



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION III
841 Chestnut Building
Philadelphia, Pennsylvania 19107-4431

N62269.AR.000297
NAWC WARMINSTER
5090.3a

AUG 04 1995

Mr. Orlando Monaco
Naval Facilities Engineering Command
Environmental Contracts Branch
10 Industrial Highway
Lester, Pennsylvania 19113

Subject: Naval Air Warfare Center (NAWC), PA

Dear Mr. Monaco:

This letter provides EPA comments on a Proposed Subsurface Soil Investigation for Area B submitted by Halliburton NUS under cover letter dated July 26, 1995. Due to the short time frame provided EPA for review in this case, EPA Hydrogeologist Kathy Davies has not had an opportunity to review or comment on the proposed work as this time. Therefore, these comments may be preliminary.

As a general comment, please indicate how the soil borings or test pits will be conducted at the referenced locations. For example, if a boring is to be conducted at a particular soil gas or surface soil sample point, are these points readily identifiable in the field?

SITE 5

Please identify the depth of the surface soil samples and whether any waste or stained soil was observed in these samples.

The concentration of 24 mg/kg Aroclor 1254 in surface soil sample W-C-05-06 exceeds EPA Region III's Removal Action Level of 18 mg/kg for this compound in a residential area. Due to a potential imminent human health threat in this case, additional sampling should be proposed and conducted in an expedited manner to determine the nature and extent of this surface soil contamination. Based on the additional sampling data, a removal action should be conducted if necessary and the scope of proposed subsurface soil sampling in this area should be reassessed.

It is stated that the 24 mg/kg Aroclor 1254 was found "within TR5" and that the "highest metal concentrations were detected from the middle and eastern ends of TR5". However, based on EPIC Report TS-PIC-93053 (see pages 29 and 35), these samples apparently were not collected "within TR5" or over material disposed in trench TR5. Rather, these locations appear to correspond to a separate, previously identified disposal area located immediately north of TR5. (Note: The location of

trenches TR3 and TR5, as indicated on Attachment III, are not consistent with locations identified by EPIC.) Prior to conducting soil borings in this apparent additional disposal area, soil gas survey work should be considered and the results of additional surface soil sampling reviewed.

While the Phase III RI Workplan of January 1995, indicated that "soil gas points will be added at 25' intervals along the length of each trench at Site 5, as determined by EPIC coordinates", this does not appear to have been done in the case of either TR3 or TR5. With regard to TR5, the figure in Attachment 1 indicates 1) no soil gas survey was performed on the eastern third of the trench TR5, 2) only 1 soil gas sample per 40 feet was collected in the middle third of the trench and 3) there was no coverage of the far western end of the trench which currently underlies a road. With regard TR3, the spacing was 40 feet (rather than 25 feet) and there was no coverage of the eastern quarter of this 240 foot long disposal trench. In the case of both trenches, the soil gas survey should be completed as described in the Phase III RI Workplan (1/95) or a reasonable rationale for these changes provided.

It is proposed that subsurface soil samples be collected from "one boring south of Building 401 that corresponds to BTEX soil gas detections" and that "this boring will be near confirmation boring S5-5 drilled by SMC Martin". However, these points appear to be 150 feet apart. In this case, soil borings should be conducted at each of these locations.

With regard to surface soil samples collected to date during the Phase III RI, none appear to be over the location of TR3. Samples should be collected to characterize surface soils over trench TR3 and to help scope the location of subsurface soils borings into TR3.

It is indicated that samples may be collected from the "bottom of the boring". Please define.

Overall, given the apparent incompleteness of the soil gas survey and incompleteness of a surface soil data base for Site 5, it is unclear whether the proposed soil boring program for Site 5 is sufficient.

Prior to conducting any subsurface soil borings at Site 5, I would like an opportunity to review and discuss the Navy's response to the comments above.

SITE 6

Please note that much of the writing on Sketches A and B in the Appendix is illegible. Since the illegible information may

affect the nature of EPA comments, please provide legible versions of these maps to EPA.

Sketches A and B indicate a total of five EM anomalies with no identification number, while the text in several cases refers to EM anomalies, again with no reference to indicate which anomaly is being discussed. To remedy this, each of these five EM anomalies should be assigned and ID#, e.g., 6EMA1, 6EMA2, etc.

Given the detection of BTEX compounds in PROB TR 6B, PROB TR 6D, and the locations of three (3) EM anomalies located on Sketch B, it is unclear why no test pits are proposed at these locations. An adequate rationale should be provided or test pits should be performed at each of these five locations

What percent of the length (or width) of a trench or EM anomaly will be investigated by a test pit? In any case, given the length of some of the trenches or anomalies, two samples per test pit (at one location) are not adequate. It is recommended that the number of samples be dependent on the length of trench or anomaly excavated, e.g., two samples per 20 feet of excavation length. With regard to the depth of test pit samples, what is the "maximum reach of the backhoe"?

It is indicated that "a shallow bedrock well will be installed within Site 6 if an area of significant contaminated subsurface soils is found." However, based on available information, a well (or wells) downgradient of the area depicted on Sketches C, D and E may be needed in any case.

As in the case of Site 5, prior to starting work at Site 6, I would like an opportunity to review and discuss the Navy's response to these comments. As discussed, early the week of August 14 should be a good opportunity.

Sincerely,



Darius Ostrauskas
Remedial Project Manager

cc: Tom Ames, NAWC
Kathy Davies
David Kennedy, PADEP
Andy Rola, B & V