

N00102.AR.002209  
NSY PORTSMOUTH  
5090.3a

LETTER REGARDING SEACOAST ANTI-POLLUTION LEAGUE REVIEW COMMENTS ON  
THE DECEMBER 2001 WORK PLAN FOR BUILDING 184 SUBFLOOR INVESTIGATION NSY  
PORTSMOUTH ME  
1/31/2001  
LEPAGE ENVIRONMENTAL SERVICES

# Lepage Environmental Services, Inc.

P. O. Box 1195 • Auburn, Maine 04211-1195 • 207-777-1049 • Fax: 207-777-1370

January 31, 2001

Portsmouth Naval Shipyard  
Code 106.3R, Building 44  
Attn: Ms. Marty Raymond  
Portsmouth, New Hampshire 03804-5000

Subject: December 2000 *Work Plan for Building 184 Subfloor Investigation*

Dear Ms. Raymond:

We are submitting comments on the December 2000 *Work Plan for Building 184 Subfloor Investigation* on behalf of the Seacoast Anti-Pollution League (SAPL). This Work Plan was prepared by Foster Wheeler Environmental Corporation and includes Tetra Tech NUS, (TtNUS) Inc.'s December 2000 *Work Plan for Sampling/Analytical Services for Test Pitting at Building 184 (Site 30) for Portsmouth Naval Shipyard* as Attachment B. We had commented on draft versions of both documents in previous comment letters. Our comments on the current Work Plans are as follows:

**1. Page 1, Section 1.1 Overview of Work Plan.** The second paragraph references the April 1998 *Site Screening Work Plan for Building 184* for field sampling and analytical procedures and requirements. The text should be revised to refer to the December 2000 *Work Plan for Sampling/Analytical Services for Test Pitting at Building 184 (Site 30) for Portsmouth Naval Shipyard*, which is contained in Attachment B. The third paragraph states that the Health and Safety Plan (HASP) will be submitted under separate cover. It should instead say that the HASP is included in Attachment A.

**2. Page 4, Section 3.0 PROJECT DESCRIPTION.** The description of the tanks in the first paragraph should mention the drainage system for the acid-proof pit. This is an important consideration for potential contamination migration. The third paragraph includes a brief description of previous sampling results for the crystalline substance found on the walls in Building 184. The reader should also be referred to the location in the Work Plan where the results are actually presented. We point out again (as we have done in earlier comment letters) that a 3-foot by 3-foot excavation is not sufficient to adequately characterize material in a pit that measures at least 30 feet by 24 feet.

- 3. Page 4, Section 3.0 PROJECT DESCRIPTION.** The 1998 site screening results are mentioned in the third paragraph, which states that "Chemical analyses from soil and well samples have not conclusively indicated any significant contaminant levels directly related to the liquids used in the former acid proof pit." As we have pointed out in several previous comment letters on Building 184, only one of the four monitoring wells installed as part of the site screening investigation appears to be downgradient of the acid-proof pit. Therefore, any statement regarding the relationship between the potential contaminant source and parameters detected (or not detected) in soil and groundwater samples should also include a qualifier that only one sampling location is actually situated downgradient of the potential source.
- 4. Page 4, Section 3.0 PROJECT DESCRIPTION.** The objective of the investigation, as stated at the beginning of the fourth paragraph, is to determine the content of the material within the pit below the existing concrete floor slab. It is important the both the Foster Wheeler Work Plan and the TtNUS Work Plan clearly state the same objectives in a consistent manner. See comment 15, below.
- 5. Page 4, Section 3.0 PROJECT DESCRIPTION.** The text in this section states that material will be removed until natural soil is reached. However, on page 6 (and elsewhere in the TtNUS Work Plan) the material removal will continue until the bottom of the acid-proof pit is reached. The text should be revised to be consistent.
- 6. Page 5, Section 4.1 Mobilization.** The text should clearly identify who or what is included in or as "craft". This comment also applies to Figure 6-1.
- 7. Page 5, Section 4.3 Sub Floor Investigation Activities.** This section should include or refer to a figure showing the location of the proposed test pit. The first paragraph states that Foster Wheeler will collect samples of the crystalline substance. However, the TtNUS Work Plan indicates that TtNUS personnel will perform the sampling. The texts should be revised to be consistent. The first paragraph also states that the work will be performed in Level C. Has the risk (if any) to the current occupants of the building been determined?
- 8. Pages 5 & 6, Section 4.3 Sub Floor Investigation Activities.** The text at the bottom of page 5 states that all materials removed will be photographed. It is also important to photograph the bottom of the pit once it is reached. The description of the excavation and removal should also address the collection of samples, and should reference the TtNUS Work Plan.
- 9. Page 6, Section 4.4 Demobilization.** What reports and record drawings will Foster Wheeler prepare, and what will be included in the reports and the drawings?
- 10. Page 6, Section 5.5 Release/Spill Reporting.** We were able to find only a reference to an Emergency Response Plan in the HASP, not the Response Plan itself. The text should be revised.

**11. Figure 6-1.** TtNUS should be added to the figure. The relationship between Foster Wheeler and TtNUS should also be spelled out in the Work Plans, particularly which is in charge with regard to safety issues.

**12. Attachment A, Pages 4-7, Section 4.0 POTENTIAL HAZARDS.** This section should include a description of the radiological hazard monitoring that will be performed during the investigation.

**13. Attachment A, Pages 4 & 5, Section 4.1 Chemical Hazards.** The exposure to metals during sampling activities is potentially more than "minimal". The results of previous sampling of the crystalline substance should also be presented in this section.

**14. Attachment A, Appendix A, Activity Hazard Analysis.** If the HASP is to cover all personnel on-site during the investigation, collection of samples of the material in the pit should also be listed. Sampling the crystalline material presents the possibility of exposure to site contaminants. The entry in the table should be revised to include this possibility.

**15. Attachment B, Page 1-1, Section 1.0 INTRODUCTION.** As we commented in our November 13, 2000, letter on the draft TtNUS Work Plan and in comment 4, above, the objectives of the proposed investigation are not presented consistently. We disagree with the portion of the Navy's response to SAPL comment number 2 (see Appendix D) that the objective is clearly stated in the last sentence of the first paragraph in Section 1.0., which says "*The results of this investigation and the previous investigation (Site Screening Report, TtNUS, March 2000) will aid the Navy in determining site-screening discussion under Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) for this site.*" That statement tells us nothing about the work to be performed except that the results will be used to make decisions. In the third paragraph of Section 1.0, the "overall objective" is identified as collecting information to determine the nature of the chemical composition of the material filling the acid-proof pit and to determine the origin of the crystalline materials observed on the floor. There is no mention of determining risk as part of the overall objective. However, the two objectives spelled out on Section 3.2, OBJECTIVES OF TEST PITTING, are (1) to obtain chemical data on the contents of the pit and the crystals growing on the floor in order to determine the origin of these crystals, and (2) to obtain an indication of the potential human health risk posed by contaminants present in the pit fill material/soil and liquids. The objectives on the proposed investigation must be clearly and consistently stated in both Work Plans.

**16. Attachment B, Page 2-3, Section 2.2 PREVIOUS INVESTIGATIONS.** As we stated in our November 13, 2000, comments on the draft TtNUS Work Plan, as well as in several previous comment letters on the Site Screening Report for Sites 30 - 32, we disagree with the statement "*Based on the findings of the site screening, the horizontal extent of contamination appears to be adequately defined.*" Reevaluation of water level and tidal data indicates that only one of the four

monitoring wells appears to be downgradient of Building 184. We have concurred with the Maine Department of Environmental Protection's previous comments on the subject as well. It is not appropriate or accurate to make any statements in the Work Plan and elsewhere about the adequacy of contaminant definition at Building 184 without qualifiers that accurately describe the limited extent of the site screening investigation. That is, conclusions on groundwater contamination are based on one sample from one well downgradient of the potential source. Furthermore, the potential contaminant migration pathway of the drain and connecting piping has not been evaluated. The text should be revised here and in other similar passages (see the first sentence in the Nature of Risk Posed by Source Area section on page 3-1, for example). It should also be noted that the investigation proposed in the Work Plans does not address source investigation or extent of contamination.

**17. Attachment B, Page 3-1, Section 3.1 Nature of Risk Posed by the Source Area.** The last sentence in the first paragraph states that, based on comments received on the Site Screening Report, "limited sampling" is needed to collect additional data on the source area is needed to make a recommendation of further action or no further action at the site. It is misleading to not also mention the numerous comment that have also been made regarding the need for additional groundwater data evaluation in order to make informed decisions.

**18. Attachment B, Page 3-2, Section 3.1 Nature of Risk Posed by the Source Area.** Comment 16, above, applies to the second bullet on page 3-2. With regard to the first bullet, as we have noted in several previous comments, while the concrete floor slab and the building itself have likely been effective in preventing infiltration of precipitation that could mobilize contaminants, there is no evidence that releases to groundwater did not occur through the bottom of the pit or via the drain mentioned earlier in the Work Plan. Both bullets should be revised.

**19. Attachment B, Page 4-7, Figure 4-1.** Why was the proposed test pit location (and only this location) selected? As we have noted in earlier comments, we do not believe that a single small test pit is sufficient to characterize the material within the acid-proof pit. Additional work will need to be performed before a decision can be made for Building 184.

**20. Attachment B, Appendix A Recommendation Plan for Site Screening Process.** The document from which Appendix A was excerpted should be cited on the title page.

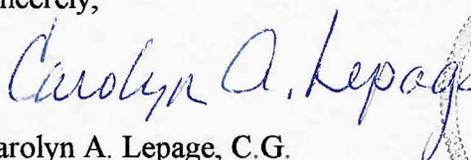
**21. Attachment B, Appendix D Navy's Responses on Draft Work Plan.** We are concerned and confused by several of the Navy's responses to our November 13, 2000, comments. These responses in general (and specifically) say that the Navy does not believe there is justification for additional monitoring wells downgradient of the site. The latest evaluation of water level data indicates that only one monitoring well is located downgradient of the acid-proof pit. Furthermore, the potential that the drainage system provided a pathway for contaminant migration has not been evaluated. Therefore, the hydrogeologic setting and groundwater chemistry has not

Page 5 of 5, M. Raymond  
January 31, 2001  
*Work Plan for Subfloor Investigation at Building 184*

been adequately characterized at Building 184. How can the Navy say that no additional monitoring wells are needed unless it anticipates a No Further Action decision is likely once the results of the proposed investigation are available? Yet the Navy acknowledges in their response to SAPL's comment 4 that the single excavation proposed in the acid-proof pit is sufficient to characterize the potential source area. Additional explanation and clarification is needed.

If you have any questions regarding the comments above, please give me a call at 207-777-1049.

Sincerely,



Carolyn A. Lepage, C.G.  
President



cc: Johanna Lyons, SAPL  
Iver McLeod, MEDEP  
Meghan Cassidy, EPA