



START

Department of Energy

Richland Operations Office
P.O. Box 550
Richland, Washington 99352

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94-RPS-178

MAR 25 1994

Ms. Dru Butler, Program Manager
Nuclear and Mixed Waste Management
State of Washington
Department of Ecology
P.O. Box 47600
Olympia, Washington 98504-7600

Mr. Douglas R. Sherwood
Hanford Project Manager
U.S. Environmental Protection Agency
712 Swift Boulevard, Suite 5
Richland, Washington, 99352

Dear Ms. Butler and Mr. Sherwood:

TRANSMITTAL OF THE NOTICE OF DEFICIENCY RESPONSE TABLE FOR THE 20 OUTSTANDING COMMENTS FOR THE HANFORD FACILITY DANGEROUS WASTE PERMIT APPLICATION, DOUBLE-SHELL TANK SYSTEM, REVISION 0 (TSD: S-2-3)

On June 28, 1991, the Hanford Facility Dangerous Waste Permit Application, Double-Shell Tank System, Revision 0 (DST System Part B), was submitted to the State of Washington Department of Ecology (Ecology) and the U.S. Environmental Protection Agency (EPA) in accordance with Hanford Federal Facility Agreement and Consent Order (Tri-Party Agreement) Milestone M-20-16. On March 24, 1993, a Notice of Deficiency (NOD) for the DST System Part B was received by the U.S. Department of Energy, Richland Operations Office (RL). The original NOD response table addressing 368 of the 388 NOD comments was submitted to Ecology and the EPA on July 22, 1993. Mr. S. E. McKinney, Ecology, agreed in a letter to Mr. C. E. Clark, RL, dated April 28, 1993, to extend the due date for the 20 remaining comments until March 25, 1994. This transmittal provides responses for these comments as agreed.

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Ms. Butler and Mr. Sherwood
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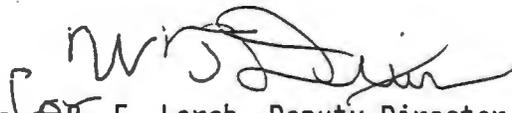
MAR 25 1994

Should you have any questions regarding this transmittal, please contact Mr. C. E. Clark, RL, on (509) 376-9333 or Mr. R. C. Bowman, Westinghouse Hanford Company, on (509) 376-4876.

Sincerely,


for James D. Bauer, Program Manager
Office of Environmental Assurance,
Permits, and Policy
Richland Operations Office

EAP:CEC


for R. E. Lerch, Deputy Director
Restoration and Remediation
Westinghouse Hanford Company

Enclosure:
Hanford Facility Dangerous
Waste Permit Application,
Double-Shell Tank System,
Revision 0, Notice of
Deficiency Response Table

cc w/encl:
D. L. Duncan, EPA
S. E. McKinney, Ecology
D. C. Nylander, Ecology

cc w/o encl:
Administrative Records w/encl.
R. C. Bowman, WHC
R. E. Lerch, WHC
S. M. Price, WHC

9413204.1285

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No.	Comment/Response	Ecology Concurrence
45.	<u>CHAPTER 3.0, SECTION 3.1, Page 3-3, Lines 10 to 16:</u>	
	Comment: The permit application briefly discusses waste designations.	
	Requirement: There must be verification of waste designation.	
	DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.	
	Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.	
	DOE-RL/WHC Second Response: The text will remain unchanged. Waste designation is for information only. Designation of waste is a generator activity. Generator activities are outside the scope of this permit application. Waste analysis plans contained in Part B permit application documentation are for waste confirmation (see WAC 173-303-300) not for waste designation. There is no regulatory requirement to use WAC 173-303-110 for confirmation activities. The Tri-Party Agreement identifies the use of the data quality objective (DQO) process as the agreed approach for sampling and analysis activities at a TSD unit.	

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59.	<p>CHAPTER 3.0, SECTION 3.1.12.2, Page 3-24, Lines 34 to 51:</p> <p>Comment: The last paragraph on page 3-24 describes equations used to convert the amount of TCLP toxics in samples from the DSTs to milligrams per liter (parts per million). The assumptions listed in the first and fourth bulleted items regarding liquid waste density are incorrectly stated as "based on the assumption that the density of the waste is approximately 1 gram per <i>millimeter</i>." The standard assumption for the density of dilute aqueous wastes (i.e., assumed to be predominantly water) is approximately 1 gram per <i>milliliter</i>, or a specific gravity = 1.0. More importantly, it is not clear why this density is assumed when it is known that the tank wastes have a greater density. The last bullet contains a line that makes no sense.</p> <p>Requirement: Revise these statements to correctly report the density units (e.g., grams per milliliter). Also, present a justification for assuming the density is 1 gram per milliliter based on known data or revise the section to more accurately reflect known information about the tank wastes. Correct the last bullet item to make sense.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the following. (1) The typographical error "gram per millimeter" will be corrected to "gram per milliliter" for the correct definition of specific gravity. (2) The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. If the specific gravity of liquids is determined to be necessary, a correction factor will be applied for proper conversion to determine the value of parts per million (ppm). (3) Last bullet should read as "Weight percent times (1.0 E4) equals parts per million".</p>	

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63.	<u>CHAPTER 3.0, APPENDICES 3-, Appendices 3A, 3B, 3C, and 3D Section 5.1.1:</u>	
	<p>Comment: Appendices 3A, 3B, 3C, and 3D Section 5.1.1. Organic components of the waste streams and DST contents have not been characterized. There is insufficient data to define the contents of the DSTs. The plan for generator waste acceptance criteria call for sampling and analysis of a minimum of four batches of each waste stream to be sent to the DSTs. Included in the sample parameter list are analyses for Total Organic Carbon (TOC) and Volatile Organic Carbon (VOC) (EPA 8240).</p> <p>Requirement: More characterization of total organic carbon constituents should be performed for waste stream and DST contents. Perhaps an HCID analysis should be performed to identify compounds which could be sources of hydrogen generation or be involved in other reactions.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: Clarification from Ecology is needed to address what the acronym HCID signifies. The scope of analyses needed for characterization will be determined during the DQO process.</p>	
64.	<u>CHAPTER 3.0, Appendix 3D, General:</u>	
	<p>Comment: The information provided within this section was hard to follow.</p> <p>Requirement: Format this section to follow WAC 173-303-300(5) requirements.</p>	

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No.	Comment/Response	Ecology Concurrence
64. cont.	<p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to present the provisions and guidance provided in WAC 173-303-300(5).</p>	
68.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 3.3, Page 8:</u></p> <p>Comment: The determination whether wastes contained in DSTs other than 101-SY, 103-AN, and 105-AN are ignitable is based on nitrate/nitrite concentrations.</p> <p>Requirement: The analysis as to whether this waste is ignitable should be based on all constituents, not just nitrate/nitrite content.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p>	

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68. cont.	DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the analyses needed to determine ignitability.	
71.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 5.1.1, Page 12:</u></p> <p>Comment: Section 5.1.1, WASTE ACCEPTANCE CRITERIA, is too vague in regards to the frequency and types of required analyses.</p> <p>Requirement: It must be explicitly stated what the frequency and types of tests required are for all waste streams. This must include adequate quality assurance and quality control.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will refine the frequency and type of analyses needed for waste acceptance.</p>	
74.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 5.1.3, Page 16:</u></p> <p>Comment: The type and frequency of verification of generators' analytical information is too vague.</p>	

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74. cont.	<p>Requirement: The information on verification must be given in greater detail. At a minimum this must include specific requirements for reanalyzing wastes, frequency for analyses, and criteria for decreased frequency of analyses. The specific analytes or parameters to be tested for must also be stated. See SW-846 for guidance.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the verification of analytical information required from generating units.</p>	
75.	<p>CHAPTER 3.0, APPENDIX 3D, Section 5.1.3, Page 16:</p> <p>Comment: The plan states, "Waste transfer data sheets, LDR notifications, analytical results and parameter removal petitions will be reviewed on yearly basis." This is too infrequent for adequate quality control.</p> <p>Requirement: These reviews must be performed on a more frequent basis. Propose an increased review frequency in the response to this NOD.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p>	

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75. cont.	<p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the frequency for reviewing the waste transfer data sheets, LDR notifications, analytical results, and parameter removal petitions.</p>	
76.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 5.2, Page 16:</u></p> <p>Comment: The plan states that characterization will include both the liquid waste and the tank vapors.</p> <p>Requirement: Tank characterization must also include solids.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the appropriate sampling and analytical methods for solids.</p>	

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78. CHAPTER 3.0, APPENDIX 3D, Section 5.2, Page 16:

Comment: The plan states that the DST wastes will be analyzed for the parameters in Table 3. These are intended to be in conjunction with evaporation, pretreatment and grout programs. This should be done in coordination with the TWRS program. A cursory examination of other documents in the TWRS program indicate that Table 3 is lacking some analytes and parameters. For example, excess Ni⁶³ levels may cause a DST waste to exceed regulatory limits for near-surface disposal via the Grout facility. The following table lists apparently missing parameters:

<u>Regulator</u>	<u>Health Effects</u>	<u>Safety/Processing</u>
Acetone	C ₆ H ₅ O ₇	Ni
Benzene	EDTA	Lanthanides
CCl ₄	Ni	silicates
Be	Y ⁹⁰	Pd
Ni ⁶³		solubility
U		shear-strength

Note that this table is by no means complete; it is anticipated that a more thorough search of necessary parameters will result in identification of additional omissions.

Requirement: Revise Table 3 to include all parameters needed for management as well as final disposition of DST wastes. The revised table should be more extensively referenced to indicate why a parameter is included (e.g., for Grout, for pretreatment, for waste management, etc.). If a parameter is to be excluded it must be justified as to why.

DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.

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78. cont.	<p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine specific parameters and sampling methods.</p>	
79.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 5.2, Page 19:</u></p> <p>Comment: The plan states that the waste in the DST System will not be reanalyzed without additional information that this is needed. This seems reasonable in consideration of ALARA concerns. It will be acceptable if all influent waste stream samples are subject to as extensive a parameter list for analysis as the existing wastes (compare Table 2 with Table 3).</p> <p>Requirement: Expand the required scope of sampling and analysis for influent waste streams to gain the same level of knowledge about them as for the existing waste. Justify departures from Table 3 parameters (e.g., process knowledge indicates there is no possibility for a particular analyte to be present in an individual waste stream, etc.). It may be necessary for each generating unit to have an individualized parameter list rather than a generic list for all generators.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p>	

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79. cont.	DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the verification requirements for each influent waste stream.	
80.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 6.1, Page 20:</u></p> <p>Comment: The plan states, "Waste stored in the DSTs are to be sampled using the 'bottle-on-string' method." This may be appropriate for the majority of DSTs, however, it obviously is not for some (e.g., Tank 241-SY-101).</p> <p>Requirement: Revise the sampling description to identify what sampling method will be used for each individual tank. A complete description of each sampling method must be included in the plan pursuant to WAC 173-303-300(5)(c).</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine sampling methods.</p>	
81.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 6.1, Page 20:</u></p> <p>Comment: The description of the bottle-on-string sampling method states that it is not possible to obtain a sample for VOA analysis due to ALARA concerns. This will be acceptable if adequate tank head-space sampling and analysis is performed.</p>	

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No.	Comment/Response	Ecology Concurrence
81. cont.	<p>Requirement: Revise the sampling and analysis plan accordingly.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine tank vapor sampling and analysis methods.</p>	
82.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 6.1.1, Page 21:</u></p> <p>Comment: The plan states, "Sufficient samples and locations are specified in the plan to address any stratification and give a representative characterization of the tank." This is an assumption that has not yet been tested or demonstrated.</p> <p>Requirement: Revise the plan to include a method of data analysis to determine if the above statement is true. Include a plan for the contingency where it is shown that the sampling methodology does not result in obtaining representative samples. See SW-846 for guidance.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p>	

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82. cont.	<p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the number of samples, sampling locations, and analytical methods.</p>	
83.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 6.1.2, Page 25:</u></p> <p>Comment: The plan mentions "appropriate housekeeping" to restore the tank to normal operating condition. It is not clear what "appropriate housekeeping" consists of. The plan must describe how wastes generated during the sampling effort will be managed.</p> <p>Requirement: Revise the plan to describe how wastes generated during the sampling effort will be managed in accordance with Chapter 173-303 WAC.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the sampling procedures and management of waste generated during the sampling effort.</p>	

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84. CHAPTER 3.0, APPENDIX 3D, Section 6.1.2, Page 25:

Comment: The plan only mentions that the sample will be labeled and very briefly describes what will be entered into the field sampling notebook. From the description, the entries in the field notebook will not adequately fulfill quality assurance/quality control requirements. It is not possible to determine if the sample bottle labeling is adequate.

Requirement: Revise the plan to correct these deficiencies. Refer to SW-846 for guidance.

DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.

Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.

DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine sampling procedures that will describe the labeling of the samples.

87. CHAPTER 3.0, APPENDIX 3D, Section 6.2, Page 27:

Comment: The Chain-Of-Custody Record description is too vague.

Requirement: Revise the description to give more detail. This must include examples and detailed descriptions of responsibility for samples throughout the process. See SW-846 for guidance.

**HANFORD FACILITY DANGEROUS WASTE PERMIT APPLICATION,
DOUBLE-SHELL TANK SYSTEM
NOTICE OF DEFICIENCY RESPONSE TABLE**

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No.	Comment/Response	Ecology Concurrence
87. cont.	<p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the records that are needed for chain-of-custody.</p>	
88.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 6.3, Page 28:</u></p> <p>Comment: The plan states that departures from the SW-846 methods may be necessary. Pursuant to WAC 173-303-110(4), modified methods must be included in the plan and the permit application in order to allow for adequate public review and comment.</p> <p>Requirement: Revise the plan accordingly.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p>	

HANFORD FACILITY DANGEROUS WASTE PERMIT APPLICATION,
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No.	Comment/Response	Ecology Concurrence
88. cont.	<p>DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQO process that was initiated on February 25, 1994. The DQO process will determine the methods for obtaining and analyzing samples. Waste designation is for information only. Designation of waste is a generator activity. Generator activities are outside the scope of this permit application. Waste analysis plans contained in Part B permit application documentation are for waste confirmation (see WAC 173-303-300) not for waste designation. There is no regulatory requirement to use WAC 173-303-110 for confirmation activities. The Tri-Party Agreement identifies the use of the DQO process as the agreed approach for sampling and analysis activities at a TSD unit.</p>	
89.	<p><u>CHAPTER 3.0, APPENDIX 3D, Section 7.0, Page 29:</u></p> <p>Comment: The Quality Assurance Plans for Tank Farms and the 222-S Analytical Lab are referred to but no copies provided.</p> <p>Requirement: Provide copies of or specifically detail the contents of the Quality Assurance Plans referred to within this section.</p> <p>DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.</p> <p>Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994. This response must include status of the issue, proposed text revisions, and plans for future work to provide missing characterization information, pursuant to Milestone M-44-00 and the DST Waste Analysis Plan.</p> <p>DOE-RL/WHC Second Response: The DST WAP incorporates all the requirements of the Quality Assurance Program Plan (QAPP) and therefore references the QAPP. A copy of the QAPP is available for onsite inspection.</p>	

HANFORD FACILITY DANGEROUS WASTE PERMIT APPLICATION,
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No.	Comment/Response	Ecology Concurrence
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321. CHAPTER 9, SECTION 9.2.3.3, Page 9-13, Lines 48 to 51:

Comment: Section 9.2.3.3. Concerns about the ignitability of hydrogen will be addressed in a Safety Improvement Plan. Results of the relevant studies are not available at this time. Plans are underway to improve primary tank ventilation capability.

Requirement: The application should address a plan to address the potential of hydrogen gas buildup to explosive or flammable limits, and the interaction with recognized ammonium nitrate crystals, ferrocyanide and other yet unknown compounds present in the tanks.

DOE-RL/WHC Response: As noted in the following letter, J. D. Bauer to G. C. Hofer and R. G. Stanley, "Request for Extension to the Double-Shell Tank System Notice of Deficiency Response," letter number 93-RPS-179, dated April 15, 1993, the "major issues" associated with the NOD comments will be identified. This comment is hereby identified as one associated with a "major issue(s)" and requires further evaluation.

Second Comment: The USDOE response to this Comment has been deferred. Response to these Comments must be provided by March 25, 1994.

DOE-RL/WHC Second Response: The text will be revised to reflect the outcome of the DST DQOs on flammability issues. The DQO for Tank Safety Screening will be implemented for all tanks to determine if a safety issue exists. In addition, safety issues for watch list tanks will be mitigated/resolved as outlined in Milestone M-40-00.

REFERENCE 1



9303483

STATE OF WASHINGTON

DEPARTMENT OF ECOLOGY

Mail Stop PV-11 • Olympia, Washington 98504-8711 • (206) 459-6000

April 28, 1993

Mr. Cliff Clark
U.S. Department of Energy
P.O. Box 550, MSIN A5-15
Richland, WA 99352

Dear Mr. Clark:

Re: Extension Request for the Double-Shell Tank System Notice of Deficiency
Response Table (Response Table)

We have reviewed your request for an extension to the time allowed for the submittal of the above response table. We agree that there are extensive changes necessary to the Double-shell Tank System Permit Application, due to a number of factors. We also agree with the approach of submitting as many of the responses as possible within the 120-day schedule, along with a schedule for submittal dates for the remaining items, and the submittal of a list of the major issues raised by the Notice of Deficiency (NOD) that will require extensive work by May 24, 1993.

We therefore grant approval of your extension request with the added condition that all responses, including the major issues identified in the May 24, 1993, submittal, must be completed within one year of the original NOD. The ultimate deadline for submittal of responses to the initial NOD is March 25, 1994. If you have any questions regarding this matter, please contact me at (206) 459-6725.

Sincerely,

A handwritten signature in cursive script that reads "Scott E. McKinney".

Scott E. McKinney
Single Shell Tank Unit Manager
Nuclear and Mixed Waste Management Program

SEM:dr

cc: Suzette Thompson, WHC
Gene Senat, DOE
Dan Duncan, EPA
Becky Austin, WHC ✓



9413204-1302

CORRESPONDENCE DISTRIBUTION COVERSHEET

Author	Addressee	Correspondence No.
J. D. Bauer, RL R. E. Lerch, WHC (S. A. Thompson, WHC)	D. Butler, Ecology D. R. Sherwood, EPA	Incoming 9401965 Xref 9451550D

Subject: TRANSMITTAL OF THE NOTICE OF DEFICIENCY RESPONSE TABLE FOR THE
20 OUTSTANDING COMMENTS FOR THE HANFORD FACILITY DANGEROUS WASTE
PERMIT APPLICATION, DOUBLE-SHELL TANK SYSTEM, REVISION 0 (TSD: S-2-3)

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		SAT File/LB	H6-24	

NOTE: The attachment to this letter is the same as the one for letter #9451550D.

9413204.1303