



Baker Environmental, Inc.

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February 29, 2008

U.S. Environmental Protection Agency - Region II
290 Broadway – 22nd Floor
New York, New York 10007-1866

Attn: Mr. Adolph Everett, P.E.
Chief, RCRA Programs Branch

Re: Contract N62470-02-D-3052
Navy CLEAN, District III
Contract Task Order (CTO) 147
U.S. Naval Activity Puerto Rico (NAPR)
Final Full RCRA Facility Investigation Work Plan for
SWMU 9 Area B, Tank 214 Area
Naval Activity Puerto Rico
RCRA/HSWA Permit No. PR2170027203

Dear Mr. Everett:

Baker Environmental, Inc. (Baker), on behalf of the Navy, is pleased to provide you with one hard copy of the replacement cover and spine, inside cover, text, tables, appendix, and figures for the Draft Full RCRA Facility Investigation Work Plan for SWMU 9, Naval Activity Puerto Rico, for your review and approval. These replacement pages make up the Final Full RCRA Facility Investigation Work Plan for SWMU 9. Directions for inserting the replacement pages into the Draft Full RCRA Facility Investigation Work Plan for SWMU 9 are provided for your use. Also included with the copy of the replacement pages is one electronic copy provided on CD of the Final Full RCRA Facility Investigation Work Plan for SWMU 9, Naval Activity Puerto Rico.

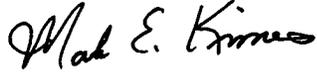
This work plan is being submitted in accordance with the EPA comments dated January 17, 2008. The Navy responses to these comments are attached for your review.

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If you have questions regarding this submittal, please contact Mr. Jeffrey G. Meyers at (843) 743-2134. Additional distribution has been made as indicated below.

Sincerely,

BAKER ENVIRONMENTAL, INC.



Mark E. Kimes, P.E.
Activity Manager

MEK/lp
Attachments

cc: Ms. Debra Evans-Ripley, BRAC PMO SE (letter only)
Mr. David Criswell, BRAC PMO SE (letter only)
Mr. Jeffrey G. Meyers, BRAC PMO SE (1 hard copy and 1 CD)
Mr. Pedro Ruiz, NAPR (1 CD)
Mr. Tim Gordon, US EPA Region II (1 hard copy and 1 CD)
Mr. Andrew Dorn, TechLaw, Inc. (1 CD)
Mr. Carl Soderberg, US EPA Caribbean Office (1 hard copy and 1 CD)
Mr. Manny Vargas, PR EQB (1 hard copy and 1 CD)
Ms. Josefina A. Gonzalez, PR EQB (1 hard copy and 1 CD)
Mr. Felix Lopez, U.S. F&WS (1 CD)
Mr. John Swenfurth, CH2M Hill, Tampa (1 CD)

NAVY RESPONSES TO EPA COMMENTS DATED JANUARY 17, 2008

TECHLAW COMMENTS ON DRAFT FULL RFI WORK PLAN FOR SWMU 9

(TechLaw comments are provided in italics while the Navy responses are in regular print)

GENERAL COMMENTS

TechLaw General Comment 1

- 1. Section 2.2, Previous Investigations/Interim Corrective Measures, states that barium, lead, thallium and vanadium were detected in the site sediments and that these detections were above background concentrations; yet they are not included in the current investigations. Revise Sections 2 and 3 to clarify why these metals have not been included as constituents of concern in the Full RFI Work Plan.*

Navy Response to TechLaw General Comment 1: Sediment samples will be analyzed for Appendix IX metals. Although not requested by TechLaw comment 1, surface soil samples will also be analyzed for Appendix IX metals based on the presence of Thallium at concentrations greater than the surface soil screening value. This metal is also statistically elevated above background.

TechLaw General Comment 2

- 2. It is unclear whether methyl tertiary butyl ether (MTBE) has ever been included as an analyte in previous investigations at SWMU 9. MTBE is a common gasoline additive. MTBE has substantially different transport and degradation properties than benzene and may present different remedial challenges. Please indicate in your responses whether MTBE has been included in the prior SWMU 9 investigations, and if not, why not, and summarize any past results, and indicate why it will not be included in the current sampling effort.*

Navy Response to TechLaw General Comment 2: It is unknown as to whether gasoline stored at SWMU 9 contained the common gasoline additive, methyl tertiary butyl ether (MTBE). Therefore, MTBE will be analyzed for during this investigation.

TechLaw General Comment 3

- 3. The data collected from the proposed temporary wells will be “screening” type data. The results will indicate whether there “is” or “is not” contamination in the shallow aquifer. If the resulting data exceeds screening levels, it may be necessary to install properly constructed wells in order to make risk-based decisions on potential impacts to human health and the environment. Please indicate in your responses whether the Navy will install permanent monitoring wells if the “screening” level data shows releases to groundwater.*

Navy Response to TechLaw General Comment 3: The Navy will conduct an evaluation and recommendation of whether or not additional permanent wells need to be installed due to the findings of the temporary wells. Some of the locations are not possible to install permanent wells due to the shallow depth of groundwater and their location adjacent to the estuarine wetland.

TechLaw General Comment 4

- 4. The work plan does not identify the contractor that will be retained to implement the Work Plan; and several sections of the Work Plan repeatedly indicate contractor developed plans are to be submitted in the future. For example, Sections 3.3 and 3.7 note that the analytical laboratory and data validation contractors have not been selected, while Section 3.6.4 requires an equipment decontamination plan to be prepared by the contractor, and Section 3.6.6 requires a contractor health and safety plan (HSP). To be considered an acceptable RFI Work Plan, the document should either include all relevant plans, such as for equipment decontamination and the HSP, or cite applicable plans that have been previously approved by EPA Region 2 for usage under RCRA corrective action activities at the NAPR facility. If there are any such applicable plans that the Navy intends to utilize under this RFI Work Plan, please cite those in your responses.*

Navy Response to TechLaw General Comment 4: The Draft Full RFI Work Plan was originally prepared with the understanding that an undetermined third party would be responsible for implementation of the activities. However, since that time it has been determined that Baker will be implementing this work. Therefore, the work plan will be revised to provide the missing information requested above.

TechLaw General Comment 5

- 5. The Schedule given in Figure 5-1 must be revised to include either target dates or the time intervals for implementation of the actual work (sample collection, analysis, and submission of the draft Final report, etc.).*

Navy Response to TechLaw General Comment 5: Figure 5-1 will be revised accordingly. Since Baker will be implementing this work the entire schedule will be populated with dates.

TechLaw General Comment 6

- 6. The RFI Work Plan does not cite a specific Quality Assurance Project Plan (QAPP) to be followed in implementing the work. However, Section 7.0 References lists the 1995 Final RCRA Facility Investigation Management Plan for Naval Station Roosevelt Roads, which does contain a Master Data Quality Assurance Plan (DCQAP), previously approved by EPA. However, that DCQAP was developed before the March 2005 “Uniform Federal Policy for Implementing Environmental Quality Systems” (UFP-QAPP) was developed. Therefore, EPA requests that the Navy revise the RFI Work Plan to clearly cite the QAPP to be followed, and if the work will be follow procedures in the 1995 DCQAP, also discuss whether the DCQAP provides procedures that will produce data of sufficient quality to comply with the 2005 UFP-QAPP standards.*

Navy Response to TechLaw General Comment 6: The previously approved DCQAP, entitled “Final RCRA Facility Investigation Management Plan for Naval Station Roosevelt Roads” (Baker Environmental) will be referenced in the work plan. The DCQAP has been prepared to provide procedures that will produce data of sufficient quality to comply with the UFP-QAPP standards as explained below.

The Navy has implemented previous investigations at NAPR in accordance with the EPA approved Master Project Plans, which include the Project Management Plan (PMP), Data Collection Quality

Assurance Plan (DCQAP), Data Management Plan (DMP), and Health and Safety Plan (HASP) for NAPR. These Master Plans, and specifically, the Final Data Collection Quality Assurance Plan (DCQAP) (Baker, September 14, 1995) define acceptable data requirements and error levels associated with the field and analytical portions of this investigation. Therefore, to maintain consistency with past Navy work under the Consent Agreement, it was determined that the the Full RFI Work Plan for SWMU 9 should be revised to reference this master DCQAP.

The Final DCQAP portion of the Master Project Plans was prepared following guidance given in:

- Interim Final RCRA Correct Action Plans, USEPA, EPA/530-SW-88-028, June 1988; and
- Interim Final RCRA Facility Investigation Guidance – Volume 1, USEPA, EPA/530/SW-89-031, May 1989.

Table 1 provides a map between the DCQAP sections and the sections required by “EPA Requirements for Quality Assurance Project Plans” (QA/R-5) (EPA 2001). Table 1 illustrates that although there are format and minor content differences, the DCQAP is generally consistent with and includes all of the main elements required by QA/R-5. As stated in part from EPA General Comment 1: “The UFP-QAPP was developed using the same standard as that used for development of QA/R-5. QAPPs developed in accordance with UFP-QAPP will meet the requirement of QA/R-5.” Similarly, it is assumed that a QAPP meeting the requirements of QA/R-5 (i.e., DCQAP) will also meet the quality goals of the UFP-QAPP.

Of particular interest when considering overall data quality are the development of DQOs, the use of standard operating procedures for data collection and analysis, and the use of appropriate analytical methods.

DQOs

Although the seven step DQO process was not rigorously applied in the SWMU 9 work plan, elements essential to the process (with the exception of statistically determining the number of samples) have been considered in the development of the sampling design. The work plan was developed with input from our human health and ecological risk assessors to assure that the investigation will provide the data that is needed for risk management decisions. The human health and ecological risk assessors have reviewed the sampling program (number, frequency, location and collection methods) and analytical program (analytical methods, parameter lists, detection limits) and have compared applicable screening values to method performance limits to maximize the usability of the resultant data.

SOPs

The standard operating procedures for field data acquisition and laboratory analysis may have changed to some degree since publication of the DCQAP. The SOPs are routinely updated to reflect the currently used equipment and accepted procedures. The most current SOPs are referenced and/or included in the work plan to assure consistency in data collection and analysis. Any specialized or site-specific procedures are discussed in detail in the text of the Work Plan.

Analytical Methods

Similar to the SOPs, the analytical methods, analyte lists, detection limits, etc. may have changed to some degree since publication of the DCQAP. Consequently, the current work plan contains the following tables specifying the sampling and analytical program requirements so that data of sufficient quality for risk management decisions is collected. As discussed above, these tables have been reviewed by the

human health and ecological risk assessors to ensure acceptable data quality.

- **Table 3-1 Summary of Sampling and Analytical Program – Environmental Samples** – this table specifies media that is to be sampled, the number of environmental samples per media, the number of sample related QA samples that are required (i.e., duplicates, matrix spike and matrix spike duplicates) and the associated analytical requirement for each sample. In some Work Plans, the information from Table 3-3 may also be provided on Table 3-1.
- **Table 3-2 – Method Performance Limits** – This table specifies the required parameter/analyte list for each analytical suite (e.g., volatiles, metals, etc.), the required analytical method and the contract required quantitation limits that are needed to produce data of sufficient quality for risk management based decisions.
- **Table 3-3 – Summary of Sampling and Analytical Program – QA/QC and IDW Samples** – This table specifies the type and number of non-environmental media QA/QC samples (e.g., blanks and rinsates) and IDW samples that are required for collection during the field investigation and the associated analysis

The information provided in these tables has been reviewed against the screening levels and have been determined to generally meet these levels. These quantitation limits have also been reviewed by the analytical laboratory to ensure that they can be met. In all cases, the quantitation limits are the lowest achievable by the laboratory for the specified analytical method. These tables are then provided to the analytical laboratory subcontractor as part of their scope of work so that the laboratory is clearly aware of the analytical requirements of the project. Additionally, only laboratories capable of providing an acceptable Laboratory Quality Manual (LQM) will be selected for this project. The laboratory LQM may be provided on request (after selection of the analytical laboratory).

These elements: consistency with the substantive elements of QA/R-5; following the planning elements of the DQO process; using current data acquisition SOPs; and, providing current sampling and analytical requirements tables within the work plan, taken together provide the information and guidance necessary for the project team to generate good quality data and to use that data for developing risk management based recommendations and decisions.

TABLE 1
MAPPING OF DCQAP ELEMENTS TO EPA QA/R-5 ELEMENTS
NAVAL ACTIVITY PUERTO RICO, CEIBA, PUERTO RICO

EPA QA/R-5 Elements		Corresponding DCQAP Elements		Comments
		Section	Element	
Group A - Project Management Elements		---		No Group designation in the DCQAP.
A1	Title and Approval Sheet	---	Title Page	---
A2	Table of Contents	---	Table of Contents	---
A3	Distribution List	---	---	The distribution list is provided on the cover letter to the document.
A4	Project/Task Organization	6	Project Organization	---
A5	Problem Definition/Background	2	Permit Requirements for Data Collection	---
		3	SWMU/AOC Status	---
A6	Project/Task Description	4	Data Collection Strategy and Requirements	---
A7	Quality Objectives and Criteria	4	Data Collection Strategy and Requirements	---
A8	Special Training/Certification	---	---	Special training/certification are not required for sampling and analysis. Health and safety training/certification requirements are given in the master Health and Safety Plan. Other training requirements, if any are specified in the RFI Work Plan.
A9	Documents and Records	16	Quality Assurance Reporting Procedures	---
		---	---	This element is also discussed in the master Data Management Plan (DMP).
Group B - Data Generation and Acquisition Elements		---		No Group designation in the DCQAP.
B1	Sampling Process Design (Experimental Design)	4	Data Collection Strategy and Requirements	This element is also covered by Tables 3-1, 3-2 and 3-3 in the RFI Work Plan.
B2	Sampling Methods	5	Field Investigation and Sampling Procedures	---
B3	Sample Handling and Custody	7	Sample and Document Custody Procedures	---
B4	Analytical Methods	9	Analytical Procedures	---
B5	Quality Control	11	Internal Quality Control Checks	---
B6	Instrument/Equipment Testing, Inspection and Maintenance	12	Performance and System Audits	---
		13	Preventive Maintenance	---
B7	Instrument/Equipment Calibration and Frequency	8	Calibration Procedures and Frequency	---
B8	Inspection/Acceptance of Supplies and Consumables	---	---	This item is not covered in the Master Project Plans or RFI Work Plans.
B9	Non-Direct Measurements	---	---	The need for data from non-measurement sources is discussed in the task description of the RFI Work Plan, if necessary.
B10	Data Management	---	---	This element is also discussed in the Data Management Plan
Group C - Assessments and		---		No Group designation in the DCQAP.
C1	Assessments and Response	12	Performance and System Audits	---
		14	Data Measurement Assessment Procedures	---
		15	Corrective Actions	---
C2	Reports to Management	16	Quality Assurance Reporting Procedures	---
Group D - Data Validation and		---		No Group designation in the DCQAP.
D1	Data Review, Verification and Validation	10	Data Reduction, Validation and Reporting	---
D2	Verification and Validation Methods	10	Data Reduction, Validation and Reporting	---
D3	Reconciliation with User Requirements	---	---	This element is discussed in the Data Management Plan.