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NSWC INDIAN HEAD  
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William Donald Schaefer  
Governor

David A. G. Carroll  
Secretary

February 10, 1994

Mr. Shawn Jorgensen  
Naval Surface Warfare Center  
Indian Head Division  
101 Strauss Avenue  
Indian Head, MD 20640-5035

Re: Draft Abbreviated Field Sampling Plan for Site 5

Dear Mr. Jorgensen:

Enclosed are comments to the Draft Abbreviated Field Sampling Plan for Site 5 - Silver Contaminated Soils. Should you need to discuss these comments, then please contact me at (410) 631-3490 or 3440.

Sincerely,

Kim Lemaster, Remedial Project Manager  
Federal/NPL Superfund Division  
Environmental Response & Restoration Program

KL/cb

Enclosure

cc: Mr. Richard Collins  
Mr. Robert DeMarco

**Maryland Department of the Environment  
Waste Management Administration  
Environmental Response and Restoration Program**

Comments to the Draft Abbreviated Field Sampling Plan for  
Site 5 - Silver Contaminated Soils,  
Indian Head Division, Naval Surface Warfare Center  
(dated January 1994)

February 1, 1994

General

The Sample Plan competently addresses the objective of delineating the extent of silver contamination (> 10 ppm) in the soil of the western swale (Swale 2) of IRP Site 5. However, a few points require further clarification:

Section 2.3.3, paragraph 4

The second paragraph discusses sampling depths to 3 feet, while the first paragraph of Section 2.1 specifies that the top two feet of soil will be sampled. Please clarify which estimated depth is correct.

Section 4.1.2.3, paragraph 1

The objective of 90 % completeness, with the possibility of a second sample collection event, is unclear. In Section 2.1, paragraph 1, the Sample Plan discusses utilizing a 24-hour lab turnaround for the first day's sampling. The results from the first days sampling are then to be used to correct for any lack of completeness in terms of delineating the extent of contamination. In conjunction with the competence of the sample team, this approach should preclude the necessity for a subsequent sample event.

If necessary, 24-hour lab turnaround for the samples collected on the second day should be utilized to meet 100% of the completeness objectives.

Section 4.6, paragraph 2

The control limit for precision based upon field duplicate samples, which specifies that the relative percent difference (RPD) be  $\leq 50\%$  for sample values greater than three times the analyte detection limit, appears to be lenient.

For example, the U.S. EPA document "Functional Guidelines for Evaluating Inorganics Analyses" (June 13, 1988) specifies a control limit of  $\pm 35\%$  RPD for sample values  $> 5$  times the contract required detection limit (CRDL, which is expected to equal or exceed the analyte detection limit) and a control limit of  $\pm (3 \times \text{CRDL})$  RPD for sample values  $< 5 \times \text{CRDL}$ .

Please justify the use of the less stringent standard.

Section 5.1, paragraph 3

The second sentence lists a boat among the equipment needed for the sample activities, but the Sample Plan does not mention any need for such equipment. This should be clarified.