



STATE OF WASHINGTON  
DEPARTMENT OF ECOLOGY

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January 25, 2021

21-NWP-002

Brian T. Vance, Manager  
Office of River Protection  
United States Department of Energy  
PO Box 450, MSIN: H6-60  
Richland, Washington 99352

Valerie McCain, Project Director  
Bechtel National, Inc.  
2435 Stevens Center Place, MSIN: MS19-A  
Richland, Washington 99354

Re: Approval of 24590-WTP-PCN-ENV-20-002, Class <sup>1</sup>1 Modification to the *Hanford Facility Resource Conservation and Recovery Act Permit, Dangerous Waste Portion, Revision 8C, for the Treatment, Storage, and Disposal of Dangerous Waste, Part III, Operating Unit Group 10, Waste Treatment and Immobilization Plant (WTP Permit), WA7890008967*

Reference: See page 2

Dear Brian T. Vance and Valerie McCain:

The Department of Ecology approves the referenced Class <sup>1</sup>1 Modification. The approved Hanford Facility RCRA Permit Modification Notification Form is enclosed.

This modification updates Interim Compliance Schedule dates for LAW-1 and EMF-1 submittals.

The changes are listed on the enclosure and replace the corresponding permit Interim Compliance Schedules in Appendix 1.3 and 1.4 of the WTP Permit.

If there are any questions, please contact Mandy Jones, Permit Coordinator, at (509) 372-7916 or [mandy.jones@ecy.wa.gov](mailto:mandy.jones@ecy.wa.gov).

Sincerely,

 Digitally signed  
by Schleif,  
Stephanie (ECY)

Stephanie Schleif  
Deputy Program Manager  
Nuclear Waste Program

mj/ag  
Enclosure

cc: See page 2

Reference: Letter 20-ECD-0063, dated December 15, 2020, "Submittal of Hanford Facility Resource Conservation and Recovery Act Permit Modification Notification Form 24590-WTP-PCN-ENV-20-002"

cc electronic w/enc:

Dave Bartus, EPA	Annette Carlson, Ecology
David Einan, EPA	Nitya Chandran, Ecology
Mary Beth Burandt, USDOE-ORP	Suzanne Dahl, Ecology
Lori Huffman, USDOE-ORP	Jay Decker, Ecology
Christopher Kemp, USDOE-ORP	Tracy Gao, Ecology
Gae Neath, USDOE-ORP	Katie Hall, Ecology
Delmar Noyes, USDOE-ORP	Mandy Jones, Ecology
Bryan Trimberger, USDOE-ORP	Yoana Lucatero, Ecology
Tony McKarns, USDOE-RL	Jeff Marusich, Ecology
Sheila Davis, BNI	Dan McDonald, Ecology
Bob Haggard, BNI	Stephanie Schleif, Ecology
Felice Presti, BNI	Dan Thompson, Ecology
Brittany Sparks, BNI	Oliver Wang, Ecology
Jon Perry, MSA	Nancy Ware, Ecology
Mason Murphy, CTUIR	NWP RIM Coordinators, Ecology
Jack Bell, NPT	Environmental Portal
Rex Buck, Jr., Wanapum	Hanford Administrative Record
Laurene Contreras, YN	Hanford Facility Operating Record
ERWM Staff, YN	BNI Correspondence Control
Susan Leckbend, HAB	EPA Region 10 Hanford Field Office, Correspondence Control
David Reeploeg, Hanford Communities	MSA Correspondence Control
Max Woods, ODOE	USDOE-ORP Correspondence Control
Gail Laws, WDOH	USDOE-RL Correspondence Control
Debra Alexander, Ecology	
Jennifer Cantu, Ecology	

Attachment  
20-ECD-0063

Hanford Facility Resource Conservation and Recovery Act Permit  
Modification Notification Form 24590-WTP-PCN-ENV-20-002

(12 Pages Including Cover Sheet)

Quarter Ending: 12/31/2020

24590-WTP-PCN-ENV-20-002

RCRA Operating Record Number: R605

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**Hanford Facility RCRA Permit Modification Notification Form**  
**Part III, Operating Unit Group 10**  
**Waste Treatment and Immobilization Plant**

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Page 2 of 2: Hanford Facility RCRA Permit, Part III, Operating Unit 10, Waste Treatment and Immobilization Plant  
This Class 11 modification revises compliance dates for Interim Compliance Schedule item LAW-1 in Appendix 1.3 and EMF-1 in Appendix 1.4 of the WTP Dangerous Waste Permit.

Submitted by Co-Operator:

Reviewed by ORP Program Office:

*Robert Haggard*      11/6/2020  
*Robert D. Haggard*      *Date*

*TF*      Digitally signed by Thomas W. Fletcher  
Date: 2020.12.07 09:28:55 -08'00'  
*Thomas W. Fletcher*      *Date*

Quarter Ending: 12/31/2020

24590-WTP-PCN-ENV-20-002

RCRA Operating Record Number: R605

<b>Hanford Facility RCRA Permit Modification Notification Form</b>				
Unit: <b>Waste Treatment and Immobilization Plant</b>	Permit Part: <b>Part III, Operating Unit Group 10</b>			
<u>Description of Modification:</u>				
<p>This modification is to request a revision to the Interim Compliance Dates for Compliance Schedule Submittal items LAW-1 in Appendix 1.3 and EMF-1 in Appendix 1.4. Site access and work restrictions associated with the Hanford Site posture beginning in March 2020 have limited the ability to have people onsite to complete certain requisite field activities in support of certification, including completion of required DWP-affecting systems, structures and components and the delaying the ability to perform requisite site walkdowns with Ecology and WTP/WTCC Plant Management personnel.</p> <p>Construction Certification walkdowns with Ecology for the LAW facility resumed in July 2020 to the extent allowable. Construction Certification walkdowns have not yet been scheduled for the EMF facility, for which construction activities are ongoing, and the approval/content of the EMF DWP instrument tables remains in informal review with Ecology (reference BOF-PCN-ENV-20-001). The approved EMF instrumentation tables are needed in order to complete the EMF certification permit condition.</p> <p>Based on the current plans for resumption of field work activities and the precautions in place in order to complete the necessary work and arrange access needed to meet the permit conditions, the Permittees request the following revision to the below Interim Compliance dates:</p> <ul style="list-style-type: none"> <li>- LAW-1 for the submittal of the Low-Activity Waste construction certification documentation to the new date of June 30, 2021. This revision is due to the changes in project schedule. Additionally, a correction has been included to the permit condition reference from LAW Short Term Melter Unit III.10.11.5 to III.10.H.5.</li> <li>- EMF-1 for the submittal of the Effluent Management Facility construction certification documentation to the new date of September 30, 2021. This revision is due to the changes with the EMF construction certification walkdown schedule. Additionally, corrections have been included to Interim Compliance Items descriptions to revise "Appendix" to Chapter for consistency.</li> </ul>				
WAC 173-303-830 Modification Class:	Class 1	Class 1 <sup>1</sup>	Class 2	Class 3
Please mark the Modification Class:		X		
Enter relevant WAC 173-303-830, Appendix I Modification citation number: N/A				
Enter wording of WAC 173-303-830, Appendix I Modification citation:				
In accordance with WAC 173-303-830(4)(d)(i), this modification notification is requested to be reviewed and approved as a Class '1' modification. WAC 173-303-830(4)(d)(ii)(A) states. "Class 1 modifications apply to minor changes that keep the permit current with routine changes to the facility or its operation. These changes do not substantially alter the permit conditions or reduce the capacity of the facility to protect human health or the environment. In the case of Class 1 modifications, the director may require prior approval."				
Please note that source, special nuclear, and byproduct materials, as defined in the Atomic Energy Act of 1954 (AEA) are regulated at the U. S. Department of Energy (DOE) facilities exclusively by DOE acting pursuant to its AEA authority. DOE asserts that pursuant to AEA, it has sole and exclusive responsibility and authority to regulate source, special nuclear, and byproduct materials at DOE-owned nuclear facilities. Information contained herein on radionuclides is provided for process description purposes only.				
Modification Approved/Concur:	<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> Denied ( <i>state reason below</i> )		
Reason for denial:				
		Reviewed by Ecology:		
		Schleif, Stephanie (ECY)		
		<small>Digitally signed by Schleif, Stephanie (ECY) Date: 2021.01.25 15:36:51 -08'00'</small>		
		S. Schleif	Date	

**WASTE TREATMENT AND IMMOBILIZATION PLANT**  
**APPENDIX 1.3**  
**WTP INTERIM COMPLIANCE SCHEDULE**  
**WTP LOW-ACTIVITY WASTE FACILITY**  
**CHANGE CONTROL LOG**

Change Control Logs ensure that changes to this unit are performed in a methodical, controlled, coordinated, and transparent manner. Each unit addendum will have its own change control log with a modification history table. The “**Modification Number**” represents Ecology’s method for tracking the different versions of the permit. This log will serve as an up to date record of modifications and version history of the unit.

Modification History Table WTP INTERIM COMPLIANCE SCHEDULE

<b>Modification Date</b>	<b>Modification Number</b>
06/24/2020	8C.2020.3F
08/30/2018	8C.2018.3F
11/28/2017	8C.2017.8F

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**APPENDIX 1.3  
WTP INTERIM COMPLIANCE SCHEDULE  
WTP LOW-ACTIVITY WASTE FACILITY**

**Low-Activity Waste Interim Compliance Schedule**

	<b>Compliance Schedule Submittal</b>	<b>Interim Compliance Date<sup>1</sup></b>
	<b>III.10.C.2</b>	
LAW-1	Submit documentation stating the Waste Treatment and Immobilization Plant (WTP) Low-Activity Waste (LAW) Facility has been constructed in compliance with the Permit. Submit additional documentation not available for any additional proposed permit conditions, at the time of permit issuance to Ecology. Ecology will make a determination if additional permit conditions should be added.	<del>12/31/2020</del> 6/30/2021
	<b>III.10.C.3</b>	
LAW-3	Update and submit Waste Analysis Plan and associated Quality Assurance Project Plan (Chapter 3A and 3B) to Ecology for review and approval.	Complete
	<b>III.10.C.5.</b>	
LAW-4	Update and submit Procedures to Prevent Hazards and Inspection Schedule (Chapter 6 and Chapter 6A) to Ecology for review and approval.	Complete
	<b>III.10.C.6</b>	
LAW-5	Update and submit the Contingency Plan (Chapter 7) to Ecology for review and approval.	Complete
	<b>III.10.C.7</b>	
LAW-6	Update and submit Training Program (Chapter 8) to Ecology for review and approval.	Complete
LAW-7	Submit under separate cover the actual WTP Dangerous Waste Training Plan for incorporation into Administrative Record.	Complete
	<b>III.10.C.8</b>	
LAW-8	Update and resubmit the Closure Plan (Chapter 11) to Ecology for review and approval.	6/30/2020
	<b>Containers III.10.D.10</b>	
LAW-11	Update and submit descriptions of container management practices (Chapter 4E) to Ecology for review and approval.	Complete

**Low-Activity Waste Interim Compliance Schedule**

	<b>Compliance Schedule Submittal</b>	<b>Interim Compliance Date<sup>1</sup></b>
LAW-46	Submit the updated BOF-001 permit package associated with the Failed Melter Storage Building (Building 32).	Complete
<b>Tank Systems III.10.E.9</b>		
LAW-13	Update and submit engineering information for each dangerous waste tank and primary sump (Chapter 4E) to Ecology for review and approval.	Complete
LAW-14	Update and submit engineering information for each tank system ancillary equipment (Chapter 4E) to Ecology for review and approval.	Complete
LAW-15	Update and submit descriptions of tank management practices (Chapter 4E) to Ecology for review and approval.	Complete
<b>Containment Buildings III.10.F.7</b>		
LAW-17	Update and submit descriptions of containment building management practices (Chapter 4E) to Ecology for review and approval.	Complete
<b>LAW Short Term Melter Unit III.10.44H.5</b>		
LAW-25	Submit descriptions of management practices for the LAW Vitrification Miscellaneous Treatment System (Chapter 4E) to Ecology for review and approval.	Complete
LAW-26	Submit LAW Vitrification Environmental Performance Demonstration Test Plan for Ecology review and approval.	Complete
<b>Report of Progress</b>		
LAW-45	Update and submit Process Information (Chapter 4) to Ecology for review and approval.	Complete
<b>Final Compliance Date</b>		
LAW-32	Final Compliance Date (Hot Commissioning Complete).	12/31/2023

1

<sup>1</sup>The LAW compliance dates for construction completion (LAW-1) and final compliance (LAW-32) have been revised to reflect dates established in the Amended Consent Decree, *State of Washington v. Dept. of Energy*, Case 2:08-CV-08-5085-RMP (E.D. WA March 11, 2016)

**WASTE TREATMENT AND IMMOBILIZATION PLANT  
APPENDIX 1.4  
INTERIM COMPLIANCE SCHEDULE –  
WTP EFFLUENT MANAGEMENT FACILITY (EMF)  
CHANGE CONTROL LOG**

Change Control Logs ensure that changes to this unit are performed in a methodical, controlled, coordinated, and transparent manner. Each unit addendum will have its own change control log with a modification history table. The “**Modification Number**” represents Ecology’s method for tracking the different versions of the permit. This log will serve as an up to date record of modifications and version history of the unit.

Modification History Table APPENDIX 1.4

<b>Modification Date</b>	<b>Modification Number</b>
08/05/2020	8C.2020.4F
06/24/2020	8C.2020.3F
06/12/2019	24590-WTP-PCN-ENV-19-002 (8C.2019.Q2)
08/23/2018	8C.2018.4F
09/05/2017	8C.2017.6F

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**Appendix 1.4**  
**Interim Compliance Schedule – WTP Effluent Management Facility**

	<b>Effluent Management Facility (EMF) Compliance Schedule Submittal</b>	<b>Interim Compliance Date</b>
	<b>III.10.C.2</b>	
EMF-1	Submit documentation stating the EMF has been constructed in compliance with the Permit.	<del>12/31/2020</del> 09/30/2021
	<b>III.10.C.3</b>	
EMF-3	Update and submit for approval Waste Analysis Plan and associated Quality Assurance Project Plan (Chapter 3A and 3B) to Ecology for review and approval.	Complete
	<b>III.10.C.5</b>	
EMF-4	Update and submit for approval Procedures to Prevent Hazards and Inspection Schedule (Chapter 6 and <del>Appendix Chapter</del> 6A) to Ecology for review and approval.	Complete
	<b>III.10.C.6</b>	
EMF-5	Update and submit the Contingency Plan (Chapter 7) to Ecology for review and approval.	Complete
	<b>III.10.C.7</b>	
EMF-6	Update and submit Training Program (Chapter 8) to Ecology for review and approval.	Complete
EMF-7	Submit under separate cover the actual WTP Dangerous Waste Training Plan for incorporation into Administrative Record.	Complete
	<b>III.10.C.8</b>	
EMF-8	Update and submit the Closure Plan (Chapter 11) to Ecology for review and approval.	6/30/2020
	<b>III.10.C.11</b>	
EMF-9	Update and submit Risk Assessment Work Plan, revised in consultation with Ecology to address the Direct-Feed Low-Activity Waste configuration.	Complete
	<b>Containers III.10.D.10</b>	
EMF-11	Update and submit descriptions of container management practices ( <del>Appendix Chapter</del> 4G) to Ecology for review and approval.	Complete
	<b>Prior to Installation III.10.E.9</b>	
EMF-13	Update and submit engineering information for each dangerous waste tank ( <del>Appendix Chapter</del> 4G) to Ecology for review and approval.	Complete

	<b>Effluent Management Facility (EMF) Compliance Schedule Submittal</b>	<b>Interim Compliance Date</b>
EMF-14	Update and submit engineering information for each tank system ancillary equipment ( <del>Appendix Chapter</del> 4G) to Ecology for review and approval.	Complete
<b>Report of Progress</b>		
EMF-45	Update and submit descriptions of tank management practices ( <del>Appendix Chapter</del> 4G) to Ecology for review and approval.	Complete
<b>EMF Misc. Units Systems III.10.M.A</b>		
EMF-16	Submit engineering information for EMF Miscellaneous Treatment Unit Systems.	Complete
<b>Final Compliance Date</b>		
EMF-32	Final Compliance Date (Hot Commissioning Complete).	12/31/2023



This document has been digitally signed using the Electrosign process.

## Document for Signature

**Document Number:** 24590-WTP-PCN-ENV-20-002 **Rev:** 0

Participants	Signature	Completed	Status	Result	Comments
<b>Signers</b> 11/6/2020 1:52 PM					
Haggard, Robert		11/6/2020 2:00 PM	Completed	Approve	
<b>Final Approver</b> 11/6/2020 2:00 PM					
Haggard, Robert		11/6/2020 2:10 PM	Completed	Approve	