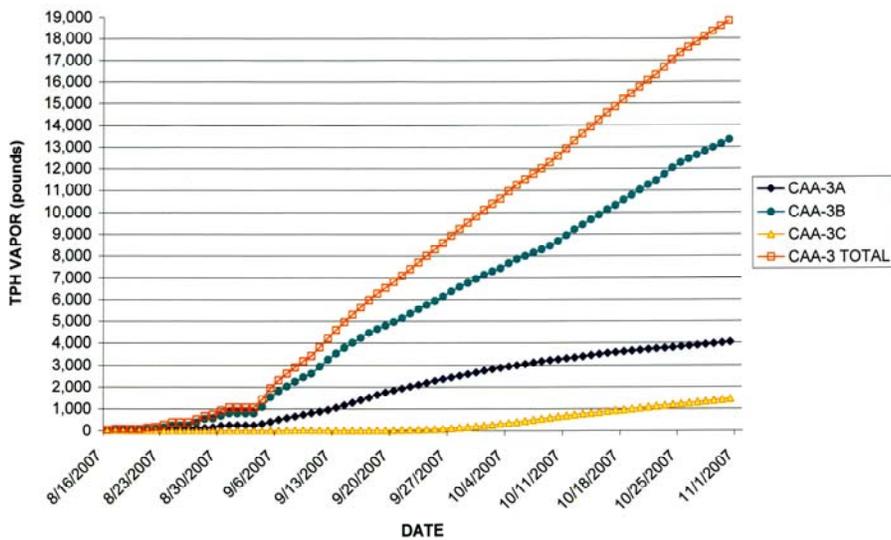
BRAC
PMO WEST

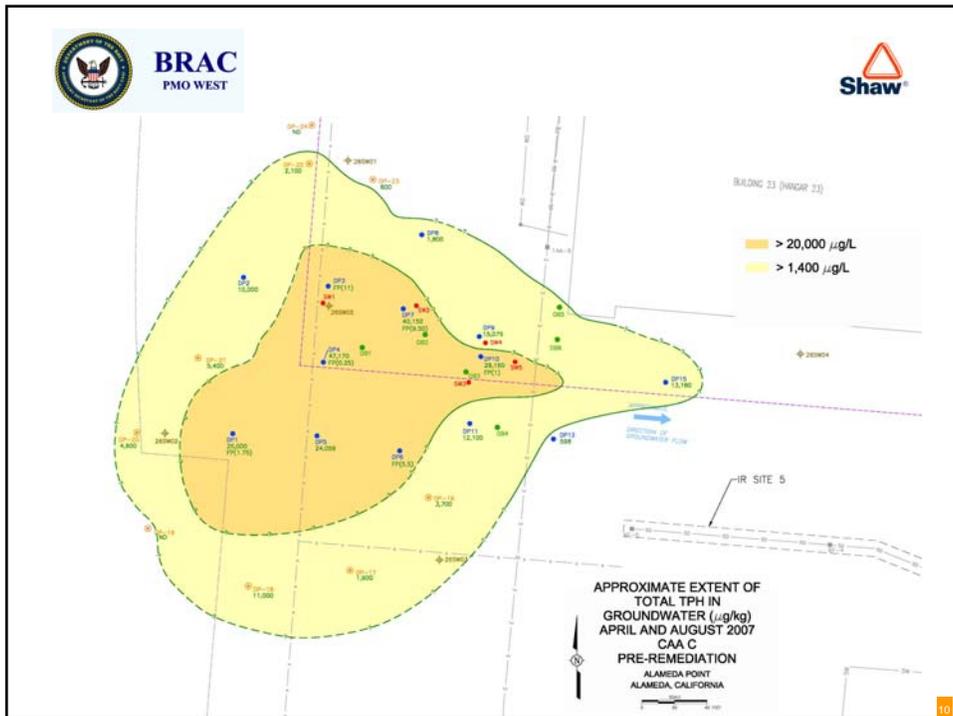
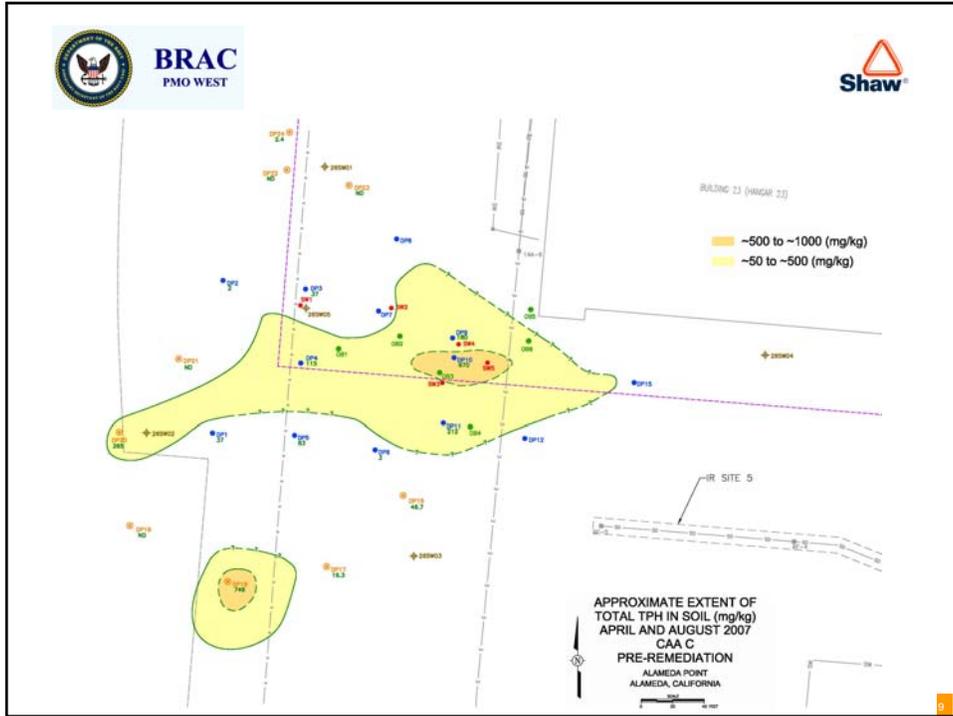


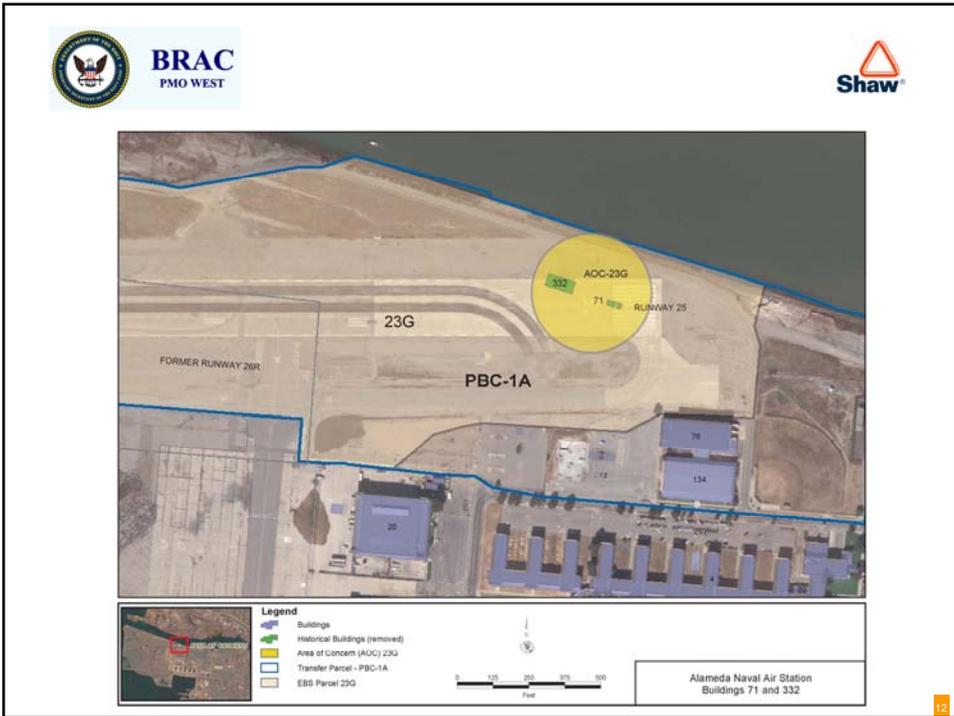
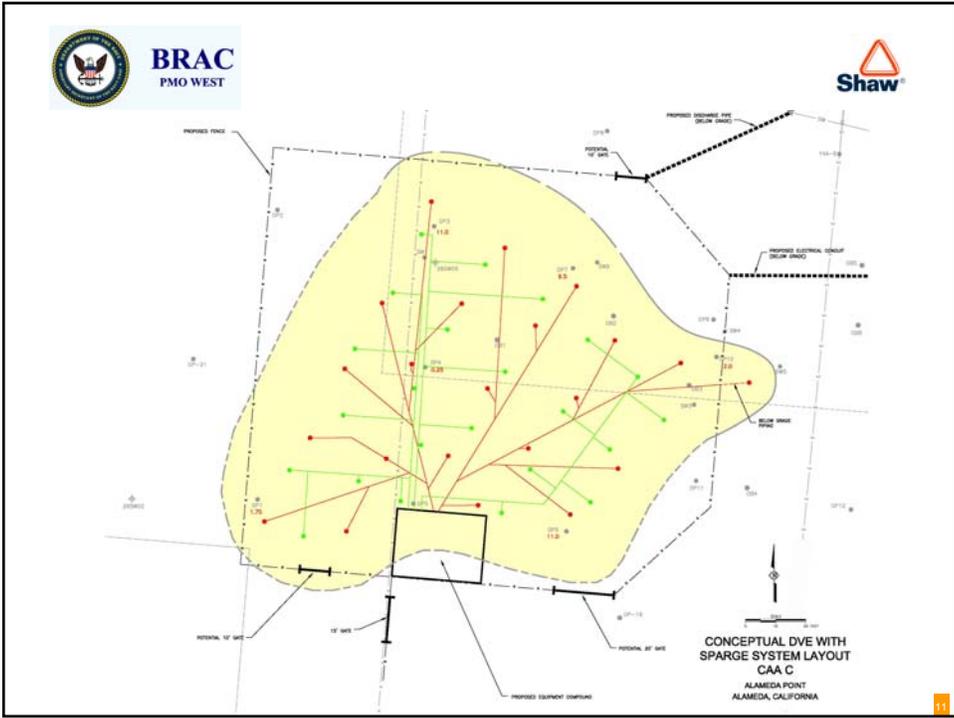
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CUMULATIVE MASS EXTRACTION CAA-3

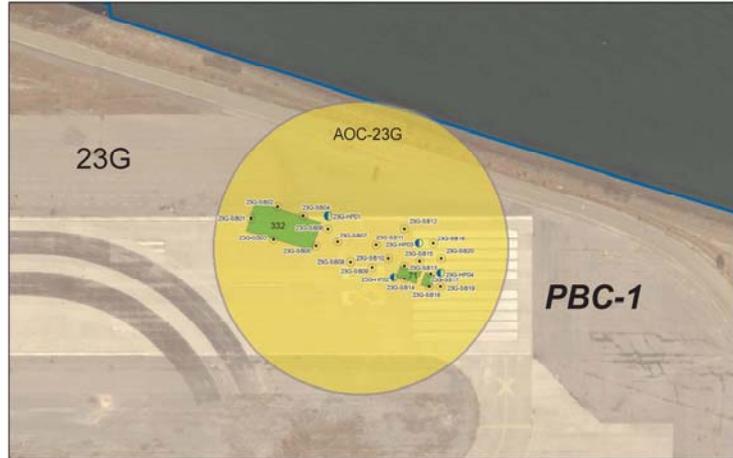








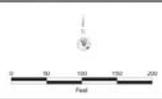
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Legend

- Proposed Phase I Soil Sample Location
- Proposed Phase I Hydrograph Sample Location
- Historical Buildings (present)

Note: Phase I sampling locations are the current extent of Phase I AOC. Phase II soil samples are not shown. Phase II groundwater sample locations are not shown.

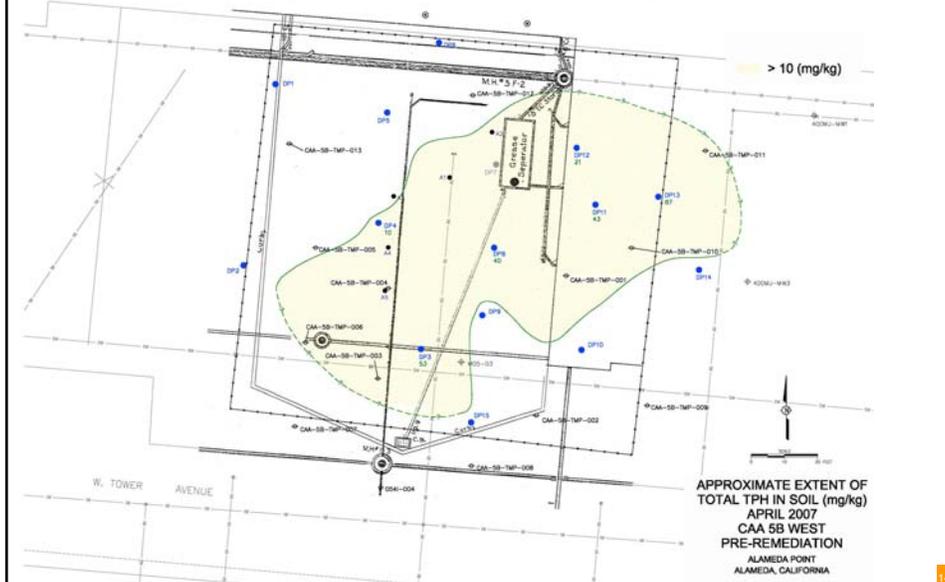


Alameda Naval Air Station
AOC 23G Proposed Phase I Sampling Locations

113

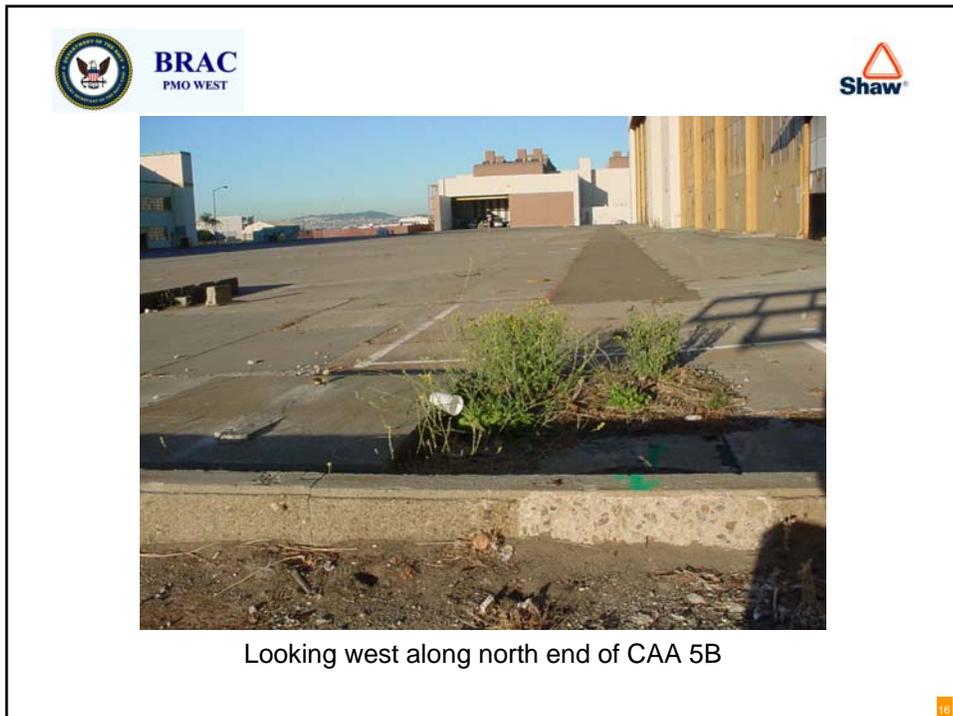
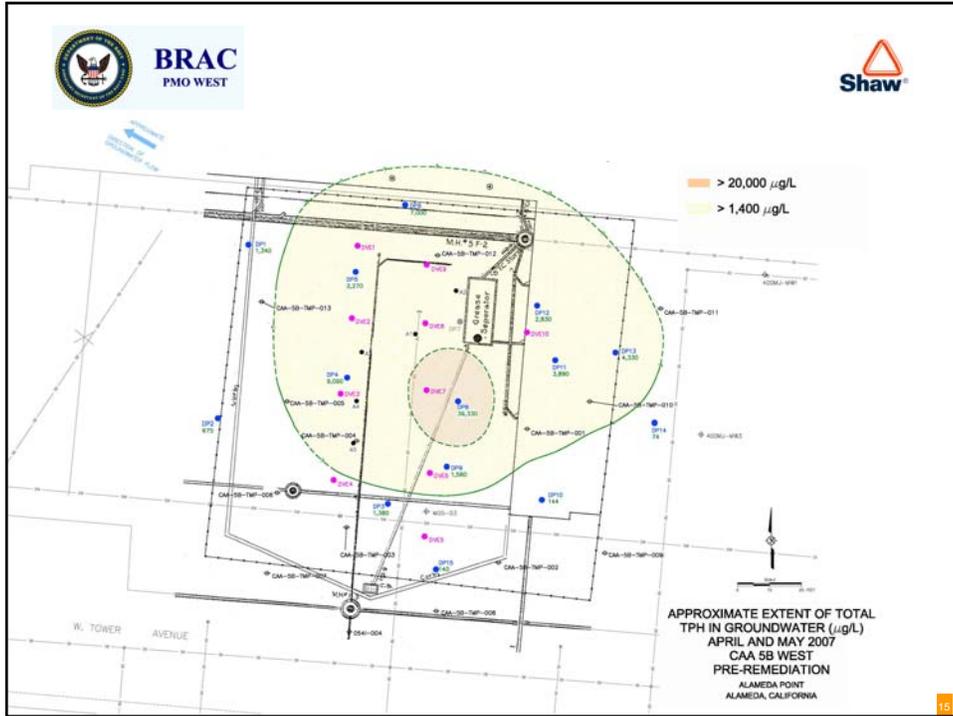


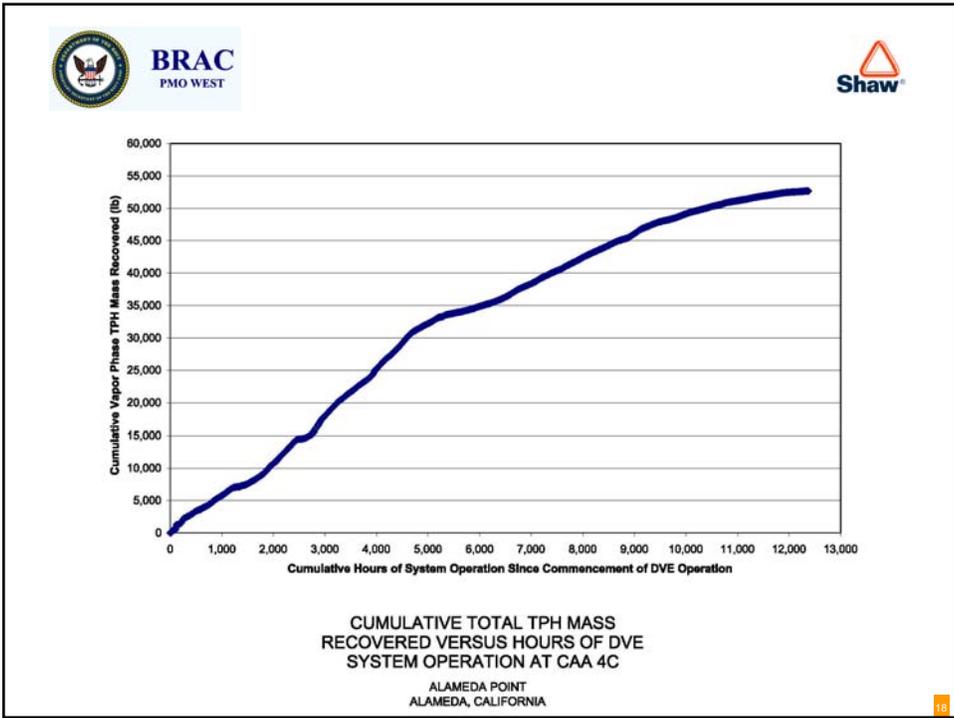
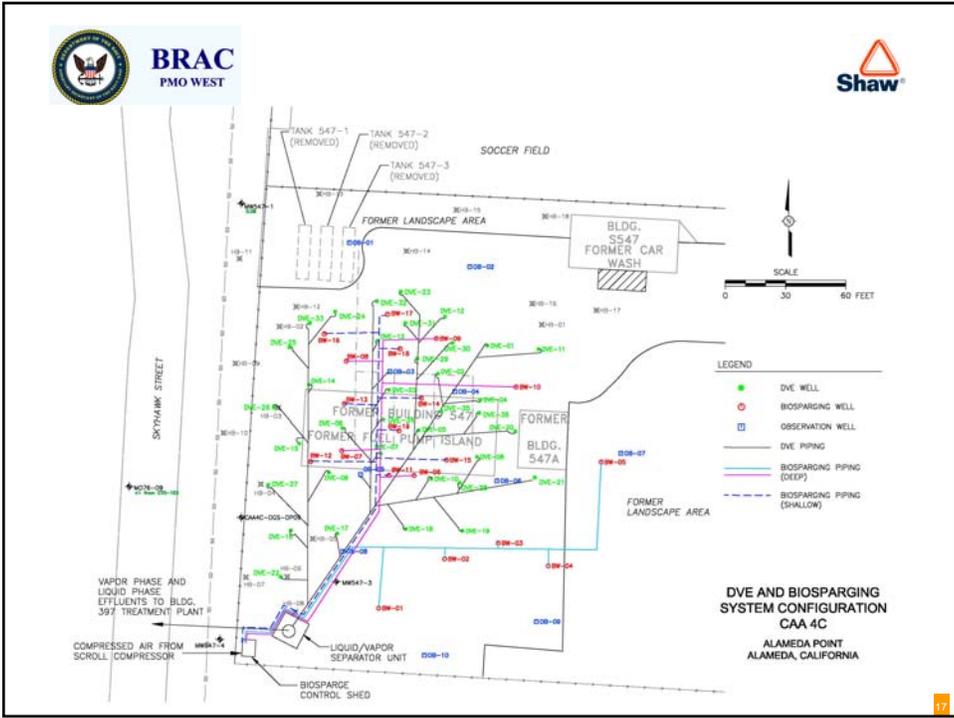
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APPROXIMATE EXTENT OF
TOTAL TPH IN SOIL (mg/kg)
APRIL 2007
CAA 5B WEST
PRE-REMEDIATION
ALAMEDA POINT
ALAMEDA, CALIFORNIA

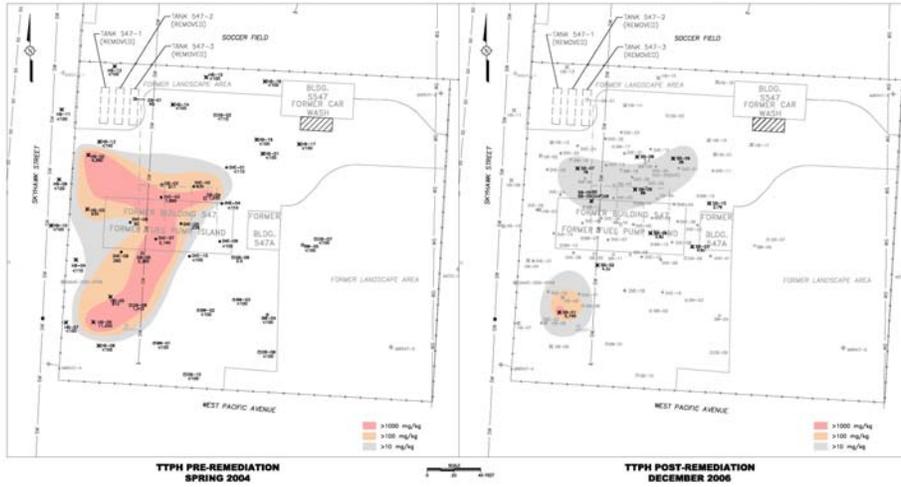
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PMO WEST

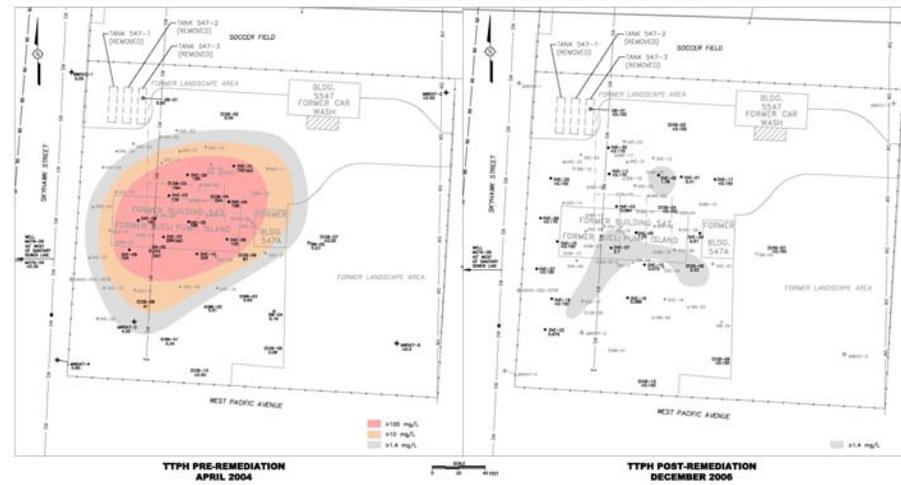


TOTAL TPH CONCENTRATIONS IN SOIL
2004 AND 2006
CAA 4C
ALAMEDA POINT
ALAMEDA, CALIFORNIA

18



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TOTAL TPH CONCENTRATIONS IN GROUNDWATER
2004 AND 2006
CAA 4C
ALAMEDA POINT
ALAMEDA, CALIFORNIA

19



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Alameda Point Petroleum Program Upcoming Field Activities

CAA 3A, 3B, and 3C

- Continue DVE Operations

CAA C

- Produce Project Plans Addenda (To Agencies December '07)
- Construct DVE/Sparge System (April/May '08)
- Begin Operations (June '08)

CAA 5B

- Install DVE Wellfield (April/May '08)
- Begin Operations (June '08)

AOC 23G

- Produce Planning Documents (in review)
- Perform Field Investigation (February to May '08)

CAA 6, 7, 13 (Bldg 530), and 4C

- Proceed with Post-Operational Quarterly Monitoring