



STATE OF WASHINGTON
DEPARTMENT OF ECOLOGY

PO Box 47600, Olympia, WA 98504-7600 • 360-407-6000

September 30, 2022

Susan Poulsom, Manager
NPDES Permits Unit
United States Environmental Protection Agency - Region 10
1200 Sixth Avenue, Suite 155, OWW
Seattle, WA 98101

Sent by email: poulsom.susan@epa.gov

RE: Clean Water Act Section 401 Certification for EPA National Pollutant Discharge Elimination System Permit No. WA0026867, US Bureau of Reclamation - Grand Coulee Dam

Dear Susan Poulsom:

This letter is in response to the US Environmental Protection Agency's letter, dated January 13, 2022, requesting Washington State Department of Ecology (Ecology) provide a Clean Water Act Section 401 Certification for the Final National Pollutant Discharge Elimination System (NPDES) (Permit No. WA0026867, US Bureau of Reclamation - Grand Coulee Dam).

With this Section 401 Water Quality Certification, Ecology certifies NPDES Permit No. WA0026867, US Bureau of Reclamation - Grand Coulee Dam (Permit) with conditions and complies with applicable provisions of Sections 301, 302, 303, 306, and 307 of the Clean Water Act, as amended, and applicable state laws. This certification is subject to the conditions contained in the enclosed Order No. Docket #20977. The Enclosed Order may be appealed by following the procedures described in the Order.

Please note that we are operating under the 2020 Section 401 rule as of Wednesday, April 6, 2022 due to a [Supreme Court decision](#)¹. We recognize the importance of ongoing discussions among tribes, federal agencies, and other organizations who seek resolution regarding fish passage and the efforts to bring salmon back to the upper Columbia River. Notwithstanding fish passage matters, we have included conditions related to the implementation of approved Total Dissolved Gas and Temperature Total Maximum Daily Load allocations which will substantially improve conditions for the all aquatic life uses.

¹ <https://www.epa.gov/cwa-401/qa-stay-2020-rule-vacatur>

Susan Poulsom, Manager

September 30, 2022

Page 2

If you have any questions or would like to discuss these matters further, please contact Jordan Bauer, 401 Certification Lead, at (509) 688-9403 or jordan.bauer@ecy.wa.gov.

Sincerely,



Vincent McGowan, P.E.

Water Quality Program Manager

Department of Ecology

Enclosure: Order No. Docket #20977

By Certified Mail # 9489 0090 0027 6085 8863 51

cc: Jennifer Wu, Permit Writer, Region 10 EPA
Jordan Bauer, 401 Certification Lead, WQ Program
Brook Beeler, Eastern Region Director
Adriane Borgias, Eastern Region Section Manager, WQ Program
Angela Zeigenfuse, 401 Certification Coordinator, WQ Program
Jeff Killelea, Manager, Program Development Services Section, WQ Program
Loree' Randall, 401 Policy Lead, SEA Program
ecyrefedpermits@ecy.wa.gov – Aquatics ID #141185

STATE OF WASHINGTON
DEPARTMENT OF ECOLOGY

IN THE MATTER OF GRANTING A WATER)	ADMINISTRATIVE ORDER
QUALITY CERTIFICATION TO)	DOCKET #20977
U.S. Environmental Protection Agency)	Permit No. WA0026867 , US Bureau of
pursuant to 33 U.S.C. 1341 (FWPCA §)	Reclamation - Grand Coulee Dam
401), 40 CFR Part 121, RCW 90.48.120,)	
RCW 90.48.260 and chapter 173-201A)	
WAC		

TO: UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 10
ATTN: Susan Poulsom
1200 Sixth Ave, Suite 155, OWW
SEATTLE, WA 98101

On January 13, 2022, the US Environmental Protection Agency (EPA) requested a Section 401 Water Quality Certification for the NPDES permit authorizing discharges to a water of the state (defined in chapter 90.48 RCW) from the Grand Coulee Dam in Grand Coulee, Washington. On January 26, 2022, Ecology issued a public notice for the project.

On September 26, 2017, the US Bureau of Reclamation (BOR) submitted an NPDES permit application to the EPA requesting a discharge permit for the Grand Coulee hydroelectric dam. In response to the BOR application, EPA drafted a NPDES permit to authorize discharges from the Grand Coulee Dam in Grand Coulee, Washington into waters of the United States. The discharges consist of cooling water, equipment and floor drain-related water, equipment and facility maintenance-related water, and lubricants.

The Grand Coulee Dam serves to generate power for the region and provide irrigation opportunities to the Columbia River Basin. The Grand Coulee Dam is located in Grand Coulee, Washington along WA State Route 155, on the border of Grant and Okanogan Counties. The project is located in portions of Section 1, Township 28N, and Range 30E. In addition to the conditions of the NPDES permit, this 401 Certification (Certification) establishes conditions necessary to protect water quality in river flow, including the dam forebay and spill and generation tailrace water.

EPA may not issue an NPDES permit to conduct activity that may result in any discharges into waters of Washington State until Ecology has granted certification under Clean Water Act (CWA) section 401, or has waived its right to certify (33 U.S.C. 1341 (a)(1); 40 C.F.R. 124.53(a)).

This Order and Certification imposes additional conditions, beyond the conditions of the draft NPDES permit, on the Project Proponent. This Certification is based on the terms and conditions contained in the proposed draft NPDES permit. If EPA issues a final NPDES permit that contains any changes from the draft NPDES permit that do not include requirements outlined in this Certification, Ecology reserves the right to either modify or revoke this Certification. In accordance with 40 CFR 124.53(e)(3), Ecology has determined that no condition in the draft NPDES permit may be made less stringent without violating requirements in Washington State law.

AUTHORITIES

In exercising authority under 33 U.S.C. § 1341, 40 CFR Part 121, 40 CFR §124.53 - 55, RCW 90.48.120, and RCW 90.48.260, Ecology has examined EPA's request for CWA 401 certification of the draft permit pursuant to the following:

1. Conformance with applicable water quality-based, technology-based, and toxic or pretreatment effluent limitations as provided under 33 U.S.C. §1311, 1312, 1313, 1316, and 1317 (FWPCA § 301, 302, 303, 306 and 307);
2. Conformance with the state water quality standards contained in chapter 173-201A WAC and authorized by 33 U.S.C. §1313 and by chapter 90.48 RCW, and with other applicable state laws;
3. Conformance with the provision of using all known, available and reasonable methods to prevent and control pollution of state waters as required by RCW 90.48.010; and,
4. Conformance with Washington's prohibition on discharges that cause or tend to cause pollution of waters of the state of Washington as required by RCW 90.48.080.

WATER QUALITY CERTIFICATION CONDITIONS

With this Certification and through issuance of this Order, Ecology certifies that the discharge as proposed and conditioned by this Certification will comply with applicable water quality standards or other appropriate requirements of State law. In view of the foregoing and in accordance with 33 U.S.C. §1341, 40 CFR Part 121, RCW 90.48.120, RCW 90.48.260, chapter 173-200 WAC, and chapter 173-201A WAC, water quality certification is granted to the Project Proponent subject to the conditions within this Order and NPDES Permit No. WA 0026867, US Bureau of Reclamation – Grand Coulee Dam.

Certification of the proposed draft permits does not authorize the Project Proponent to exceed applicable state surface water quality standards (chapter 173-201A WAC), ground water standards (chapter 173-200 WAC) or sediment quality standards (chapter 173-204 WAC), standards in the EPA's Revision of certain Federal water quality criteria applicable to Washington (40 CFR 131.45), and other appropriate requirements of State law.

A. General Requirements

1. For the purposes of this Order, the term “Federal Agency” shall mean the US Environmental Protection Agency. The Federal Agency shall enforce the permit and ensure that the Project Proponent complies with the conditions of the permits at all times.
2. For purposes of this Order, the term “Project Proponent” shall mean the US Bureau of Reclamation seeking coverage under this permit, and its agents, assignees and contractors.
3. The Project Proponent must provide Ecology personnel access to the facility upon request for site inspections, monitoring, and/or necessary data collection to ensure that the conditions in this Order are being met.
4. Failure of any person or entity to comply with this Certification may result in Ecology taking actions, whether administrative or judicial, to enforce the terms of this Certification.

B. Water Quality Conditions

1. The Certification conditions within this Order must be incorporated into EPA’s final NPDES permit pursuant to 40 CFR §124.55(a)(2).
2. This Certification does not authorize exceedances of water quality standards established in chapter 173-201A WAC.
3. Water Quality Standards Attainment: (RCW 90.48.080 and Chapter 173-201A-510(5) WAC).

3.1. Temperature

- a. In addition to the draft NPDES permit requirements for temperature monitoring at most outfalls, the Project Proponent must implement temperature control strategies to meet the load and wasteload allocations in the Columbia River Temperature Total Maximum Daily Load (TDML) issued August 13, 2021. EPA must incorporate TMDL wasteload allocations in the final permit and provide assurance that temperature impacts of the facility will be addressed. (RCW 90.48.080, WAC 173-201A-200(1)(c), WAC 173-201A-602, Table 602).
- b. The Project Proponent must consult with Ecology to develop a water quality attainment plan (WQAP) per the conditions below:
 - i. The WQAP shall include all applicable requirements in WAC 173-201A-510(5), Compliance schedule for dams, and must include a detailed strategy for achieving Washington’s water quality standards for temperature and associated designated uses.
 - ii. The Project Proponent must provide the scope of the WQAP to Ecology for review one year after the permit effective date.

- iii. The Project Proponent must provide the final WQAP to Ecology within 2 years of the permit effective date.
- c. The Project Proponent must submit a progress report to Ecology in year 6. The Project Proponent must submit a summary report to Ecology 9 years after the original permit effective date and prior to the end of the ten-year dam compliance period.

Citation: RCW 90.48.080, WAC 173-201A-200(1)(c), WAC 173-201A-602, Table 602, and WAC 173-201A-510(5).

Justification: Condition 3.1 (a-c) is necessary to comply with state water quality criteria and meet temperature targets developed in the EPA-approved Columbia River Temperature TMDL.

3.2. Total Dissolved Gas

- a. The Project Proponent must comply with total dissolved gas standards (TDG) in WAC 173-201A-200(1)(f) or any future modification to the standards thereof. Additionally, the Project Proponent must implement total dissolved gas abatement strategies and meet the load allocation as stated in the Mid-Columbia River and Lake Roosevelt Total Dissolved Gas Total Maximum Daily Load issued June 2004 (see also the TMDL *Appendix A: Implementation Plan*). (RCW 90.48.080)
- b. Compliance with the TDG criterion does not apply when inflows to the project from Lake Roosevelt exceed the rate equivalent to the 7Q10 flows as defined in WAC 173-201A-200(1)(f)(i). The 7Q10 exceedance flow for the Columbia River at Grand Coulee Dam is 222 kcfs.
- c. The Project Proponent must consult with Ecology to develop a water quality attainment plan (WQAP) per the conditions below:
 - i. The WQAP shall include all applicable requirements in WAC 173-201A-510(5), *Compliance schedule for dams*, and must include a detailed strategy for achieving Washington's water quality standards for TDG and associated designated uses.
 - ii. The Project Proponent must provide the scope of the WQAP to Ecology for review one year after the permit effective date.
 - iii. The Project Proponent must provide the final WQAP to Ecology within 2 years of the permit effective date.
- d. As an element of the WQAP, the Project Proponent must provide a TDG monitoring and quality assurance project plan (QAPP) to Ecology within one year of the permit effective date. This QAPP is in addition to the quality assurance plan defined in Section II.A of the permit with provisions defined below:

- i. At a minimum, the QAPP must contain a map of the TDG monitoring and compliance locations, description of the monitoring, sampling frequency, equipment and sampling procedures, analytical methods, quality control procedures, data handling and assessment procedures, and reporting protocols.
 - ii. The Project Proponent must review and update the QAPP annually based on data quality objectives related to evaluation of TDG abatement and control strategies.
 - iii. Implementation of the monitoring program must begin as soon as Ecology notifies the Project Proponent of QAPP acceptance. Changes to the QAPP must be provided to Ecology before taking effect.
- e. The Project Proponent must submit a WQAP progress report to Ecology in year 6. The Project Proponent must submit a summary report to Ecology 9 years after the original permit effective date and prior to the end of the ten year dam compliance period.

Citation: RCW 90.48.080, WAC 173-201A-200(1)(f), WAC 173-201A-200(1)(f)(i), WAC 173-201A-510(5)

Justification: Condition 3.2 (a-e) is required for compliance with state water quality TDG criteria and TDG targets developed for Grand Coulee Dam in the Mid-Columbia River and Lake Roosevelt TDG TMDL.

4. Quality Assurance Plan (QAP): (RCW 90.48.080)

The Federal Agency must review all QAP requirements in Section II.A of the permit and any subsequent modification to the QAP.

Citation: RCW 90.48.080

Justification: Condition 4 is required to ensure the prepared QAP and any future modification follows the Federal Agency's approved QA/QC and chain-of-custody procedures so that the data collected and submitted is accurate, complete, and representative of the environmental or effluent conditions.

5. Best Management Practices (BMP) Plan: (RCW 90.48.080)

Use of a BMP Plan implies that there is reasonable potential to violate water quality standards. Ecology concurs with the Permit that BMPs are an appropriate mechanism for purposes of source control and eliminating toxic pollutants into receiving waters. However, elements of the BMP Plan, as written in the draft NPDES permit, are not quantifiable nor do they provide assurance that BMP implementation will be adaptively managed. Therefore, the following conditions related to the BMP Plan must be included in the final permit:

- a. The BMP Plan must be subject to Federal Agency review and approval. As a permit submittal, the Federal Agency must review the initial report and any annual updates to ensure the plan is comprehensive, complete and accurate.
- b. Plan requirements include a provision for reporting sampling data. This sampling must be designed in a way to quantify source identification and reductions in order to substantiate the adaptive management process that makes a BMP approach successful. The sample design and data analysis, including methods and method reporting levels, must be included in the QAP (Section II.A) and updated as necessary.
- c. The annual report submittal requirement in Section II.B.4 of the permit must also include the adaptive management procedures implemented based on the results of all monitoring used to evaluate the BMP.

Citation: RCW 90.48.080

Justification: Condition 5 (a-c) is required to ensure the BMP Plan mitigates for the unlawful discharge of toxic pollutants.

6. Environmentally Acceptable Lubricants: (RCW 90.48.080)

The Federal Agency must review all Environmentally Acceptable Lubricants (EAL) annual reports. The initial EAL report must be reviewed by both the Federal Agency and Ecology to ensure the plan is comprehensive, complete, accurate, and concurs with the state's interpretation of technical infeasibility.

Citation: RCW 90.48.080

Justification: Condition 6 is required to ensure that the EALs are appropriate for the purpose and equipment.

7. PCB Management Plan: (RCW 90.48.080 and 90.48.520)

The Federal Agency and Ecology must review the initial PCB Management Plan. Ecology concurs with the Permit that BMPs are an appropriate mechanism for purposes of source control and eliminating PCB release into receiving waters. As a permit submittal by the Project Proponent, the Federal Agency must review any annual updates to ensure the plan is comprehensive, complete and accurate.

Citation: RCW 90.48.080, RCW 90.48.520

Justification: Condition 7 is required to ensure that the PCB Management Plan is comprehensive, complete and accurate to eliminate unnecessary risks of PCB discharging into receiving waters.

8. Cooling Water Intake Structures: (90.48.080)

- a. The Federal Agency must review the cooling water intake structure (CWIS) annual report. Twenty-five of the thirty-nine permitted outfalls are for cooling water with discharge flows totaling approximately 87 million gallons per day

(MGD). The 2014 316(b) rule requires implementation of best technologies available for minimization of fish impingement mortality and adverse effects from entrainment (40 CFR 125.94(c) and 40 CFR 125.94(f), respectively).

- b. Ecology must receive for review, the initial CWIS annual report. Given that no information related to the CWIS design, including screen design, was provided with the NPDES permit application, this first annual report must include information on all cooling water intake structures that address the missing application submittal requirements of 40 CFR 122.21(r)(2) and (3) and applicable provisions of paragraphs (4), (5), (6), (7) and (8). This information is necessary for concurrence with EPA's best technology available (BTA) determination.
- c. The Project Proponent must develop an operation and maintenance manual that includes procedures for evaluating both impingement and entrainment related to the CWIS. This does not include the intake for hydroelectric generating waters. (40 CFR 122.21(r))
- d. EPA's rules at 40 CFR 125.98(b)(1) also require that the final NPDES permit specifically include the following language "Nothing in this permit authorizes take for the purposes of a facility's compliance with the Endangered Species Act." The final permit must include this condition. (WAC 173-201A-200(1))

Citation: RCW 90.48.080, 40 CFR 125.94(c), 40 CFR 125.94(f), 40 CFR 122.21(r)(2-3 and applicable provisions of paragraphs (4), (5), (6), (7), and (8), 40 CFR 122.21(r), 40 CFR 125.98(b)(1), WAC 173-201A-200(1)

Justification: Condition 8 (a-d) ensure that fish passage mortality and adverse effects from fish impingement and entrainment are minimized at CWIS.

C. Timing Requirements

This Certification is valid until the expiration date including any administrative extension or termination date of the Permit No. WA0026867, USBOR - Grand Coulee Dam (40 CFR § 122.46).

D. Notification Requirements

The Federal Agency shall enforce and the Project Proponent must comply with all the reporting and notification conditions of the NPDES permit in order to comply with this Order and the certification conditions herein, including conditions of the permit requiring the Project Proponent to report to Ecology.

YOUR RIGHT TO APPEAL

You have a right to appeal this Order to the Pollution Control Hearing Board (PCHB) within 30 days of the date of receipt of this Order. The appeal process is governed by chapter 43.21B RCW and chapter 371-08 WAC. "Date of receipt" is defined in RCW 43.21B.001(2).

To appeal you must do all of the following within 30 days of the date of receipt of this Order:

- File your appeal and a copy of this Order with the PCHB (see addresses below). Filing means actual receipt by the PCHB during regular business hours.
- Serve a copy of your appeal and this Order on Ecology in paper form - by mail or in person (see addresses below). E-mail is not accepted.

You must also comply with other applicable requirements in chapter 43.21B RCW and chapter 371-08 WAC.

ADDRESS AND LOCATION INFORMATION

Street Addresses

Department of Ecology

Attn: Appeals Processing Desk
300 Desmond Drive SE
Lacey, WA 98503

Pollution Control Hearings Board

1111 Israel RD SW
STE 301
Tumwater, WA 98501

Mailing Addresses

Department of Ecology

Attn: Appeals Processing Desk
PO Box 47608
Olympia, WA 98504-7608

Pollution Control Hearings Board

PO Box 40903
Olympia, WA 98504-0903

CONTACT INFORMATION

Please direct all questions about this Order to:

Jordan Bauer, 401 Certification Lead
Department of Ecology
4601 N. Monroe Street
Spokane, WA 99205-1295
(509)-688-9403
jordan.bauer@ecy.wa.gov

MORE INFORMATION

- [Pollution Control Hearings Board Website](#)²
- [Chapter 43.21B RCW - Environmental and Land Use Hearings Office – Pollution Control Hearings Board](#)³
- [Chapter 371-08 WAC – Practice And Procedure](#)⁴
- [Chapter 34.05 RCW – Administrative Procedure Act](#)⁵
- [Chapter 90.48 RCW – Water Pollution Control](#)⁶
- [Chapter 173.204 Washington Administrative Code \(WAC\) Sediment Management Standards](#)⁷
- [Chapter 173-200 WAC Water Quality Standards for Ground Waters of the State of Washington](#)⁸
- [Chapter 173-201A WAC Water Quality Standards for Surface Waters of the State of Washington](#)⁹

SIGNATURE



Vincent McGowan, P.E.
Water Quality Program Manager
Department of Ecology
State of Washington

² <http://www.eluho.wa.gov/Board/PCHB>

³ <http://apps.leg.wa.gov/RCW/default.aspx?cite=43.21B>

⁴ <http://apps.leg.wa.gov/WAC/default.aspx?cite=371-08>

⁵ <http://apps.leg.wa.gov/RCW/default.aspx?cite=34.05>

⁶ <http://apps.leg.wa.gov/RCW/default.aspx?cite=90.48>

⁷ <https://apps.leg.wa.gov/WAC/default.aspx?cite=173-204>

⁸ <https://apps.leg.wa.gov/WAC/default.aspx?cite=173-200>

⁹ <https://apps.leg.wa.gov/WAC/default.aspx?cite=173-201A>