# Attachment 1 to Scoping Meeting Summary

## Preliminary Work Plan/Statement of Work Task List

# Red Hill Bulk Fuel Storage Facility Administrative Order on Consent (AOC) Statement of Work (SOW) Sections 6 and 7

November 30, 2015 – December 3, 2015 Building 679, Navy College, SUBASE Area, Joint Base Pearl-Harbor Hickam

The following identifies the major tasks preliminarily agreed upon by parties during scoping meetings held during the week of November 30, 2015. These tasks will be used to develop the Work Plan/SOW for AOC SOW Section 6 (*Investigation and Remediation of Releases*) and Section 7 (*Groundwater Protection and Evaluation*).

### 1) Revise and Update Existing Conceptual Site Model (CSM)

- a) Task #1: Evaluate Geology within Investigation Area
  - i) Review: literature, aerial imagery, and previous drilling logs and rock cores
  - ii) Determine extent of geological mapping
  - iii) Conduct field survey: map outcrops and visual evidence of dikes
  - iv) Map dips and strikes of bedding, fractures, dikes, and potential preferential pathways to the extent possible
  - v) Evaluate whether numerical modeling of potential vertical flow to the groundwater aquifer is likely to be accurate, reproducible, or reliable
- b) Gather available data, including studies by others and information from neighboring sites
- c) Summarize previous investigations and any available data
  - i) Groundwater and soil vapor data from previous investigations and long-term monitoring program
- d) Conduct field survey
- e) Consolidate information and prepare an updated CSM
- f) Evaluate if revisions to the Work Plan/Statement of Work are recommended

#### 2) Task #2: Evaluate Potential Non-aqueous Phase Liquid (NAPL) Investigation Methodologies

- a) Document methodologies and feasibility (reference presentation slides used during scoping meetings)
- b) Evaluate whether additional sampling to locate NAPL is likely to be productive and effective. If so, where?

#### 3) Task #3: Identify Chemicals of Potential Concern (COPCs)

- a) Propose New COPC Regime/Target Analyte List
- b) Sampling and Chemical Analysis Methods: Field and Laboratory
- c) Summary of Screening Criteria and Laboratory Performance Limits

#### 4) Task #4: Expand the Monitoring Network and Conduct Sampling

- a) Install Wells
  - i) Obtain Well Permits and Permissions
  - ii) Procure Driller
  - iii) Well Installation and Logging Cores

- b) Sampling Events
  - i) Collect and Ship Samples; Measure Field Parameters
  - ii) Laboratory Analysis
  - iii) Data Validation
  - iv) Summarize Data

### 5) Quality Assurance/Quality Control Procedures

#### 6) Investigation and Remediation of Releases Report (Section 6)

- a) Evaluate Investigation Data and Recommend Addition Actions (If Any)
- b) Task #7: Evaluate Preliminary Remedial Alternatives (Nine Decision Criteria)
- c) Draft Report
  - i) Regulator Review and Comments
  - ii) Revise Draft Report
- d) Final Report
  - i) Regulatory Review of Revised Report
  - ii) Regulatory Acceptance of Report

#### 7) Groundwater Flow Modeling (Section 7.1)

- a) Task #5: Conduct Groundwater Flow Modeling
- b) Progress Reports #1-5 (Every 4 Months from Work Plan/SOW Acceptance)
- c) Draft Groundwater Flow Modeling Report
  - i) Regulator Review and Comments
  - ii) Revise Draft Report
- d) Final Groundwater Flow Modeling Report
  - i) Regulatory Review of Revised Report
  - ii) Regulatory Acceptance of Report

#### 8) Contaminant Fate and Transport Modeling (Section 7.2)

- a) Task #6: Conduct CF&T Modeling
- b) Draft CF&T Modeling Report
  - i) Regulator Review and Comments
  - ii) Revise Draft Report
- c) Final CF&T Modeling Report
  - i) Regulatory Review of Revised Report
  - ii) Regulatory Acceptance of Report

#### 9) Groundwater Monitoring Well Network Report (Section 7.3)

- a) Draft MW Network Report
  - i) Regulator Review and Comments
  - ii) Revise Draft Report
- b) Final MW Network Report
  - i) Regulatory Review of Revised Report
  - ii) Regulatory Acceptance of Report