

MINUTES OF THE TECHNICAL REVIEW COMMITTEE MEETING  
ON OCTOBER 31, 1991  
OCEANA NAVAL AIR STATION

ATTENDEES:

Capt. Larry Urbik	Commanding Officer, NAS Oceana
Commander C. N. Salmond	Public Works Office, NAS Oceana
Lt. Commander Gary Pirtle	Public Works Office, NAS Oceana
Ace Ewers	Public Affairs Office, NAS Oceana
Will Bullard	Public Works Department, NAS Oceana
Steven H. DeBerry	Public Works Department, NAS Oceana
John Peters	LANTDIV - Public Affairs Office
Nina M. Johnson	LANTDIV - Environmental
Jesse Waltz	LANTDIV - Environmental
Marvin Barnes	COMNAVAIRLANT
Chuck Maguire	CINCLANTFLT
Bob Stroud	U.S. EPA - Region III, RCRA
Robert Thomson	U.S. EPA - Region III, Superfund
Anne M. Field	Virginia Dept. of Waste Management
Erica Dameron	Virginia Dept. of Waste Management
Mary Heinrich	Virginia Beach Environmental Management
Ed Kube, Jr.	City of Chesapeake community representative
James Hertz	Virginia Beach community representative
Walt Vargo	Virginia Beach community representative
Frank Lewis	CH2M HILL
Steven Brown	CH2M HILL

Captain Urbik opened the meeting by welcoming the attendees and expressing his hope that the meeting would be a productive exchange of views and information between those in attendance. He pointed out that environmental consciousness in society in general and at the base in particular has increased over the years and that they were actively working to increase awareness of environmental issues at Oceana. Commander Urbik acknowledged that there had been some inadequate disposal practices at the air station in the past, but emphasized that NAS Oceana is committed to dealing aggressively with these problems and welcomes the interaction and input of the committee.

Mr. Will Bullard, the meeting moderator, introduced himself and suggested that each person introduce himself or herself. After the introductions, Mr. Bullard expressed the Navy's desire that the meeting be an informal exchange of information, and then reviewed the agenda. He stated that there are three main players in the ongoing work at Oceana: (1) LANTDIV, whose role is to provide contractual, legal, and technical

support to NAS Oceana, (2) NAS Oceana, whose role is to coordinate the work, and (3) CH2M HILL, the contractor performing the environmental studies.

Mr. Jesse Waltz explained the history of environmental investigations at NAS Oceana and related them to the ongoing work. The investigative history involves work conducted under both the Installation Restoration Program (IRP) and RCRA. The IRP work consisted of: (1) the 1984 Initial Assessment Study (IAS), which consisted primarily of a records search and personal interviews and did not include environmental sampling (5 of 16 sites were recommended for confirmation sampling); and (2) two investigations conducted under CERCLA (Superfund) format, in 1986 and 1988. Following a RCRA Facility Assessment (RFA) completed in 1988, environmental investigations have been conducted following RCRA format and guidelines. The Navy received a consent order in March 1990, which identified close to 100 RCRA Solid Waste Management Units (SWMUs). An interim RCRA Facility Investigation (RFI) was conducted in 1990, which addressed most of the IRP sites included in the consent order. In June 1991 the consent order was signed by the Navy following negotiations that reduced the number of SWMUs to 17, based on additional information collected during the interim RFI work and the identification of existing environmental programs at NAS Oceana that currently oversee waste handling practices at many of the previously identified SWMUs. A work plan for the RFI was submitted to the EPA for approval in October 1991. Mr. Waltz stated that work on the RFI will begin soon after final approval of the work plan by the EPA.

Mr. Waltz then passed out a fact sheet showing a comparison of the RCRA corrective action and CERCLA response action programs and briefly discussed the differences.

Mr. Frank Lewis then began his presentation describing the environmental investigation of each of the sites by passing out a comprehensive package of site summaries of the 21 sites included in either the interim RFI or the future RFI. Mr. Lewis encouraged the attendees to ask questions during the presentation. He then proceeded to describe the background, the results from the interim RFI and other previous studies, and the work proposed during the RFI for each site. (The sites included in the presentation were 1, 2a, 2b, 2c, 2d, 2e, 6, 7, 8, 11, 15, 16, 18, 19, 20, 21, 22, 23, 24, and 25.)

Mr. Marvin Barnes asked if the 5 sites recommended for confirmation sampling in the IAS are included in the 17 sites to be studied during the RFI. Mr. Lewis explained that some are, such as the line shacks, because previous investigations have either detected a release to the environment or have been inconclusive, and other sites are not, such as the fifth green landfill and the north station landfill, because the results of previous investigations indicate that a hazardous release has not apparently occurred.

Mr. Rob Thomson asked if the IAS was based on only interviews or whether air photos were reviewed. Mr. Lewis said he was not sure but that he believed that air

photos may have been used. Ms. Nina Johnson stated that some air photos were used during subsequent investigations, especially of Site 1. Mr. Bullard emphasized that the IAS was based primarily on interviews and records searches.

Site 1. Mr. Lewis stated that the location of the oil pit was not adequately specified in the IAS, and that the three monitoring wells installed in 1986 on the basis of these descriptions turned out to be placed a few hundred feet too far to the east. These wells were found to be clean. A 1958 air photo was consulted prior to the interim RFI work, and the two wells installed in 1990 were in or near the pits, judging from debris in the subsurface, soil staining, and odors. The wells contained an immiscible free phase liquid. Mr. Lewis reviewed the contamination found during the interim RFI. (The complete details of the site presentations at the meeting will not be presented in these minutes. Refer to the written site summaries handed out in the TRC meeting for more complete details.)

Anne Fields asked why metals were not included in the analyses at Site 1 considering that some paints may have been disposed in the pit. Mr. Lewis agreed that the presence of metals might be worth considering; however, he was not aware that paints may have been disposed of in the pit. Ms. Johnson pointed out that Appendix IX constituents will be analyzed at downgradient locations at this site during the RFI, which will cover metals.

Mr. Thomson asked if the wells were purged before sampling and whether the thickness of the free product had been measured. Mr. Lewis stated that the wells had been purged but that the thickness of the free product had not been measured.

Mr. Ed Kube asked if the drainage near Site 1 was natural. Mr. Lewis responded that the drainage was natural but that it had been channelized into a straight ditch.

Mr. Walt Vargo stated that the city of Virginia Beach is going to levy a tax to pay for the storm-water control system. He asked whether the contamination in the ditch next to Site 1 would pose a problem. Mr. Lewis responded that potential storm-water impacts of the contamination in the ditch may be worth considering but pointed out that much more would be known about contamination in the ditch after the RFI. He also stated that water in the ditch flows perennially.

Mr. Vargo asked if the contamination at Site 1 can be prevented from entering the Yorktown aquifer. Mr. Lewis explained that it is not yet known how deep contamination may have migrated, but that the source has been there a long time, and therefore contamination may have had time to reach the Yorktown. He also stated that site remediation will remove the source of contaminants.

Ms. Mary Heinrich asked whether additional downstream sampling of sediments in the ditch had been considered in light of the contamination found during the interim

RFI. Mr. Lewis responded that downstream sediment sampling had not been proposed but considering that contamination in the most downstream sediment sample had been high, sampling sediments farther downstream would be a good idea.

Following the presentation and discussion of Site 1, the group took a fifteen minute break.

Site 2a. After the break, Mr. Lewis presented the results of investigations at Site 2a, which will not be included in the RFI. There were no questions.

Site 2b. Mr. Lewis described past results, which show contamination in what appear to be two separate areas at this site. Plans are to install one deep well and five shallow wells during the RFI. Mr. Lewis also explained that multiple in situ groundwater samples are planned to be collected using a Geoprobe device. This strategy would help define the shape of the separate plumes and to optimize the placement of the four proposed shallow wells. Mr. Lewis also explained that the source of the TPH found in the ditch may be upstream of, and unassociated with past disposal practices at, Site 2b.

Mr. Ron Thomson noted that wash water from cleaning airplanes went to a floor drain and then to underground piping and asked if this had any relation to contamination at Site 2b. Mr. Lewis explained that there is an oil-water separator system tied into this cleaning area. Mr. Bullard explained the valving of the oil-water separator system and how it functioned generally. Mr. Thomson asked if there could be cracks or leaks in the piping that might be a source of contamination. Mr. Lewis responded that it was possible. Mr. Barnes clarified that the term "source" used repeatedly by Mr. Lewis did not refer to ongoing poor disposal practices at the various sites. It was further stated that "source" referred to contamination already in the soil as a result of past practices.

Captain Larry Urbik asked that the terms "shallow well" and "deep well" be clarified. Mr. Lewis explained that most of the monitoring well screens were 10 feet long and that the tops of the screens in the shallow wells were generally 10 to 13 feet deep and the bottoms were generally 20 to 23 feet deep. Deep wells are generally screened over a depth interval of 50 to 60 feet. The geoprobe samples expected to be 2 to 3 feet below the water table.

Ms. Johnson pointed out that several soil samples were collected at Site 2b during the 1986 investigation and that the results do not indicate that there is significant soil contamination.

Site 2c. Mr. Lewis described the results of past investigations, noting that this site had not been recommended for confirmation study in the IAS and therefore had not been studied in 1986, but that contamination had been discovered in the 1988 line shack

investigation. Five more wells were installed in 1990. Data from these wells indicated that significant volatile organic contamination was present in groundwater near Building 400 and in well 2C-MW9 in the woods. During the RFI, several more wells will be installed following in situ groundwater sampling in the woods and near Building 400 using the Geoprobe.

Commander Salmond asked if we can be sure of the identity and concentration of contaminants reported in the analytical results. He also asked how the analyses are performed and what the term "detection limit" signified. Mr. Lewis explained that we are sure of the identity of the contaminants and explained that concentrations of specific chemicals are calculated from the height of the response peak. He explained that many of the analyses are done using a gas chromatograph but said he was not familiar enough with analytical procedures and equipment to elaborate further. Mr. Lewis stated that some concentrations were low enough that their presence could be identified but that their precise concentration could not be measured accurately. These concentrations are listed as below the (quantitative) "detection limit". He made a comparison to relative humidity data, which are difficult to quantify accurately at very high and very low humidities.

Ms. Johnson asked if the plan is to remove a section of the concrete slab near Building 400 during the RFI. Mr. Lewis explained that a large slab would not be removed; instead, the Geoprobe sampling would use a bit that would create a hole of 2-inch diameter or less. This approach will be better for everyone involved and would minimize the amount of dust generated.

Site 2d. Concentrations of analyzed constituent in the three wells installed in 1990 were below federal and Virginia standards. During the RFI, the existing wells will be resampled but no new wells are planned. There were no questions.

Site 2e. Total petroleum hydrocarbon (TPH) concentrations in soil were detected above state standards at some locations, but no groundwater contamination was found. The wells will be resampled and additional soil samples will be collected during the RFI to determine the extent of the TPH-contaminated soil. There were no questions.

Sites 6, 7, 8. Mr. Lewis described the history and past analytical results from these three sites. He explained that the Navy and the EPA had agreed that these sites would not be included in the RFI because concentrations of all analyzed parameters were near or below detection limits. There were no questions.

Site 11. Mr. Lewis described the results of the soil and groundwater sampling near the old fire fighting training pit during the interim RFI. He showed the position of the three shallow wells to be installed during the RFI and explained that these wells are also intended to detect potential contamination associated with the "new" training pit.

Mr. Barnes asked if the Site 11 samples would be analyzed for metals. Mr. Lewis responded that only lead would be analyzed.

Site 15. Mr. Lewis described the abandoned tank farm site and stated that groundwater is assumed to flow to the northwest. Monitoring wells are proposed at locations which take into account this presumed direction of groundwater flow. He stated that he saw no evidence of the tank farm during a visit to the site.

Mr. Barnes noted that the tanks were said to have been removed after 1974 and asked if CH2M HILL had consulted air photos to confirm the locations of the tanks. Mr. Lewis explained that the investigation has not advanced to the stage of confirming these locations, but that CH2M HILL planned to do so as part of the RFI. He repeated that no physical evidence of the tanks had been observed during a site visit in early 1991.

Site 16. Mr. Lewis described the anticipated RFI sampling activities at the pesticide storage area.

The group broke for lunch after the presentation of Site 16.

Sites 18, 19, and 20. Anticipated RFI sampling activities at these three sites were presented. There were no questions.

Site 21. After Mr. Lewis had finished describing the transformer storage site, and the future RFI sampling, Mr. Bullard pointed out that the transformers stored at this site had been recently removed.

Site 22. After Mr. Lewis had described the construction debris landfill and the anticipate RFI activities, Ms. Anne Fields asked if there was any standing water or wetlands surrounding the site. Mr. Lewis stated that surrounding lowland areas are seasonally wet, but he was not knowledgeable enough to say whether or not these areas could be designated wetlands.

Sites 23 and 24. Mr. Lewis explained that these two sites were areas where small tank trailers used to transport waste liquids were parked and that soil staining seen on the ground at these sites led to their inclusion in the RFI. Mr. Barnes expressed some surprise that such apparently minor features were included as sites in the RFI.

Site 25. Mr. Lewis explained that this northern site was first operated as a borrow pit, then as a local dump, and then was bought by the Navy to dispose of inert material, especially concrete. Ms. Fields asked if these pits, including the one to the east not owned by the Navy, were entirely contained or whether there were outlets that allowed water to flow off site. Mr. Lewis said that he was unsure about whether, and

in what direction, water flowed from the site, but did describe flow directions he had observed in nearby streams.

Site 26. Mr. Lewis concluded the technical presentations by describing the future RFI sampling at this small former fire fighting training pit. There were no questions concerning Site 26.

The presentations were followed by a general question and answer period. Mr. Jim Hertz asked where wastes generated by NAS Oceana are disposed and whether or not the current landfill posed a potential environmental threat. Mr. Bullard responded that the current landfill was located near the public works building in the central part of the station and that NAS Oceana is currently in the process of closing the landfill. He explained that the current landfill is under the jurisdiction of the Virginia Department of Waste Management, whose regulations and closure requirements include groundwater monitoring provisions. Mr. Hertz asked what was done with petroleum products produced by NAS Oceana. Mr. Bullard answered that waste petroleum products are segregated and stored temporarily at 13 holding areas around NAS Oceana. Following temporary storage, the ultimate destination of the petroleum wastes depends on its composition. Much of the petroleum wastes are shipped offsite (to a licensed waste handler), however, JP-5 fuel is either recycled or used for fire-fighting training.

Mr. Bullard clarified that each of the SWMUs included in the draft consent order (March 1990) is mentioned in the final consent order (June 1991); however the final consent order calls for the investigation of only 17 SWMUs under RCRA. The RFI work plan discusses the reasons for the reduction in the number of SMWUs in the final consent order. The work plan also describes each SWMU and, if the SWMU was dropped in the final consent order, presents the basis for its exclusion in the RFI. Ms. Johnson emphasized that the Navy did not reduce the number of SWMUs to 17 unilaterally; they did so in collaboration and agreement with the EPA.

Mr. Hertz asked about the status of investigations at the Fentress Naval Auxiliary Landing Field. Ms. Johnson explained that the work at Fentress is being done separately because the facility is not included in the consent order and that a separate TRC would be organized to discuss that facility. Mr. Bullard added that there were two sites that has been investigated at Fentress: the landfill and the fire fighting training pit.

Anne Fields asked how the RCRA Appendix IX list compared to the Target Analyte List and the Target Compound List. Mr. Lewis explained that Appendix IX is considerably more exhaustive than the TAL and TCL lists and that a complete listing of the Appendix IX constituents was contained in the RFI work plan.

Mr. Will Bullard closed the meeting by thanking everyone for coming. He stated that the next TRC would be approximately 9 months after the RFI began, which depended on when final EPA approval of the RFI work plan came through. He reminded the committee members that he is the main contact for the base and that they should feel free to contact him with any questions and requests.

The meeting was adjourned.