Final

Travis Air Force Base
Environmental Restoration Program
Remedial Program Manager's
Meeting Minutes

21 April 2011, 1300 Hours

Mr. Mark Smith, Travis Air Force Base (AFB), conducted the Remedial Program Manager's (RPM) meeting on 21 April 2011 at 1300 in the Main Conference Room, Building 570, Travis AFB, California. Attendees included:

• Mark Smith	Travis AFB
• Glenn Anderson	Travis AFB
• Lonnie Duke	Travis AFB
• Gregory Parrott	Travis AFB
• Dezso Linbrunner	United States Army Corp of Engineers (USACE), Omaha District
• Alan Friedman	California Regional Water Quality Control Board (RWQCB)
• Jose Salcedo	California Department of Toxic Substances Control (DTSC)
• Nadia Hollan Burke	United States Environmental Protection Agency (USEPA)
• Mary Snow	Techlaw, Inc
• Rachel Hess	ITSI
• Riz Sarmiento	ITSI
• Mike Wray	CH2M HILL
• Doug Berwick	CH2M HILL

Handouts distributed at the meeting and presentations included:

• Attachment 1	Meeting Agenda
• Attachment 2	Master Meeting and Document Schedule
• Attachment 3	SBBGWTP Monthly Data Sheet (March 2011)
• Attachment 4	CGWTP Monthly Data Sheet (March 2011)
• Attachment 5	Site ST018 Monthly Data Sheet (March 2011)
• Attachment 6	Presentation: Management Overview Briefing: Activities Completed, In Progress and Upcoming
• Attachment 7	Presentation: 2011 Field Schedule Update
• Attachment 8	Presentation: 2010 Annual RPO Report

- Attachment 9 Presentation: Clarifying the Document Maze (BIR, RPO, GSAP, etc.)
- Attachment 10 Presentation FT005 Data Gaps Investigation Report

1. ADMINISTRATIVE

A. Previous Meeting Minutes

The 16 March 2011 RPM meeting minutes were approved and finalized as written.

B. Action Item Review.

Action items from March were reviewed.

Action item one still open. No change.

Action item two still open. No change.

Action item three still open. No change.

Action item four still open. Scheduled for 26 May 2011, after the RPM meeting.

Master Meeting and Document Schedule Review (see Attachment 2)

The Travis AFB Master Meeting and Document Schedule (MMDS) was discussed during this meeting (see Attachment 2).

Travis AFB Annual Meeting and Teleconference Schedule

— The next RPM meeting will be held on 26 May 2011.

Travis AFB Master Document Schedule

— Focused Feasibility Study (FFS): The response to comments (RTC) meeting date has been changed: to be determined (TBD), due to the size of the document and ongoing discussions with the regulatory agencies.

— Proposed Plan (PP): The predraft submittal date was moved to 04 May 2011 to allow for Air Force legal review.

— Groundwater Record of Decision (ROD): No change.

— Comprehensive Site Evaluation Phase II: RTC, Draft Final Due, and Final Due dates have changed to TBD. Travis and Army Corp of Engineers are working together to address EPA Comments. A teleconference may need to be scheduled to focus on EPAs Comments.

— Potrero Hills Annex: (FS, PP, and ROD): No change.

— ISCO/ERD Technical Memorandum: No Change. EPA is reviewing the first set of the Air Force responses to comments (RTCs); Travis is addressing the

second set of EPAs comments. A teleconference may need to be scheduled to focus on EPAs Comments. RTC and Final due date is subject to change. DTSC and RWQCB had no comments.

- Site SS015 Field Implementation Plan: Final. Move to History.
- Sites SS014 and ST032 Tier 1 POCO Evaluation Report: No change.
- Site FT005 Data Gaps Investigation Report: RTC date was changed to align with the June RPM meeting date change.
- Site ST018 POCO Baseline Implementation Report: No change. RTC date is TBD.
- Site SD036 RPO Field Implementation Plan: RTC and Final Due dates have been changed to TBD. Travis is addressing the final comments.
- 2010 GWTP RPO Annual Report: This is a new report, so all due dates were added to the schedule. This document will incorporate discussion of the treatment plants, optimization measures, and performance monitoring in one document.
- Baseline Implementation Report: This is a new report, so all due dates were added to the schedule. This report will document the site investigations, remedy optimization actions, and baseline sampling results for the emulsified vegetable oil (EVO) injection sites and bioreactor sites.
- Technical and Economic Feasibility Analysis (TEFA): No change.
- Quarterly Newsletter (January 2011): Published as scheduled.
- 2009/2010 GSAP: Final. Move to History.
- 2010 CAMU Annual Report: No change. Travis waiting for comments from DTSC and RWQCB.

2. CURRENT PROJECTS

Treatment Plant Operation and Maintenance Update

Mr. Duke reported on the treatment plant status.

South Base Boundary Groundwater Treatment Plant (see Attachment 3)

The South Base Boundary Groundwater Treatment Plant (SBBGWTP) performed at 100% uptime, and 3.5 million gallons of groundwater were extracted and treated during the month of March 2011. All of the treated water was discharged to Union Creek. The average flow rate for the SBBGWTP was 89.2 gallons per minute (gpm), and electrical power usage was 12,840 kWh. Approximately 17,591 pounds of CO_2 were created (based on DOE calculation); approximately 1.62 pounds of volatile

organic compounds (VOCs) were removed in March. The total mass of VOCs removed since the startup of the system is 397 pounds.

Optimization Activities: No optimization activities to report for the month of March.

Central Groundwater Treatment Plant (see Attachment 4)

The Central Groundwater Treatment Plant (CGWTP) performed at 95.3% uptime with approximately 1.2 million gallons of groundwater extracted and treated during the month of March 2011. All treated water was diverted to the storm drain. The average flow rate for the CGWTP was 27.5 gpm, and electrical power usage was 100 kWh for all equipment connected to the Central plant; approximately 137 pounds of CO_2 were created. Approximately 4.23 pounds of VOCs were removed from groundwater in March. The total mass of VOCs removed since the startup of the system is 11,219 pounds.

Optimization Activities for WTTP: The WTTP remains off line since it was shut down in April 2010 for the ongoing rebound study. No additional optimization activities to report for the month of March.

Optimization Activities for CGWTP: No optimization activities to report for the month of March.

Mr. Salcedo asked if carbon can absorb vinyl chloride. Mr. Berwick said the carbon does not absorb vinyl chloride (VC) very well. The VC detection has been sporadic and the causes are unknown.

North Groundwater Treatment Plant

The North Groundwater Treatment Plant (NGWTP) remains shut down for the wet season. Operation of the North Plant was suspended due to the presence of vernal pools in the area of Site LF007C.

Site ST018 Groundwater (MTBE) Treatment Plant (see attachment 5)

The Site ST018 (MTBE) Treatment Plant (S18GWTP) was brought on line on 11 March 2011 and performed at 100% uptime with approximately 82 thousand gallons of groundwater extracted and treated during the month of March 2011. All treated water was diverted to the storm drain. The average flow rate for the S18GWTP was 3.33 gpm, and electrical power usage was 65 kWh for all equipment connected to the S18GWTP plant; approximately 89 pounds of CO2 were created. Approximately 2.2 pounds of BTEX, MTBE, TPH mass were removed from groundwater in March. The total BTEX, MTBE, TPH mass removed since the startup of the system is 2.2 pounds.

Note: electrical power use is for the alarm system and a pump that pushes water through the GAC.

Optimization Activities: No optimization activities to report for the month of March.

3. Presentations

Program Update: Activities Completed, In Progress and Upcoming (see Attachment 6)

Mr. Wray reported on the status of field work and documents which are completed, in progress, and upcoming. See Attachment 6 for details.

Mr. Anderson proposed to Mr. Friedman that the RWQCB defer to EPA and DTSC to take the lead on reviewing FT005 Data Investigation Gap Report; due to the amount of documents that RWQCB already have in their queue for review. Mr. Friedman agreed and requested an electronic copy of the report.

Field Schedule (see Attachment 7)

Mr. Wray reported on the 2011 field schedule. See Attachment 7 for details.

2010 Annual RPO Report (see Attachment 8)

Mr. Berwick gave the presentation on the 2010 Annual Remedial Process Optimization (RPO) Report.

Key points made in this presentation included:

Mr. Berwick started by introducing the scope of the document and the related reports. This document describes system optimization activities: EVO injections, Bioreactors, Rebound studies, etc. It will allow the user easy access to specific data without having to filter through different reports.

Mr. Berwick gave a summary of the 2010 optimization activities for the CGWTP, SBBGWTP, and NGWTP. Mr. Wray added that analytical data from the quarterly/semi-annual EVO and bioreactor sampling events will also be included in the monthly groundwater treatment plant reports as the data becomes available. Highlights include:

- ThOx and UV Ox systems at Site SS016 taken offline.
- DP039, SS015, SD037, and SD036 emulsified vegetable oil (EVO) injections.
- Installed second bioreactor at site SS016. First bioreactor was installed at DP039 in late 2008.
- Installed solar panels for power where applicable.
- Treatment by air stripping replaced with treatment by LGAC.
- Rebound studies at several different sites.

Actions for system optimization in 2011:

- Continue all current groundwater rebound studies.
- After sampling the WIOU vapor extraction wells in 2nd quarter 2011, consider restarting those wells that may show significant rebound.
- Conduct the planned site characterization at Site LF007C
- Monitor TCE plume mobility at Site SS030 for a possible upgrade of extraction system.

Details of this presentation are provided in attachment 8.

Clarifying the Document Maze: BIR, RPO, GSAP, etc. (see Attachment 9)

Mr. Wray gave the presentation on clarifying the document maze.

Key points made in this presentation included:

Mr. Wray described the development of the various reports that the regulatory agencies have received and their relationships leading to groundwater remedy selection and the ROD.

- Evaluation of the interim remedies: two 5 year reviews; the last review was in 2008. The reviews thoroughly evaluate the performance of the whole program.
- Data Gaps Investigation: Define plumes, hot spots.
- Optimization of existing remedial systems and interim remedies.
- Transition Period Documents: Monthly RPO Data Sheets, Annual RPO Reports, Annual GSAP Reports, Baseline Implementation Report, Natural Attenuation Assessment Report, Vapor Intrusion Assessment Report, Annual Land Use Control Reports, Focused Feasibility Study.

Mr. Wray provided a flow chart of the reports and how the relationships lead to the PP/ROD. (See attachment 9 for details)

Side note: Mr. Wray mentioned briefly about the FTP site and SharePoint site; where documents can be accessed. Ms. Taylor/CH2M HILL will contact the group with details on how to access documents using SharePoint in the near future.

FT005 Data Gaps Investigation Report (see Attachment 10)

Ms. Hess gave the presentation on the FT005 Data Gaps Investigation Report.

Key points made in this presentation included:

Ms. Hess began by giving the background of site FT005 (a soil and groundwater site). A former fire training area located in the southeastern portion of Travis AFB, Site FT005 was in operation from 1962 to 1987. From 1962 to the early 1970's waste

fuels, oils, and solvents were burned during the fire training exercises. In the mid 1970's only waste fuels were burned in the fire training exercises. In the early 1990's the northern portion of site FT005 was used for dumping miscellaneous debris like fencing and concrete.

In 1995 a remedial investigation (RI) was conducted and identified PAHs, PCBs, dioxin, VOCs, metals, and TPH as potential chemicals of concern (COC) for soil; a feasibility study (FS) was also completed at this site. In 2004 a human health tech memo was issued that found only soils containing PAH's contamination required cleanup to protect human health at this site. Based on the data that was gathered, the North, East, and West Industrial Operating Unit (NEWIOU) record of decision (ROD) was issued in 2006; it selected excavation of FT005 soils containing concentrations of PAH's that posed a potential for human health risk. The Soil, Sediment and Surface Water NEWIOU ROD further identified land use controls for PCB's, dioxin, and TPH's concentrations that exceeded levels that allowed unrestricted use at this site. No action was deemed necessary for VOC's or metals. In 2007, a soil remedial design and remedial action work plan (RAWP) were issued to support implementation of the remedy that was identified in the ROD.

In September 2007 excavation activities began. The initial excavation exposed rubble, asphalt, concrete, tires, fencing, petroleum, hydrocarbon-saturated soil and miscellaneous debris within area A (a map is included in the attachment). This significantly increased the level of cleanup effort to complete what was required for the RAWP. Excavation activities were postponed due to time and funding issues until 2011. In May and June of 2010, a data gap investigation (DGI) was conducted to support regulatory concerns:

- Biological monitoring was performed during the potholing to protect any endangered species, like California Tiger Salamanders (none were observed).
- Pothole locations were established using a 50 ft. grid in areas, A, B and C; a 100 ft. grid for the rest of the targeted area.
- The site was surveyed and cleared for underground utilities.
- Fifty four pothole locations were excavated down to 6 ft.; eight of those locations were excavated down to 18 ft. Based on PID (air monitor) readings.
- Samples were collected from each pothole at depths of: 1.5 to 2 ft., 3.5 to 4 ft. and, 5.5 to 6 ft. Additional samples were taken from 8 to 14 ft. for the deeper potholes.
- One hundred percent of the samples were analyzed for PAH's and TPHd/TPHmo, fifty percent of the samples were analyzed for PCB's, and ten percent of the samples were analyzed for VOC's, dioxins and metals. See attachment 10 for analytical results.
- Debris consisted primarily of concrete rubble, chunks of asphalt, wood, scrap metal, and miscellaneous trash.

- No saturated soil or free product was observed, with the exception of a single 5 gallon drum of oil.

An addendum to the 2007 FT005 final RAWP has been prepared to support excavation of the additional soil volume identified by the DGI. (See attachment 10 for details)

Mr. Salcedo asked if the volumes for the dioxin concentrations are based on the 2004 preliminary remediation goals (PRG) detection limit standards. Ms. Hess said yes, that they are going by the PRG 2004 detection limits, adding that the current PRGs are less stringent.

4. New Action Item Review

There are no new action items.

5. PROGRAM/ISSUES/UPDATE

None.

General Discussion

None.

7. Action Items

Item #	Responsible	Action Item Description	Due Date	Status
1.	Travis AFB	Petition to have the Lysimeter removed.	TBD	Open
2.	Travis AFB	Research beneficial reuse of treated water and give update.	TBD	Open
3.	Travis AFB and EPA	Review past site closure completion reports to determine if future site closure reports are necessary.	TBD	Open

4.	Travis AFB	Schedule site visit for Ms. Burke to observe PDB sampling procedure.	26 May 2011	Open – The field observation was scheduled to follow the May RPM meeting.