**DRAFT – BRIDGE AND FERRY TERMINAL WASHING GENERAL PERMIT**

**A NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM AND STATE WASTE DISCHARGE GENERAL PERMIT**

A general permit to set guidelines for bridge and ferry terminal washing across the state. The permit serves to protect water quality while supporting inspection and maintenance of bridges and protecting the safety of Washington commuters.

*State of Washington*
*Department of Ecology*
*Olympia, Washington*

In compliance with the provisions of
The State of Washington Water Pollution Control Law
Chapter 90.48 Revised Code of Washington
and
The Federal Water Pollution Control Act
(The Clean Water Act)
Title 33 United States Code, Section 1251 et seq.

Until this permit expires, is modified or revoked, Permittees that have properly obtained coverage under this general permit are authorized to discharge in accordance with the special and general conditions, which follow.

**DRAFT**

Vincent McGowan, P.E.
Water Quality Program Manager
Washington State Department of Ecology
This page intentionally left blank.
# TABLE OF CONTENTS

Summary Of Permit Report Submittals ................................................................. 5

Special Conditions .................................................................................................. 6

S1. Permit Coverage ................................................................................................. 6
S2. Application For Coverage .................................................................................. 6
S3. Compliance With Standards ............................................................................... 9
S4. Discharge Limits ................................................................................................. 10
S5. Monitoring Requirements .................................................................................. 22
S6. Solid Waste Disposal ......................................................................................... 25
S7. Spill Prevention And Control ............................................................................ 25
S8. Reporting And Recordkeeping Requirements .................................................... 26
S9. Notice Of Termination ......................................................................................... 29

General Conditions .................................................................................................. 30

G1. Discharge Violations ......................................................................................... 30
G2. Proper Operation And Maintenance ................................................................. 30
G3. Notification Of Unauthorized Discharge Including Spills ......................... 30
G4. Bypass Prohibited ............................................................................................. 31
G5. Right Of Inspection And Entry .......................................................................... 31
G6. Duty To Mitigate ................................................................................................. 32
G7. Property Rights .................................................................................................. 32
G8. Compliance With Other Laws And Statutes .................................................... 32
G9. Removed Substances ......................................................................................... 32
G10. Severability ....................................................................................................... 32
G11. Revocation Of Coverage ................................................................................ 32
G12. General Permit Modification And Revocation ............................................. 33
G13. Reporting Planned Changes .......................................................................... 33
G14. Appeals ............................................................................................................ 34
G15. Penalties ........................................................................................................... 34
G16. Duty To Reapply ............................................................................................... 34
G17. Signatory Requirements ................................................................................ 34
G18. Payment Of Fees ............................................................................................... 35
G19. Upset ............................................................................................................... 35
G20. Other Requirements Of 40 Cfr ...................................................................... 36
G21. Duty To Comply ............................................................................................... 36
G22. Toxic Pollutants ............................................................................................... 36
G23. Penalties For Tampering ............................................................................... 37
G24. Reporting Other Information ........................................................................ 37

Appendix A: Glossary ............................................................................................. 38

Appendix B: Protocol For Upland Wash Water Effluent Disposal ....................... 42
ADA ACCESSIBILITY

The Department of Ecology is committed to providing people with disabilities access to information and services by meeting or exceeding the requirements of the Americans with Disabilities Act (ADA), Section 504 and 508 of the Rehabilitation Act, and Washington State Policy #188.

To request ADA Accommodation, contact Water Quality Reception at 360-407-6600. For Washington Relay Service or TTY call 711 or 877-833-6341. Visit Ecology’s accessibility webpage¹ for more information.

For document translation services, call Water Quality Reception at 360-407-6600. Por publicaciones en español, por favor llame Water Quality Reception al 360-407-6600.

¹ https://ecology.wa.gov/About-us/Accountability-transparency/Our-website/Accessibility
SUMMARY OF PERMIT REPORT SUBMITTALS

Refer to the Special and General Conditions of this permit for additional submittal requirements.

<table>
<thead>
<tr>
<th>Permit Condition</th>
<th>Submittal</th>
<th>Frequency</th>
<th>First Submittal Date</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>S4.H</strong></td>
<td>No Ecology submittal – prepare a spill prevention and response for painting operators and keep on site</td>
<td>As Necessary</td>
<td></td>
</tr>
<tr>
<td><strong>S5 &amp; S8</strong></td>
<td>Annual/Project Completion Report Discharge Monitoring Reports</td>
<td>Annually or with Termination Notice</td>
<td>For WSDOT: February 28, 2023 For Singular projects: February 28th of the year following project completion or before permit termination whichever sooner.</td>
</tr>
<tr>
<td><strong>S8.C</strong></td>
<td>Non-compliance Notification</td>
<td>As necessary</td>
<td></td>
</tr>
<tr>
<td><strong>S8.D</strong></td>
<td>No Ecology submittal – Update list of activities planned for the next twelve months on Permittee’s website</td>
<td>Annually or As Necessary</td>
<td>February 28, 2023</td>
</tr>
<tr>
<td><strong>G3</strong></td>
<td>Notification of Unauthorized Discharges and Spills</td>
<td>As Necessary</td>
<td></td>
</tr>
<tr>
<td><strong>G12</strong></td>
<td>Transfer of Coverage</td>
<td>As Necessary</td>
<td></td>
</tr>
<tr>
<td><strong>G13</strong></td>
<td>Reporting Planned Changes</td>
<td>As Necessary</td>
<td></td>
</tr>
<tr>
<td><strong>G16</strong></td>
<td>Duty to Reapply</td>
<td>Once</td>
<td>180 days prior to permit expiration July 31, 2027</td>
</tr>
<tr>
<td><strong>G24</strong></td>
<td>Reporting Other Information</td>
<td>As Necessary</td>
<td></td>
</tr>
</tbody>
</table>

The text of this permit contains words or phrases in **bold and italics**. These words or phrases are the first usage in the permit and are defined in Appendix A.
SPECIAL CONDITIONS

S1. PERMIT COVERAGE

A. Permit Area

This Bridge and Ferry Terminal Washing General Permit (BWGP) covers all areas of Washington State except for projects operated by any department, agency, or instrumentality of the executive, legislative, and judicial branches of the Federal Government of the United States, or another entity, such as a private contractor, performing bridge or ferry terminal washing or painting activity for any such department, agency, or instrumentality; or within “Indian Country” as defined in 18 U.S.C. §1151, except portions of the Puyallup Reservation as noted below.

Indian Country includes:

- All land within any Indian Reservation notwithstanding the issuance of any patent, and, including rights-of-way running through the reservation. This includes all federal, tribal, and Indian and non-Indian privately owned land within the reservation.
- All off-reservation Indian allotments, the Indian titles to which have not been extinguished, including rights-of-way running through the same.
- All off-reservation federal trust lands held for Native American Tribes.

Puyallup Exception: Following the Puyallup Tribes of Indians Land Settlement Act of 1989, 25 U.S.C. §1773; the permit applies to land within Puyallup Reservation except for discharges to surface water on land held in trust by the federal government.

B. Activities Covered Under this General Permit

Operators who generate discharges to waters of the state associated with spot cleaning, maintenance washing (low pressure washing), preparatory washing (high pressure washing), and painting of bridges and ferry terminal transfer spans and associated overwater structures such as ferry terminal towers, wingwalls, and dolphins in Washington State are required to seek coverage under this general permit.

Coverage under this permit is not required for cleaning, washing, or painting activities that fully contain the wastewater and have no discharge to waters of the state.

S2. APPLICATION FOR COVERAGE

The operator must submit a complete and accurate permit application to Ecology for the type of coverage desired. The application form is called a Notice of Intent, or NOI. When the application form is available electronically, the Permittee must submit an application electronically using Ecology’s Water Quality Permitting Portal – Permit
Coverage Notice of Intent (NOI) application, unless the applicant applies for and receives an Electronic Reporting Waiver from Ecology.

C. Permit Application Form

The entity must submit the NOI at least 60 days before discharging wash water from activities and must submit it on or before the date of the first public notice (see Special Condition S2.B below for details). The 30-day public comment period required by WAC 173-226-130(5) begins on the publication date of the second public notice per S2.B. Unless Ecology responds to the complete application in writing, based on public comments, or any other relevant factors, coverage under the general permit will automatically commence on:

- The thirty-first day following receipt by Ecology of a completed NOI,
- The thirty-first day following the end of the 30-day comment period, or
- The effective date of this permit, whichever is later, unless Ecology specifies a later date in writing.

D. Public Notice of Application (PNOA)

Before carrying out the activities covered under this general permit, the applicant must publish a public notice at least one time each week for two consecutive weeks, in a newspaper of general circulation within the geographical area of the proposed discharge pursuant to WAC 173-226-130.

1. General Requirements for the Public Notice of Application.

Every PNOA must contain:

a. A statement that “The applicant is seeking coverage under the Washington Department of Ecology’s NPDES and State Waste Discharge General Permit for Discharges Associated with Bridge and Ferry Terminal Washing Activities;

b. The legal name and address of the applicant;

c. The name and phone number of a project manager or supervisor who will be available to respond to emergencies, inquiries, or directives from Ecology;

d. The type of project(s): Bridge Spot Cleaning, Bridge Routine Maintenance, Ferry Transfer Span/Overwater Metal Structure Cleaning, Bridge Pre-Painting Washing, or Ferry Transfer Span/Overwater Metal Structure Pre-Painting Washing;
e. The statement: “Any person desiring to present their views to the Department of Ecology regarding this application may do so in writing within thirty days of the last date of publication of this notice. Comments shall be submitted to the Department of Ecology, Water Quality Program, Bridge Washing Permit, P.O. Box 47696, Olympia, WA 98504-7696. Any person interested in the Department’s action on this application may notify the Department of their interest within thirty days of the last date of publication of this notice.”; and

f. A certification that the application is correct and accurate, signed by either a principal executive officer or ranking elected official of the municipality.

2. PNOA for single structure projects – A single structure project involves one or more types of activities at a single location. In addition to the General Requirements above, the applicant must complete the public notice requirements in Condition S2.B and publish the following information:

   a. The name, address and location of the activity site;

   b. The type of activity(s) that will result in a discharge, (e.g. bridge cleaning, ferry terminal cleaning, etc.);

   c. The name of the receiving water(s) (i.e., the surface water(s) or ground that the site will discharge to);

   d. The location of the discharge (latitude and longitude).

   e. The estimated project start and completion dates; and

   f. An On-Site Contact Person – Typically, the operations supervisor or lead designated by the Permittee for each specific site. The notification must include the contact’s name, phone number, and email address (if available).

3. PNOA for multiple structure projects – Multiple structure projects involve one or more types of activities at multiple locations. In addition to the General Requirements above, the applicant must complete the public notice requirements in Condition S2.B and publish the following information:

   a. The name, address and locations of the activity sites;

   b. The type of activity(s) that will result in a discharge, (e.g. bridge cleaning, ferry terminal cleaning, etc.);

   c. The name of the receiving water(s) (i.e., the surface water(s) or ground that the site will discharge to);

   d. The locations of the discharge (latitude and longitude).

   e. The estimated projects’ start and completion dates for the structures planned in the first year of permit coverage.
f. A Permittee public website showing planned projects and their schedules and kept up-to-date if the schedules change; and

g. An On-Site Contact Person – Typically, the operations supervisor or lead designated by the Permittee for each specific site. The notification must include the contact’s name, phone number, and email address (if available).

4. PNOA for Washington State Department of Transportation (WSDOT) – For WSDOT, coverage under this general permit is automatic and begins on the effective date of this permit. For coverage of any structure or activity for which the NOI was submitted after the effective date of this Permit, WSDOT must follow the application for coverage process under Conditions S2.A and S2.B.

S3. COMPLIANCE WITH STANDARDS

A. Water Quality Standards

Discharges or activities under this permit must not cause or contribute to a violation of the Surface Water Quality Standards (chapter 173-201A WAC), Ground Water Standards (chapter 173-200 WAC), Sediment Quality Standards (chapter 173-204 WAC) or the National Toxics Rule (40 CFR 131.36). Discharges that are not in compliance with these standards are not authorized.

B. All Known, Available and Reasonable Methods of Prevention, Control and Treatment (AKART)

Prior to conducting activities which may result in a discharge to waters of the state, the Permittee must use all known, available and reasonable methods of prevention, control and treatment (AKART).

C. Mixing Zones

This permit authorizes a small acute mixing zone around the point of discharge (WAC 173-201A-400) for those discharges into receiving waters meeting the minimum requirements identified in S4. An acute mixing zone of 2.5% of receiving water flow is authorized for flowing fresh waters. An acute mixing zone of 20 feet around the point of discharge is authorized for marine waters.

S4. DISCHARGE LIMITS

A. Requirements Applicable to All Permitted Activities

1. The Permittee must have an application for coverage for the activity approved by Ecology pursuant to S2 above.

2. The Permittee must not damage vegetation in the riparian (streamside or shoreline) area located within 200 feet perpendicular to the water and adjacent to the structure. The Permittee may use existing parking lots and open managed fields within the riparian area for staging work.

3. During cleaning activities, if debris, substances, or wash water could enter waters of the state through drains, the Permittee must, where possible, temporarily block the drains to route water to the landward end(s) of the structure and onto vegetative areas.

4. Debris and substances resulting from cleaning activities must be collected, contained, and deposited in a site above the limits of flood water or extreme high tide for which the Permittee has obtained the appropriate regulatory approval. The Permittee must not place any debris, marine growth, or substances in road drainages, wetlands, riparian (streamside or shoreline) areas, or on adjacent land where these substances may erode into waters of the state.

5. The Permittee must wash with clean water and must not use any detergents or other cleaning agents.

6. Where treated wood associated with the structure being washed are present, the Permittee must use non-abrasive methods and tools that, to the maximum extent practicable, minimize removal of the creosote or treated wood fibers when it removes marine growth from creosote or any other treated wood.

B. Bridge Spot Cleaning

The Permittee may spot clean with water in preparation for inspection. This type of washing entails dry and/or wet methods, such as, but not limited to, hand/dry scraping, sweeping, vacuuming, and low-pressure high volume washing. This only applies to washing operations performed for partial structure inspection and not the full bridge structure and it does not apply to operations such as street sweepers.

1. The Permittee may discharge to ground at a location near the bridge or transfer span only if the soils and slope are suitable for infiltration, and protocols in Appendix B are followed. The Permittee must have proper permissions from the land owner for the discharge.
2. The Permittee must not discharge to wetlands or to lakes and rivers listed as Category 4 or 5 on the latest WQ Assessment for both water column or sediment for copper, zinc, or lead. For these cases, the wastewater may be directed to ground discharge per S4.B.1.

3. For work located over marine water, the Permittee must avoid washing structures during high or low slack tide, except when washing during slack tide is necessary for the health or safety of workers or the general public, or to avoid conflict with other legal requirements.

4. The Permittee may discharge to surface waters only if the conditions in S4.B.5 through S4.B.13 below are met.

5. The Permittee may discharge wastewater to surface waters with flows less than 231 cubic feet per second (CFS) in Western Washington and less than 144 CFS in Eastern Washington only during seasonally high flow periods. The seasonally high flow periods are:
   a. West of the Cascade Mountain Crest: November 1 to May 31.
   b. East of the Cascade Mountain Crest: December 1 to June 30.

6. If the Permittee does not have hydraulic project approval from Washington State Department of Fish & Wildlife for this work, the Permittee must contact Washington State Department of Fish & Wildlife\(^2\) prior to conducting the project and comply with any other requirements related to fish habitat protection.

7. The Permittee must not discharge wash water directly onto streambeds not covered in water. If the streambed is exposed or partially exposed the Permittee must provide a mechanism for discharge of wash water directly to the receiving waters, or direct wastewaters to ground discharge at a location near the bridge or transfer span per the protocol in Appendix B.

8. Where discharge is to an intermittent stream and there is no flow in the stream, the Permittee must follow protocol in Appendix B and conduct the washing activity only if the groundwater is at least 18 inches below the exposed streambed before the activity.

9. The Permittee must, to the maximum extent practicable, minimize the scour impact of wash water discharges to the exposed soil on the stream bank below the bridge structure where soil erosion can cause exceedance of the applicable surface water quality criteria for turbidity in the receiving water. The Permittee may use best management practices to minimize scour such as using a tarp or berms, taking advantage existing vegetation, or combination thereof.

\(^2\) http://wdfw.wa.gov/licensing/hpa/
10. The Permittee must not work or use equipment below the Ordinary High Water Mark (OHWM) except to install Best Management Practices (BMPs) to direct the discharge of wash water to flowing water or to adjacent upland/ground as allowed above and after obtaining the appropriate regulatory approval.

11. The Permittee must remove residual grease by hand and ensure that such material cannot enter waters of the state. The use of degreasers on absorbent material is allowed provided none of this material enters waters of the state.

12. The Permittee must use dry methods and equipment (scraping, sweeping, vacuuming) prior to flushing that will prevent debris and substances from entering waters of the state.

13. The Permittee must wash with the minimum high volume, low pressure water necessary to accomplish the work and prevent the removal of existing paint and subsequent discharge to waters of the state.

14. The Permittee must collect and report the information required under the monitoring Condition S5, including the proper disposal of debris and substances resulting from the cleaning activity, per reporting requirements in Condition S8.

C. Bridge Routine Maintenance Cleaning and Washing

Routine maintenance cleaning and washing involves washing structures, typically on a 1-5 year cycle, to remove dirt and other material and to extend the life of the paint, which can protect the structure. This type of washing entails high volume-low pressure washing. This Condition applies to maintenance cleaning and washing operations intended to remove dirt and other material from structures to extend the life of the paint and does not apply to other routine bridge maintenance operations such as street sweepers.

1. The Permittee may discharge to ground at a location near the bridge or transfer span if the soils and slope are suitable for infiltration, and protocols in Appendix B are followed. The Permittee must have proper permissions from land owner for the discharge.

2. The Permittee must not discharge to wetlands or to lakes and rivers listed as Category 4 or 5 on the latest WQ Assessment for both water column or sediment for copper, zinc, or lead. For these cases, the wastewater may be directed to ground discharge per S4.C.1.

3. For work located over marine water, the Permittee must avoid washing structures during high or low slack tide, except when washing during slack tide is necessary for the health or safety of workers or the general public, or to avoid conflict with other legal requirements.
4. The Permittee may only discharge to surface waters subject to the conditions in S4.C.5 through S4.C.16 below.

5. The Permittee may discharge wastewater to surface waters with flows less than 231 cubic feet per second (CFS) in Western Washington and less than 144 CFS in Eastern Washington only during seasonally high flow periods.

   The seasonally high flow periods are:
   
   a. West of the Cascade Mountain Crest: November 1 to May 31.
   b. East of the Cascade Mountain Crest: December 1 to June 30.

6. If the Permittee does not have hydraulic project approval from Washington State Department of Fish & Wildlife for this work, the Permittee must contact Washington State Department of Fish & Wildlife\(^3\) prior to conducting the project and comply with any other requirements related to fish habitat protection.

7. The Permittee must not discharge wash water directly onto streambeds not covered in water. If the streambed is exposed the Permittee must provide full or partial containment with no discharge to a dry river/stream/creek bed (the area of channel below the OHWM). The Permittee may direct wastewaters to ground discharge at a location near the bridge or transfer span per the protocol in Appendix B.

8. Where discharge is to intermittent streams and there is no flow in the stream, the Permittee may follow protocol in Appendix B and conduct the washing activity only if the groundwater is at least 18 inches below the exposed streambed before the activity.

9. The Permittee must, to the maximum extent practicable, minimize the scour impact of wash water discharges to the exposed soil on the stream bank below the bridge structure where soil erosion can cause exceedance of the turbidity standard in the receiving water. The Permittee may use best management practices to minimize scour such as using a tarp or berms, taking advantage existing vegetation, or combination thereof.

10. The Permittee must not work or use equipment below the OHWM except to install BMPs to direct the discharge of wash water to flowing water or to adjacent upland/ground as allowed above and after obtaining the appropriate regulatory approval.

11. For bridges that have not been cleaned within the past twelve months, the bridge must be cleaned in the dry prior to washing. The Permittee must use dry methods and equipment (scraping, sweeping, vacuuming) that will prevent debris and substances from entering waters of the state.

\(^3\) [http://wdfw.wa.gov/licensing/hpa/](http://wdfw.wa.gov/licensing/hpa/)
12. For bridges that have been cleaned within the past twelve months and the discharge is to surface waters with flows greater than thresholds identified in Section S4.C.5, dry methods of cleaning prior to washing are only required if the bridge has nesting colonies of birds or visually loose paint. The Permittee shall use dry methods and equipment (scraping, sweeping, vacuuming) that will prevent bird nests, fecal material, and loose paint from entering waters of the state.

13. The Permittee must remove residual grease by hand and ensure that such material cannot enter waters of the state. The use of degreasers on absorbent material is allowed provided none of this material enters waters of the state.

14. The Permittee must wash with the minimum high volume, low pressure water necessary to accomplish the work that prevents the removal of existing paint and subsequent discharge to waters of the state.

15. The Permittee must plug drains to prevent debris and substances from entering waters of the state during washing activities. The Permittee must prevent debris from accumulating in drains by removing them regularly. After removing the debris from the plugged drains to the maximum extent practicable, the Permittee may flush any remaining debris with clean water and restore drain function.

16. The Permittee must collect and report the information required under the monitoring Condition S5, including the proper disposal of debris and substances resulting from the cleaning activity, per reporting requirements in Condition S8.

D. Bridge Preparatory (Pre-painting) Cleaning and Washing

Preparatory (pre-painting) washing operation uses high pressure washers to remove paint from metal structures and to prepare them for painting. This is done when the paint system on the metal structures deteriorates and peels off exposing the underlying metal to damaging effects of air and moisture.

The requirements below do not apply to bridge painting operations that involve abrasive blasting that are designed and carried out with full containment to ensure there is no waste discharge to surface or ground water. Where preparatory operations result in discharge of wastewater to waters of the state, the Permittee must follow the requirements below.

1. No discharge is allowed to wetlands or to lakes and rivers listed as Category 4 or 5 on the latest WQ Assessment for both water column or sediment for copper, zinc, or lead, and to rivers with flows less than 356 CFS in Western Washington and less than 157 CFS in Eastern Washington.
Treated wash water, after passing through filter fabric #100 sieve, may be directed to ground discharge at a location near the bridge or transfer span if the soils and slope are suitable for infiltration. The Permittee must meet all applicable conditions in S4.D, including but not limited to S4.D.4 and S4.D.5. The Permittee must have proper permissions from land owner for the discharge.

2. If the Permittee does not have hydraulic project approval from Washington State Department of Fish & Wildlife for this work, the Permittee must contact [Washington State Department of Fish & Wildlife](http://wdfw.wa.gov/licensing/hpa/) prior to conducting the project and comply with any other requirements related to fish habitat protection.

3. The tables below contain the information on the number of pressure washers and minimum stream flow in cubic feet per second (cfs) needed for streams in Western and Eastern Washington. The pressure washer flows are based on using a pressure washer with a flow rate of 3 gallons/minute (gpm). The Permittee must not operate more than six pressure washers simultaneously.

   a. For Western Washington

<table>
<thead>
<tr>
<th>Number of pressure washers (total pressure washer flow in gpm)</th>
<th>Stream flow needed (cfs)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (3 gpm) 2 (6 gpm) 3 (12 gpm) 4-5 (15 gpm) 6 (18 gpm)</td>
<td>356 660 1,015 1,522 2,030</td>
</tr>
</tbody>
</table>

   b. For Eastern Washington

<table>
<thead>
<tr>
<th>Number of pressure washers (total pressure washer flow in gpm)</th>
<th>Stream flow needed (cfs)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 (3 gpm) 2 (6 gpm) 3 (12 gpm) 4-5 (15 gpm) 6 (18 gpm)</td>
<td>157 312 480 719 959</td>
</tr>
</tbody>
</table>

4. If the discharge is to ground, the Permittee may direct wastewaters to ground at a location near the bridge or transfer span per the protocol in Appendix B.
5. The Permittee must filter all the wash water and debris resulting from pressure washing, including but not restricted to dirt and old paint chips, through a filter tarp of a minimum of #100 sieve before discharge to the surface water.

6. The Permittee must, to the maximum extent practicable, minimize the scour impact of wash water discharges to the exposed soil on the stream bank below the bridge structure where soil erosion can cause exceedance of the turbidity standard in the receiving water. The Permittee may use best management practices to minimize scour such as using a tarp or berms, taking advantage existing vegetation, or combination thereof.

7. The Permittee must not work or use equipment below the OHWM except the use of a temporary, floating work platform and after obtaining the appropriate regulatory approval.

8. The Permittee must not disturb the stream banks or shoreline when placing or removing a temporary floating work platform.

9. Bridges must first be cleaned using dry methods and equipment (scraping, sweeping, vacuuming) that will prevent debris and substances from entering waters of the state. The Permittee must remove residual grease by hand and that such material cannot enter waters of the state. The use of degreasers on absorbent material is allowed provided none of this material enters waters of the state.

10. The Permittee must provide a containment structure capable of collecting all such debris and substances when it conducts work that may result in debris and substances entering waters of the state. The debris and substances include but are not restricted to dirt, old paint chips, and new paint.

11. If the Permittee uses a filter tarp containment system, the tarp must be a minimum of #100 sieve.

12. The Permittee must inspect the filter containment structure for accumulated debris and substances daily and remove the accumulated material whenever accumulations may place the structure at risk and whenever it moves or removes the structure.

13. Work must not occur when weather conditions would place the containment or filter structure at risk, or may result in loss of contained material or the loss of filtering function.

14. The Permittee must inspect the filter structure daily at the start of pressure washing operation and repair any containment or filter structure as necessary to ensure its proper function.
15. The Permittee must plug drains to prevent debris and substances from entering waters of the state during washing activities. Permittee must prevent debris from accumulating in plugged drains by cleaning them out during preparatory washing and cleaning activities. After removing the debris from the plugged drains to the maximum extent practicable, the Permittee may flush any remaining debris with clean water and restore drain function.

16. The Permittee must, to the maximum extent practicable, minimize the duration of pressure washing to maintain the integrity of the bridge and its structural components.

17. The Permittee must collect and report the information required under the monitoring Condition S5, including the proper disposal of debris and substances resulting from the cleaning activity, per reporting requirements in Condition S8.

E. Ferry Transfer Span & Associated Over-Water Metal Structures (includes the tower, overhead walkways, wingwalls, and dolphins) Routine Maintenance Cleaning and Washing and Marine Growth Removal

1. The Permittee must not work or use equipment below the OHWM, except it may use a temporary floating work platform for marine growth removal after obtaining the appropriate regulatory approval.

2. The Permittee must not disturb the shoreline when it places or removes a temporary floating work platform.

3. The Permittee must avoid washing structures during high or low slack tide, except when washing during slack tide is necessary for the health or safety of workers or the general public, or to avoid conflict with other legal requirements.

4. Ferry transfer spans and over water metal structures must first be cleaned using dry methods and equipment (scraping, sweeping, vacuuming) that will prevent debris and substances from entering waters of the state. The Permittee must remove residual grease by hand and that such material cannot enter waters of the state. The use of degreasers on absorbent material is allowed provided none of this material enters waters of the state.

5. Wash water from routine cleaning of transfer span pavement and sidewalk and water used to control dust must not use detergents. The Permittee shall reduce these discharges through, at a minimum, regular sweeping and water conservation efforts to, the maximum extent practicable, minimize the amount of dust and solids and water used.

6. The Permittee must use non-abrasive methods and tools that, to the maximum extent practicable, minimize removal of the creosote or treated wood fibers when it removes marine growth from creosote or any other treated wood.
7. The Permittee must not discharge removed marine growth to waters of the state where such marine growth would accumulate on the sea bed.

8. The Permittee must wash with the minimum high volume, low pressure water necessary to accomplish the work that prevents the removal of existing paint and subsequent discharge to waters of the state.

9. The Permittee must plug drains to prevent debris and substances from entering waters of the state during washing activities. The Permittee must prevent debris from accumulating in drains by removing them regularly. After removing the debris from the plugged drains to the maximum extent practicable, the Permittee may flush any remaining debris with clean water and restore drain function.

10. The Permittee must collect and report the information required under the monitoring Condition S5, including the proper disposal of debris and substances resulting from the cleaning activity, per reporting requirements in Condition S8. Housekeeping activities that are carried out on a daily or weekly basis such as cleaning walkway and handrails that use low pressure water are not required to collect and report the information required in S5 and S8.

11. If the Permittee does not have hydraulic project approval from Washington State Department of Fish & Wildlife for this work, the Permittee must contact Washington State Department of Fish & Wildlife[5] prior to conducting the project and comply with any other requirements related to fish habitat protection.

F. Ferry Transfer Span & Associated Overwater Metal Structures, Preparatory (Pre-painting) Cleaning and Washing

Preparatory (pre-painting) washing operation uses high pressure washers to remove paint from metal structures and to prepare them for painting. This is done when the paint system on the metal structures deteriorates and peels off exposing the underlying metal to damaging effects of air and moisture.

The requirements below do not apply to bridge painting operations that involve abrasive blasting and are designed and carried out with full containment to ensure there is no waste discharge to surface water or ground. Where preparatory operations result in discharge of wastewater to waters of the state, the Permittee must follow the requirements below.

1. Where the Permittee plans to discharge to ground, the Permittee may direct wastewaters to ground at a location near the transfer span per the protocol in Appendix B after passing the wash water through filter fabric #100 sieve. The Permittee must have proper permissions from land owner for the discharge.

2. The Permittee must, to the maximum extent practicable, minimize the scour impact of wash water discharges to the exposed soil below the structure where soil erosion can cause exceedance of the turbidity standard in the receiving water. The Permittee may use best management practices to minimize scour such as using a tarp or berms, taking advantage existing vegetation, or combination thereof.

3. The Permittee must wash structures at the time of maximum daily tidal flows. Maximum tidal flows occur from one hour after high or low slack tide to one hour prior to the next high or low slack tide.

4. If the Permittee does not have hydraulic project approval from Washington State Department of Fish & Wildlife for this work, the Permittee must contact [Washington State Department of Fish & Wildlife](http://wdfw.wa.gov/licensing/hpa/) prior to conducting the project and comply with any other requirements related to fish habitat protection.

5. The number of pressure washers in use at any time cannot exceed four.

6. The Permittee must filter wash water and debris resulting from pressure washing, including but not restricted to dirt and old paint chips, through a filter tarp of a minimum of #100 sieve before discharge to surface waters.

7. The Permittee must not conduct any work or use equipment below the OHWM except it may use a temporary floating work platform for marine growth removal and activities authorized under condition S4.F of this permit and after obtaining the appropriate regulatory approval.

8. The Permittee must not discharge removed marine growth to waters of the state where such marine growth would accumulate on the sea bed.

9. The Permittee must not disturb the shoreline when placing or removing a temporary floating work platform.

10. Structures shall first be cleaned using dry methods and equipment (scraping, sweeping, vacuuming) that will prevent debris and substances from entering waters of the state. The Permittee must remove residual grease by hand and that such material cannot enter waters of the state. The use of degreasers on absorbent material is allowed provided none of this material enters waters of the state.

---

11. The Permittee must provide a containment structure capable of collecting all such debris and substances when it conducts work that may result in debris and substances entering waters of the state. The debris and substances include but is not restricted to dirt, old paint chips, and new paint.

12. If the Permittee uses a filter tarp containment system, the tarp must be a minimum of #100 sieve.

13. The Permittee must inspect the filter containment structure for accumulated debris and substances daily and remove the accumulated material whenever accumulations may place the structure at risk and whenever it moves or removes the structure.

14. The Permittee must not work when weather conditions would place the containment or filter structure at risk, or would result in the loss of contained material or loss of filtering function.

15. The Permittee must inspect the filter structure daily at the start of pressure washing operation and repair any containment or filter structure as necessary to ensure its proper function.

16. The Permittee must plug drains to prevent debris and substances from entering waters of the state during washing activities. The Permittee must prevent debris from accumulating in drains by removing them regularly. After removing the debris from the plugged drains to the maximum extent practicable, the Permittee may flush any remaining debris with clean water and restore drain function.

17. The Permittee must collect and report the information required under the monitoring Condition S5, including the proper disposal of debris and substances resulting from the cleaning activity, per reporting requirements in Condition S8.

G. **Mixing Zone Descriptions (Conditions S4.B – F)**

1. An acute mixing zone is authorized for bridge spot cleaning, maintenance, and preparatory washing over rivers. The maximum allowance for the mixing zone is defined as follows:

   **Acute**- 2.5% of the river flow at the time of washing

2. An acute mixing zone is authorized for ferry transfer span and overwater metal structures maintenance and preparatory washing over marine waters. The maximum boundary of the mixing zone is as follows:

   **Acute**- Twenty feet around the point of discharge

H. Ferry Terminal Painting

The Permittee is authorized to conduct painting activities on ferry terminal metal pilings, transfer spans, dolphins, wing walls and ladders, only if the Permittee prepares a spill prevention and response for painting operations as outlined below prior to conducting the activity. A copy of the spill prevention and response plan must be kept on site and made available to Ecology upon request.

1. Spill prevention and response for painting operations:
   a. For brush and/or roller paint application methods, painters must use pails containing a maximum of two (2) gallons of paint to minimize the impact of accidental spillage.
   b. The Permittee must not discharge any cleaning solvents or chemicals utilized for tool or equipment cleaning to the ground or water. The Permittee must not clean painting and maintenance equipment in waters of the state or allow any resultant cleaning runoff, paint cans, lids, brushes, or other debris to enter waters of the state.
   c. The Permittee must not clean any painting or other equipment or mix or store paint and other polluting materials and substances over the water or in an area where a spill could result in these materials and substances entering waters of the state.
   d. The Permittee must store and mix all liquid products on impervious surfaces in a secure, contained, and locked location to eliminate the potential for spills into waters of the state.
   e. The Permittee must use drip pans or other protective device for all paint mixing and solvent transfer operations.
   f. The Permittee must suspend drip tarps below paint platforms to prevent spilled paint, buckets, brushes, etc., from being lost to waters of the state.
   g. The Permittee must treat paint and solvent spills as oil spills and prevent them from discharging into waters of the state. It must immediately report any such spill to the appropriate Ecology Regional Office.
   h. The project Engineer or designated Inspector must be on site or on call, and be readily accessible to the site at all times while cleaning and painting activities are occurring that may affect the quality of surface water of the state.
   i. The permittee must also apply any other applicable spill prevention and control measures in Condition S7 of this permit.

2. Preparatory (Pre-painting) washing of ferry terminal structures must be in compliance with S4.F of this permit.
3. The Permittee must collect and report the information required under the monitoring Condition S5 per reporting requirements in Condition S8.

S5. MONITORING REQUIREMENTS

A. Spot Cleaning, Routine Maintenance, and Preparatory (Pre-painting) Cleaning and Washing (Conditions S4.B – F)

The Permittee must monitor and report as required in S8 the following information associated with the permitted activities at each bridge or ferry terminal structure:

1. The date, including year, and the duration (hours) of the washing operation.
2. The type of operation (e.g., spot cleaning, routine maintenance, preparatory washing).
3. If washing operation is conducted outside the seasonal windows, the average river flow during the activity reported in cubic feet per second (CFS). The average flow may be based on the available United States Geological Survey (USGS) or Ecology gaging stations. See USGS Current Water Data for Washington\(^7\) and Current Conditions for Washington: Streamflow\(^8\) webpage for more information.
4. The total volume (gallons) used for the operation and estimated average flow rate (gallons per minute) of water discharged during the operation.

B. Additional Monitoring for Bridge and Ferry Terminal Routine Maintenance and Preparatory (Pre-painting) Cleaning and Washing (Conditions S4.C – F)

Each year WSDOT must monitor wash water effluent discharges from 10% of bridge maintenance projects conducted per S4.C, or 5 total maintenance projects, whichever is greater. If fewer than 5 maintenance projects are conducted in any year, WSDOT must monitor the discharge from each project.

Each year WSDOT must also monitor 10% of preparatory projects conducted per S4.D, or 5 total preparatory projects, whichever is greater. If fewer than 5 preparatory projects are conducted in any year, WSDOT must monitor the discharge from each project.

In addition, WSDOT must monitor the wash water discharge from one representative ferry terminal maintenance project per year and one representative ferry terminal preparatory project per year.

\(^{7}\) http://waterdata.usgs.gov/wa/nwis/rt

\(^{8}\) http://waterdata.usgs.gov/wa/nwis/current/?type=flow
1. For bridge routine maintenance washing, monitoring consists of:
   a. Collecting a representative grab sample(s) of effluent collected from buckets or collection device at monitoring points per Ecology approved protocol. WSDOT must submit changes to the protocol to Ecology for approval.
   b. Collecting site specific information on the bridge including presence or absence of metal guard rail, type and approximate age of the paint where known.

2. For bridge preparatory washing, monitoring consists of:
   a. Collecting a representative composite sample of effluent after passing through the #100 sieve filter fabric tarp per Ecology approved protocol. WSDOT must submit changes to the protocol to Ecology for approval.
   b. Collecting site specific information on the bridge including presence or absence of metal guard rail, type and approximate age of the paint if known.

3. For ferry terminal routine maintenance washing, monitoring consists of collecting a representative composite sample of effluent per Ecology approved protocol. WSDOT must submit changes to the protocol to Ecology for approval.

4. For ferry terminal preparatory washing, monitoring consists of collecting a representative composite sample of effluent after passing through the #100 sieve filter fabric tarp per Ecology approved protocol. WSDOT must submit changes to the protocol to Ecology for approval.

5. Samples must be analyzed for the parameters listed:
## PARAMETERS AND SAMPLE ANALYTICAL METHODS (Freshwater)

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Method Number</th>
<th>Detection Limit(^3)</th>
<th>Quantitation Level(^4) (µg/L)</th>
<th>Holding Time</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Hardness</td>
<td>SM2340B(^1)</td>
<td>200 as CaCO(_3)</td>
<td></td>
<td>6 months</td>
</tr>
<tr>
<td>Total and Dissolved Copper</td>
<td>200.8(^2)</td>
<td>0.4 µg/L(^5)</td>
<td></td>
<td>6 months</td>
</tr>
<tr>
<td>Total and Dissolved Lead</td>
<td></td>
<td>0.1 µg/L</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total and Dissolved Zinc</td>
<td></td>
<td>0.5 µg/L</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

1. Standard Method 2340B  
2. U.S. Environmental Protection Agency (EPA) Method 200.8 as updated.  
3. The minimum concentration of an analyte (substance) that can be measured and reported with a 99% confidence that the analyte concentration is greater than zero as determined by the procedure given in 40 CFR part 136, Appendix B as updated.  
4. The smallest detectable concentration of analyte greater than the Detection Limit where the accuracy (precision & bias) achieves the objectives of the intended purpose.  
5. µg/L = micrograms/liter

### C. Ferry Terminal Painting

The Permittee must monitor and report the following information about the painting activity for each ferry terminal:

1. The name of the Ferry Terminal  
2. The dates and duration of painting time for the piling, wing wall or ladder  
3. The paint product that was used (include the full paint system) and any information about its toxicity potential where available.  
4. The temperature of the receiving water  
5. The temperature of the air at the time the structure was being painted  
6. A brief narrative describing the project/work that was completed
D. **Sampling and Analytical Procedures**

Samples and measurements collected to meet the requirements of this permit must represent the volume and nature of the monitored parameters, including representative sampling of any unusual discharge or discharge condition, including *bypasses*, upsets, and maintenance-related conditions affecting effluent quality.

Sampling and analytical methods used to meet the monitoring requirements specified in this permit must conform to the latest revision of the Guidelines Establishing Test Procedures for the Analysis of Pollutants contained in 40 CFR Part 136.

E. **Laboratory Accreditation**

The Permittee must ensure that all monitoring data required by Ecology is prepared by a laboratory registered or accredited under the provisions of chapter 173-50 WAC, Accreditation of Environmental Laboratories.

S6. **SOLID WASTE DISPOSAL**

F. **Solid Waste Handling**

The Permittee must handle and dispose of all solid waste material in such a manner as to prevent its entry into state ground or surface water.

G. **Leachate**

The Permittee must not allow leachate from its solid waste material to enter waters of the state without providing all known, available and reasonable methods of treatment, nor allow such leachate to cause violations of the State Surface Water Quality Standards, Chapter 173-201A WAC, or the State Ground Water Quality Standards, Chapter 173-200 WAC. The Permittee must apply for a permit or permit modification as may be required for such discharges to state ground or surface waters.

S7. **SPILL PREVENTION AND CONTROL**

The Permittee must:

A. Not discharge any petroleum products, wet cement, lime, concrete, or chemicals (including emulsifiers, dispersants or cleaning solvents used for tool or equipment cleaning, or other toxic or deleterious materials) to waters of the state.

B. The Permittee must not clean any equipment or mix polluting materials and substances in an area where a spill could result in these materials and substances entering waters of the state.
C. Maintain equipment that enters the state’s waters to prevent any visible sheen from petroleum products from appearing on the water. The Permittee must have a spill kit on site and be capable of deploying containment measures for a sheen if a visible sheen is observed. If the Permittee observes a sheen, work must cease, all leaking or dirty equipment must be removed from the water and the source of the sheen fixed prior to reentering the water.

D. Store and lock up all oil, fuel, or chemical storage tanks or containers in a manner that provides appropriate containment in the event of a spill, thereby reducing impacts to surface water or groundwater.

E. Inspect fuel hoses, oil drums, oil or fuel transfer valves and fittings and other equipment for the storage and transfer of oil or fuel regularly for drips or leaks, and maintain and store them properly to prevent spills into waters of the state. Proper security must be maintained to prevent vandalism.

F. Transport concentrated waste or spilled chemicals off site for disposal at a facility approved by Ecology or the appropriate County Health Department. These materials must not be discharged to any sewer without approval of the local sewer authority.

G. Report any spills as required in General Condition G3.

S8. REPORTING AND RECORDKEEPING REQUIREMENTS

The Permittee must provide reports and keep records of all monitoring information in accordance with the following conditions. The falsification of information submitted to Ecology constitutes a violation of the terms and conditions of this permit:

A. Reporting

1. WSDOT must submit an annual discharge monitoring report (DMR) by February 28th of the calendar year following the year in which the activities covered in Conditions S4 and S5 of this permit have completed. WSDOT must submit the DMRs electronically using Ecology’s Water Quality Permitting Portal – Discharge Monitoring Report (DMR) application. Monitoring requirements specified in Conditions S5 that are not included on the DMR must be submitted in an attachment to the electronic DMR.
2. WSDOT shall update the wash water characterization report produced under 2017 permit to include all the latest wash water monitoring data collected the last three years of the previous permit through August 1, 2024 (two years) under this permit. The water characterization report must include all wash water monitoring data, statistical analysis of the data including the concentration ranges observed for different metals, a discussion of the range and variability of the metals concentration, and any site specific factors with potential to impact the observed results. In addition, WSDOT must prepare a guidance document for conducting maintenance washing and preparatory washing operations for bridge and ferry terminal structures. The wash water characterization report and guidance document must be submitted to Ecology before August 1, 2025.

3. Permittees covered for a single structure project or multiple structure projects must submit a discharge monitoring report (DMR) by February 28th of the year following the completion of the activity or before submittal of the notice of termination (NOT), whichever is sooner. The Permittee must submit the DMRs electronically using Ecology’s Water Quality Permitting Portal – Discharge Monitoring Report (DMR) application. Monitoring requirements specified in Conditions S5 that are not included on the DMR must be submitted in an attachment to the electronic DMR.

Information about using electronic DMRs is available on Ecology’s Water Quality Permitting Portal webpage.9

B. Permit Submittals and Schedules

The Permittee must use the Water Quality Permitting Portal – Permit Submittals application to submit all other written permit-required reports by the date specified in the permit.

C. Reporting Permit Violations

1. In the event the Permittee is unable to comply with any of the terms and conditions of this permit which may endanger human health or the environment, or exceed any numeric effluent limitation in the permit, the Permittee must, upon becoming aware of the circumstances:

   a. Immediately take action to stop the non-compliance, minimize potential pollution and correct the problem.

   b. No longer than 24 hours of the non-compliant event notify the appropriate Ecology regional office of the failure to comply:

      - Central Region at (509) 575-2490 for Benton, Chelan, Douglas, Kittitas, Klickitat, Okanogan, or Yakima County.

• Eastern Region at (509) 329-3400 for Adams, Asotin, Columbia, Ferry, Franklin, Garfield, Grant, Lincoln, Pend Oreille, Spokane, Stevens, Walla Walla, or Whitman County.

• Northwest Region at (206) 595-0000 for Island, King, Kitsap, San Juan, Skagit, Snohomish, or Whatcom County.

• Southwest Region at (360) 407-6300 for Clallam, Clark, Cowlitz, Grays Harbor, Jefferson, Lewis, Mason, Pacific, Pierce, Skamania, Thurston, or Wahkiakum County.

c. Submit a detailed written report to Ecology within 5 days of the time the Permittee becomes aware of the circumstances unless Ecology requests an earlier submission. The report must be submitted using Ecology’s Water Quality Permitting Portal – Permit Submittals application, unless a waiver from electronic reporting has been granted according to S9.A.3. The Permittee's report must contain:

i. A description of the noncompliance, including exact dates and times.

ii. Whether the noncompliance has been corrected and, if not, when the noncompliance will be corrected.

iii. The steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.

iv. Upon request of the Permittee, Ecology may waive the requirement for a written report on a case-by-case basis, if the immediate notification (S9.E.1.b) is received by Ecology within 24 hours.

2. Compliance with the requirements of this section does not relieve the Permittee from responsibility to maintain continuous compliance with the terms and conditions of this permit or the resulting liability for failure to comply.
D. Additional Activity Notification Requirements

WSDOT must provide a list of activities planned for the next twelve months on its website by February 28th each year of coverage. The list must be kept current on WSDOT’s website and accessible to the public. The list must provide information about each planned activity including the type of activity, its location, waterbody crossing, the approximate starting schedule and the expected length of the operation, and contact information. If necessary, scheduling changes may be made to the list to keep the list current before an activity begins.

E. Maintaining a Copy of This Permit

A copy of this permit or electronic accessible version must be kept at the project site and be made available upon request to Ecology inspectors.

F. Records Retention

The Permittee must retain records of all monitoring information and permit-required records onsite during the project, including all calibration and maintenance records and all original recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, and after the project ends for a period of at least five years. This period of retention shall be extended during the course of any unresolved litigation regarding the discharge of pollutants by the Permittee or when requested by Ecology. On request, monitoring data and analysis must be provided to Ecology.

S9. NOTICE OF TERMINATION

The permit is eligible for termination of coverage after the Permittee has completed the activities covered under this permit and removed all temporary equipment from the activity site and submitted the required report under S8. The Permittee must submit a complete and accurate Notice of Termination (NOT) form, signed in accordance with General Condition G18, to:

Department of Ecology
Water Quality Program - Bridge Washing Permit
PO Box 47696
Olympia, Washington 98504-7696

When a termination form is available online, the Permittee may submit the form using Ecology’s Water Quality Permitting Portal.

The termination is effective on the thirty-first calendar day following the date Ecology receives a complete NOT form, unless Ecology notifies the Permittee within 30 days that termination request is denied.
GENERAL CONDITIONS

G1. DISCHARGE VIOLATIONS
All discharges and activities authorized by this general permit must be consistent with the terms and conditions of this general permit. Any discharge of any pollutant more frequent than or at a level in excess of that identified and authorized by the general permit shall constitute a violation of the terms and conditions of this permit.

G2. PROPER OPERATION AND MAINTENANCE
The Permittee must at all times properly operate and maintain all facilities and systems of collection, treatment, and control (and related appurtenances) which are installed or used by the Permittee for pollution control to achieve compliance with the terms and conditions of this permit.

G3. NOTIFICATION OF UNAUTHORIZED DISCHARGE INCLUDING SPILLS
If a Permittee has knowledge of an unauthorized discharge, including spill(s), into waters of the state, which could constitute a threat to human health, welfare, or the environment, the Permittee, must:

A. Take appropriate action to correct or minimize the threat to human health, welfare and/or the environment.

B. Notify the Department of Ecology’s Regional Office\(^\text{10}\) and other appropriate spill response authorities immediately but in no case later than within 24 hours of obtaining that knowledge.

C. Immediately report spills or other discharges which might cause viral or bacterial contamination of marine waters, such as discharges resulting from broken sewer lines and failing onsite septic systems, to the Ecology regional office and to the Department of Health, Shellfish Program. The Department of Health's Shellfish number is 360-236-3330 (business hours) or 360-789-8962 (24-hours).

D. Immediately report spills or discharges of oils or hazardous substances to the Ecology regional office and to the Washington Emergency Management Division, 1-800-258-5990.

E. Notification of fish kill: If at any time, as a result of project activities, fish are observed in distress or a fish kill occurs the Permittee must:

1. Immediately take action to stop, contain, and clean up unauthorized discharges or otherwise stop the noncompliance, correct the problem and, if applicable, repeat sampling and analysis of any discharge per SS immediately and submit the results to Ecology within thirty (30) days after becoming aware of the violation.

\(^{10}\) http://www.ecy.wa.gov/programs/spills/other/reportaspill.htm
2. Within 24 hours, notify Ecology of the failure to comply.

3. Submit a detailed written report to Ecology within five (5) days, unless waived by Ecology. The report must contain:
   - A description of the noncompliance and its cause;
   - Exact dates and times;
   - Relevant pictures taken;
   - If the Permittee has not corrected the noncompliance, the anticipated time it is expected to continue; and
   - Steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.

F. Notification of any discharge which could constitute a threat to human health, welfare, or the environment must also comply with G3 of this permit.

Compliance with these requirements does not relieve the Permittee from responsibility to maintain continuous compliance with the terms and conditions of this permit or the resulting liability for failure to comply.

G4. BYPASS PROHIBITED

The intentional bypass of wastewater from all or any portion of a wastewater treatment BMP whenever the design capacity of the treatment BMP is not exceeded, is prohibited unless the following conditions are met:

A. Bypass is: (1) unavoidable to prevent loss of life, personal injury, or severe property damage; or (2) necessary to perform construction or maintenance-related activities essential to meet the requirements of the Clean Water Act (CWA); and

B. There are no feasible alternatives to bypass, such as the use of auxiliary treatment facilities, retention of untreated wastewater, or maintenance during normal dry periods.

"Severe property damage" means substantial physical damage to property, damage to the treatment facilities which would cause them to become inoperable, or substantial and permanent loss of natural resources which can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss.

G5. RIGHT OF INSPECTION AND ENTRY

The Permittee must allow an authorized representative of the Department, upon the presentation of credentials and such other documents as may be required by law:

A. To enter upon the premises where a discharge is located or where any records must be kept under the terms and conditions of this permit.
B. To have access to and copy - at reasonable times and at reasonable cost - any records required to be kept under the terms and conditions of this permit.

c. To inspect - at reasonable times - any facilities, equipment (including monitoring and control equipment), practices, methods, or operations regulated or required under this permit.

D. To sample or monitor - at reasonable times - any discharge of pollutants.

G6. DUTY TO MITIGATE

The Permittee must take all reasonable steps to minimize or prevent any discharge in violation of this permit, which has a reasonable likelihood of adversely affecting human health or the environment.

G7. PROPERTY RIGHTS

This permit does not convey any property rights of any sort, or any exclusive privilege.

G8. COMPLIANCE WITH OTHER LAWS AND STATUTES

Nothing in this permit shall be construed as excusing the Permittee from compliance with any applicable federal, state, or local statutes, ordinances, or regulations.

G9. REMOVED SUBSTANCES

Collected screenings, grit, solids, sludges, filter backwash, or other pollutants removed in the course of treatment or control of wastewaters must not be re-suspended or reintroduced to the final effluent stream for discharge to waters of the state.

G10. SEVERABILITY

The provisions of this permit are severable, and if any provision of this permit, or the application of any provision of this permit to any circumstance, is held invalid, the application of such provision to other circumstances, and the remainder of this permit shall not be affected thereby.

G11. REVOCATION OF COVERAGE

Pursuant with Chapter 43.21B RCW and Chapter 173-226 WAC, the Director may terminate coverage for any discharger under this permit for cause. Cases where coverage may be terminated include, but are not limited to, the following:

A. Violation of any term or condition of this permit;

B. Obtaining coverage under this permit by misrepresentation or failure to disclose fully all relevant facts;

C. A change in any condition that requires either a temporary or permanent reduction or elimination of the permitted discharge;

D. Failure or refusal of the Permittee to allow entry as required in RCW 90.48.090;
E. A determination that the permitted activity endangers human health or the environment, or contributes to water quality standards violations;

F. Nonpayment of permit fees or penalties assessed pursuant to RCW 90.48.465 and Chapter 173-224 WAC;

G. Failure of the Permittee to satisfy the public notice requirements of WAC 173-226-130(5), when applicable.

The Director may require any discharger under this permit to apply for and obtain coverage under an individual permit or another more specific general permit. Permittees who have their coverage revoked for cause according to WAC 173-226-240 may request temporary coverage under this permit during the time an individual permit is being developed, provided the request is made within ninety (90) days from the time of revocation and is submitted along with a complete individual permit application form.

G12. GENERAL PERMIT MODIFICATION AND REVOCATION

This permit may be modified, revoked and reissued, or terminated in accordance with the provisions of WAC 173-226-230. Grounds for modification, revocation and reissuance, or termination include, but are not limited to, the following:

A. A change occurs in the technology or practices for control or abatement of pollutants applicable to the category of dischargers covered under this permit;

B. Effluent limitation guidelines or standards are promulgated pursuant to the CWA or Chapter 90.48 RCW, for the category of dischargers covered under this permit;

C. A water quality management plan containing requirements applicable to the category of dischargers covered under this permit is approved;

D. Information is obtained which indicates that cumulative effects on the environment from dischargers covered under this permit are unacceptable; or

E. Changes made to State law and regulations reference this permit.

G13. REPORTING PLANNED CHANGES

A Permittee who knows or has reason to believe that any activity has occurred or will occur which would constitute cause for modification or revocation and reissuance under Condition G11, G13, or 40 CFR 122.62 must report such plans, or such information, to Ecology so that a decision can be made on whether action to modify, or revoke and reissue this permit will be required. Ecology may then require submission of a new or amended application. Submission of such application does not relieve the Permittee of the duty to comply with this permit until it is modified or reissued.
G14. APPEALS

A. The terms and conditions of this general permit, as they apply to the appropriate class of dischargers, are subject to appeal within thirty days of issuance of this general permit, in accordance with chapter 43.21B RCW, and chapter 173-226 WAC.

B. The terms and conditions of this general permit, as they apply to an individual discharger, can be appealed, in accordance with chapter 43.21B RCW, within thirty days of the effective date of coverage of that discharger. Consideration of an appeal of general permit coverage of an individual discharger is limited to the general permit's applicability or non-applicability to that individual discharger.

C. The appeal of general permit coverage of an individual discharger does not affect any other dischargers covered under this general permit. If the terms and conditions of this general permit are found to be inapplicable to any individual discharger(s), the matter shall be remanded to Ecology for consideration of issuance of an individual permit or permits.

D. Modifications of this permit can be appealed in accordance with chapter 43.21B RCW, and chapter 173-226 WAC.

G15. PENALTIES

40 CFR 122.41(a)(2) and (3), 40 CFR 122.41(j)(5), and 40 CFR 122.41(k)(2) are hereby incorporated into this permit by reference.

G16. DUTY TO REAPPLY

The Permittee must apply for permit renewal at least 180 days prior to the specified expiration date of this permit. When available online, the Permittee may electronically submit the renewal application form using Ecology’s Water Quality Permitting Portal.

G17. SIGNATORY REQUIREMENTS

All formal submittals to Ecology must be signed and certified.

A. All permit applications must be signed by either a principal executive officer or ranking elected official.

B. All formal submittals required by this Permit must be signed by a person described above or by a duly authorized representative of that person. A person is a duly authorized representative only if:

1. The authorization is made in writing by a person described above and submitted to Ecology, and
2. The authorization specifies either an individual or a position having responsibility for the overall development and implementation of the stormwater management program. (A duly authorized representative may thus be either a named individual or any individual occupying a named position.)

C. Changes to authorization. If an authorization under General Condition G17.B.2 is no longer accurate because a different individual or position has responsibility for the overall development and implementation of the stormwater management program, a new authorization satisfying the requirements of General Condition G17.B.2 must be submitted to Ecology prior to or together with any reports, information, or applications to be signed by an authorized representative.

D. Certification. Any person signing a formal submittal under this permit must make the following certification:

"I certify under penalty of law, that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for willful violations."

G18. PAYMENT OF FEES
The Permittee must submit payment of fees associated with this permit as assessed by the Department.

G19. UPSET
Permittees must meet the conditions of 40 CFR 122.41(n) regarding “Upsets.” The conditions are as follows:

A. Definition.

“Upset” means an exceptional incident in which there is unintentional and temporary noncompliance with technology-based permit effluent limitations because of factors beyond the reasonable control of the Permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation.
B. **Effect of an upset.**

An upset constitutes an affirmative defense to an action brought for noncompliance with such technology-based permit effluent limitations if the requirements of paragraph (C) of this condition are met. Any determination made during administrative review of claims that noncompliance was caused by upset, and before an action for noncompliance, will not constitute final administrative action subject to judicial review.

C. **Conditions necessary for demonstration of upset.**

A Permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed contemporaneous operating logs, or other relevant evidence that:

1. An upset occurred and that the Permittee can identify the cause(s) of the upset;
2. The permitted facility was at the time being properly operated; and
4. The Permittee complied with any remedial measures required under 40 CFR 122.41(d) (Duty to Mitigate).

D. **Burden of proof.**

In any enforcement proceeding, the Permittee seeking to establish the occurrence of an upset has the burden of proof.

G20. **OTHER REQUIREMENTS OF 40 CFR**

All other requirements of 40 CFR 122.41 and 122.42 are incorporated in this permit by reference.

G21. **DUTY TO COMPLY**

The Permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the Clean Water Act and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or denial of a permit renewal application.

G22. **TOXIC POLLUTANTS**

The Permittee must comply with effluent standards or prohibitions established under Section 307(a) of the Clean Water Act for toxic pollutants within the time provided in the regulations that establish those standards or prohibitions, even if this permit has not yet been modified to incorporate the requirement.
G23. PENALTIES FOR TAMPERING

The Clean Water Act provides that any person who falsifies, tampers with, or knowingly renders inaccurate any monitoring device or method required to be maintained under this permit shall, upon conviction, be punished by a fine of not more than $10,000 per violation, or by imprisonment for not more than two years per violation, or by both. If a conviction of a person is for a violation committed after a first conviction of such person under this Condition, punishment shall be a fine of not more than $20,000 per day of violation, or by imprisonment of not more than four (4) years, or by both.

G24. REPORTING OTHER INFORMATION

Where the Permittee becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or in any report to Ecology, it must promptly submit such facts or information.
APPENDIX A: GLOSSARY

AKART – The acronym for “all known, available, and reasonable methods of prevention, control and treatment.” AKART is a technology-based approach to limiting pollutants from wastewater discharges which requires an engineering judgment and an economic judgment. AKART must be applied to all wastes and contaminants prior to entry into waters of the state in accordance with RCW 90.48.010 and 520, WAC 173-200-030(2)(c)(ii), and WAC 173-216-110(1)(a).

Best Management Practices (BMPs) – Schedules of activities, prohibitions of practices, maintenance procedures, and other physical, structural and/or managerial practices to prevent or reduce the pollution of waters of the state. BMPs include treatment systems, operating procedures, and practices to control: plant site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage. BMPs may be further categorized as operational, source control, erosion and sediment control, and treatment BMPs.

Bypass – The intentional diversion of waste streams from any portion of a treatment facility.

Clean Water Act (CWA) – The Federal Water Pollution Control Act enacted by Public Law 92-500, as amended by Public Laws 95-217, 95-576, 96-483, 97-117; USC 1251 et seq.

Composite Sample – A mixture of grab samples collected at the same sampling point at different times. This can be formed either by continuous sampling or by mixing discrete samples. May be "time-composite" (collected at constant time intervals) or "flow-proportional" (collected either as a constant sample volume at time intervals proportional to stream flow, or collected by increasing the volume of each aliquot as the flow increased while maintaining a constant time interval between the aliquots.

Continuous Monitoring – Uninterrupted, unless otherwise noted in the permit.

Debris and Substances – Materials that become mixed, dissolved, or otherwise entrained in wash water as a result of cleaning activities. Debris and substances include, but are not limited to:

- Bird nests and fecal material
- Dirt, moss, and sediments
- Rust, old paint chips and residue
- Petroleum products
- Cement chips
- Construction materials
- Chemicals or any other toxic or deleterious substances

Detection Limit – See Method Detection Level.

Grab Sample – A single sample or measurement taken at a specific time and location or over as short a period of time as feasible at the collection point.
High Pressure Washer – (Same as Pressure Washer) a mechanical device that uses high pressure water up to 3000 psi (discharge of 3 gallons/minute).

High Pressure Washing – Washing operations that use a low volume of water (typically between 2-5 gallon per minute) in a mechanical device that uses high pressure water at pressures greater than 1500 psi with a low volume of water (typically around 3 gallons/minute).

High Volume Low Pressure – is a method of applying water to remove dirt and debris from structures. The pressure should not exceed 300 pounds per square inch at the end of the hose. This application of the pressurized water should not remove paint chips and debris.

Low Pressure Washing – Washing operations that can use a high volume water (typically between 12 – 18 gallon per minute) at pressures not to exceed 300 psi. Low Pressure washing should not be able to remove paint and debris. Method Detection Level (MDL) – The minimum concentration of a substance that can be measured and reported with 99% confidence that the pollutant concentration is above zero and is determined from analysis of a sample in a given matrix containing the pollutant.

Mixing Zone – An area that surrounds an effluent discharge within which water quality criteria may be exceeded. The area of the authorized mixing zone is specified in a facility’s permit and follows procedures outlined in state regulations (chapter 173-201A WAC).

National Pollutant Discharge Elimination System (NPDES) – The NPDES (Section 402 of the Clean Water Act) is the Federal wastewater permitting system for discharges to navigable waters of the United States. Many states, including the State of Washington, have been delegated the authority to issue these permits. NPDES permits issued by Washington State permit writers are joint NPDES/State permits issued under both State and Federal laws.

Ordinary High Water Mark (OHWM) – “Ordinary high water mark” on all lakes, streams, and tidal water is the mark that will be found by examining the bed and banks and ascertaining where the presence and action of waters are so common and usual, and so long continued in all ordinary years, as to mark upon the soil a character distinct from that of the abutting upland, in respect to vegetation as that condition exists on June 1, 1971, as it may naturally change thereafter, or as it may change thereafter in accordance with permits issued by a local government or the department: PROVIDED, that in any area where the ordinary high water mark cannot be found, the ordinary high water mark adjoining salt water shall be the line of mean higher high tide and the ordinary high water mark adjoining fresh water shall be the line of mean high water.

Operator – Any entity with a discharge associated with activities authorized by this permit that meets either of the following two criteria:

1. The entity has operational control over activities authorized under this permit, including the ability to make modifications to those activities; or
2. The entity has day-to-day operational control of activities at a facility necessary to ensure compliance with the permit (e.g., the entity is authorized to direct workers to carry out activities required by the permit).
**Pressure Washer** – a mechanical device that uses pressure water up to 3000 psi.

**Quantitation Level (QL)** – The smallest detectable concentration of analyte greater than the Detection Limit (DL) where the accuracy (precision & bias) achieves the objectives of the intended purpose. This may also be called Minimum Level or Reporting Level.

**Reasonable Potential** – A reasonable potential to cause or contribute to a water quality violation, or loss of sensitive and/or important habitat.

**Short Term Modification** – Per WAC 173-201A-410, the criteria and special conditions established in WAC 173-201A-200 through 173-201A-260, 173-201A-320, 173-201A-602 and 173-201A-612 may be modified for a specific water body on a short-term basis (e.g., actual periods of nonattainment would generally be limited to hours or days rather than weeks or months) when necessary to accommodate essential activities, respond to emergencies, or to otherwise protect the public interest, even though such activities may result in a temporary reduction of water quality conditions.

**Slack Tide** The state of a tidal current when its velocity is near zero, especially the moment when a reversing current changes its direction and its velocity is zero. The term is also applied to the entire period of low velocity near the time of turning of the current when it is too weak to be of any practical importance in navigation. The relation of the time of slack water to the tidal phases varies in different localities. In some places slack water occurs near the times of high and low water, while in other localities the slack water may occur midway between high and low water. Slack tidies can be found from few sources, including CO-OPS Map - NOAA Tides & Currents.

**Solid Waste** – All putrescible and non-putrescible solid and semisolid wastes including, but not limited to, garbage, rubbish, ashes, industrial wastes, swill, sewage sludge, demolition and construction wastes, abandoned vehicles or parts thereof, contaminated soils and contaminated dredged material, and recyclable materials.

**Stormwater** – That portion of precipitation that does not naturally percolate into the ground or evaporate, but flows via overland flow, interflow, pipes, and other features of a storm water drainage system into a defined surface water body, or a constructed infiltration facility.

**Technology-based Effluent Limit** – A permit limit that is based on the ability of a treatment method to reduce the pollutant.

**Upset** – An exceptional incident in which there is unintentional and temporary noncompliance with technology-based permit effluent limits because of factors beyond the reasonable control of the facility. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, lack of preventative maintenance, or careless or improper operation.

**Water Quality-based Effluent Limit** – A limit on the concentration of an effluent parameter that is intended to prevent the concentration of that parameter from exceeding its water quality criterion after it is discharged into receiving waters.
**Waters of the State** – Lakes, rivers, ponds, streams, inland waters, underground waters, salt waters, and all other surface waters and watercourses within the jurisdiction of the state of Washington.
APPENDIX B: PROTOCOL FOR UPLAND WASH WATER EFFLUENT DISPOSAL FROM BRIDGE PAINT PREPARATORY WASHING AND BRIDGE MAINTENANCE WASHING ACTIVITIES

Note to Permittees: The protocol contained in Appendix B is based on Washington State Department of Transportation (WSDOT) protocol entitled WSDOT Protocol for Wash water Effluent Disposal To Upland Areas From Bridge Paint Preparatory Washing And Bridge Maintenance Washing Activities (Revised February 8, 2013). For development of this protocol, WSDOT hired a consultant to study the ground water impacts associated with the discharge of wash water to ground. The information in the consultant report titled WATER QUALITY IMPACT EVALUATION – Ground Disposal of Effluent from WSDOT Preparatory Bridge Washing, Herrera Environmental Consultants, Inc., January 2008. Minor edits have been made throughout the WSDOT protocol for applicability to all Permittees.

The Herrera report provides the following recommendations to prevent the potential contamination of groundwater and surface water from the ground disposal of bridge washing effluent. When applicable to the Permittees site, the following recommendations must be followed:

1. To protect groundwater quality, ground disposal of bridge washing effluent should not occur in areas where the depth to ground water is expected to be shallower than 1.5 feet.

2. Ground disposal of bridge washing effluent should be permitted on soils with relatively high infiltration rates (e.g., sand, loamy sand, and sandy loam); however, appropriate set-back requirements from nearby receiving waters should be developed based on the data presented in Table 19 (of Herrera report entitled: “Ground Disposal of Effluent from WSDOT Preparatory Bridge Washing, January 2008”) to protect surface water quality. Where inadequate space is available at a particular bridge site to meet the set-back requirements, appropriate containment systems should be used to prevent the overland flow of bridge washing effluent. This could include the use of approved drainage and runoff controls that are identified in the Regional Road Maintenance Endangered Species Act (ESA) Program Guidelines (Regional Road Maintenance Technical Group 2002).

3. Ground disposal of bridge washing effluent on soils with relatively low infiltration rates (e.g., loam, sandy clay loam) should also be permitted; however, appropriate containment systems (as described above) should be used to prevent the overland flow of bridge washing effluent. Ground disposal of bridge washing effluent should not occur on soils with extremely low infiltration rates (e.g., clay). Furthermore, ground disposal of bridge washing effluent should not occur in areas that have been armored using riprap or other impervious materials.

4. Physical factors such as slope stability and scour at the point of discharge for the bridge washing effluent should also be considered whenever ground disposal is proposed for a particular bridge site.
5. A project evaluation protocol should be developed for subsequent use by WSDOT’s design and permitting teams to identify appropriate ground disposal locations for bridge washing effluent at specific bridge sites based on the criteria identified here.

In addition to these recommendations, the Permittee must minimize the scour impact of wash water discharges to the exposed soil on the stream bank below the bridge structure where soil erosion can cause violation of the turbidity standard in the receiving water. This can be achieved by placing a tarp over the exposed soil, planting vegetation, putting berms to contain eroded soil.

Based on the above-mentioned recommendations, WSDOT, through its consultants, developed Table 19, containing set-back (in feet) requirements mentioned in recommendation number 2. In addition, WSDOT developed the protocol for upland wash water effluent disposal from bridge paint preparatory washing and bridge maintenance washing activities developed per recommendation number 5 above. Excerpts from the WSDOT protocol developed are included below.
Table 19: Set-back (feet) Requirements from receiving waters (from 2008 Herrera Report)

<table>
<thead>
<tr>
<th>Slope (ft/ft)</th>
<th>Sand</th>
<th>Loamy Sand</th>
<th>Sandy Loam</th>
<th>Loam</th>
<th>Sandy Clay Loam</th>
</tr>
</thead>
<tbody>
<tr>
<td>0.01</td>
<td>6.9</td>
<td>27.8</td>
<td>48.6</td>
<td>97.1</td>
<td>395</td>
</tr>
<tr>
<td>0.02</td>
<td>9.8</td>
<td>39.2</td>
<td>68.7</td>
<td>137</td>
<td>2211</td>
</tr>
<tr>
<td>0.03</td>
<td>12.0</td>
<td>48.1</td>
<td>84.1</td>
<td>168</td>
<td>3644</td>
</tr>
<tr>
<td>0.04</td>
<td>13.9</td>
<td>55.5</td>
<td>97.1</td>
<td>194</td>
<td>4744</td>
</tr>
<tr>
<td>0.05</td>
<td>15.5</td>
<td>62.1</td>
<td>109</td>
<td>214</td>
<td>NC</td>
</tr>
<tr>
<td>0.06</td>
<td>17.0</td>
<td>68.0</td>
<td>119</td>
<td>238</td>
<td>NC</td>
</tr>
<tr>
<td>0.07</td>
<td>18.4</td>
<td>73.4</td>
<td>129</td>
<td>257</td>
<td>NC</td>
</tr>
<tr>
<td>0.08</td>
<td>19.6</td>
<td>78.5</td>
<td>137</td>
<td>275</td>
<td>NC</td>
</tr>
<tr>
<td>0.09</td>
<td>20.8</td>
<td>83.3</td>
<td>146</td>
<td>291</td>
<td>NC</td>
</tr>
<tr>
<td>0.10</td>
<td>21.9</td>
<td>87.8</td>
<td>154</td>
<td>591</td>
<td>NC</td>
</tr>
<tr>
<td>0.11</td>
<td>23.0</td>
<td>92.0</td>
<td>161</td>
<td>620</td>
<td>NC</td>
</tr>
<tr>
<td>0.12</td>
<td>24.0</td>
<td>96.1</td>
<td>168</td>
<td>959</td>
<td>NC</td>
</tr>
<tr>
<td>0.13</td>
<td>25.0</td>
<td>100</td>
<td>175</td>
<td>1,322</td>
<td>NC</td>
</tr>
<tr>
<td>0.14</td>
<td>26.0</td>
<td>104</td>
<td>182</td>
<td>1,372</td>
<td>NC</td>
</tr>
<tr>
<td>0.15</td>
<td>26.9</td>
<td>108</td>
<td>188</td>
<td>1,420</td>
<td>NC</td>
</tr>
<tr>
<td>0.16</td>
<td>27.8</td>
<td>111</td>
<td>194</td>
<td>1,826</td>
<td>NC</td>
</tr>
<tr>
<td>0.17</td>
<td>28.6</td>
<td>114</td>
<td>200</td>
<td>1,883</td>
<td>NC</td>
</tr>
<tr>
<td>0.18</td>
<td>29.4</td>
<td>118</td>
<td>206</td>
<td>1,937</td>
<td>NC</td>
</tr>
<tr>
<td>0.19</td>
<td>30.2</td>
<td>121</td>
<td>212</td>
<td>2,382</td>
<td>NC</td>
</tr>
<tr>
<td>0.20</td>
<td>31.0</td>
<td>124</td>
<td>217</td>
<td>2,443</td>
<td>NC</td>
</tr>
<tr>
<td>0.21</td>
<td>31.8</td>
<td>127</td>
<td>223</td>
<td>2,504</td>
<td>NC</td>
</tr>
<tr>
<td>0.22</td>
<td>32.5</td>
<td>130</td>
<td>228</td>
<td>2,563</td>
<td>NC</td>
</tr>
<tr>
<td>0.23</td>
<td>33.3</td>
<td>133</td>
<td>233</td>
<td>2,671</td>
<td>NC</td>
</tr>
<tr>
<td>0.24</td>
<td>34.0</td>
<td>136</td>
<td>238</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.25</td>
<td>34.7</td>
<td>139</td>
<td>243</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.26</td>
<td>35.4</td>
<td>142</td>
<td>248</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.27</td>
<td>36.0</td>
<td>144</td>
<td>252</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.28</td>
<td>36.7</td>
<td>147</td>
<td>257</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.29</td>
<td>37.4</td>
<td>149</td>
<td>262</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.30</td>
<td>38.0</td>
<td>152</td>
<td>266</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.35</td>
<td>41.0</td>
<td>164</td>
<td>287</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.40</td>
<td>43.9</td>
<td>176</td>
<td>876</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.45</td>
<td>46.5</td>
<td>186</td>
<td>929</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.50</td>
<td>49.1</td>
<td>196</td>
<td>979</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.55</td>
<td>51.5</td>
<td>206</td>
<td>1,693</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.60</td>
<td>53.7</td>
<td>215</td>
<td>1,768</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.65</td>
<td>55.9</td>
<td>224</td>
<td>1,841</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.70</td>
<td>58.0</td>
<td>232</td>
<td>1,910</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.75</td>
<td>60.1</td>
<td>240</td>
<td>2,755</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.80</td>
<td>62.1</td>
<td>248</td>
<td>NC</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.85</td>
<td>64.0</td>
<td>256</td>
<td>NC</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.9</td>
<td>65.8</td>
<td>263</td>
<td>NC</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>0.95</td>
<td>67.6</td>
<td>271</td>
<td>NC</td>
<td>NC</td>
<td>NC</td>
</tr>
<tr>
<td>1.00</td>
<td>69.4</td>
<td>278</td>
<td>NC</td>
<td>NC</td>
<td>NC</td>
</tr>
</tbody>
</table>

NC= not calculated; model runs were stopped after travel distance was greater than 0.5 miles (2640 feet).

AB/06-03427-008 WSDOT bridge washing impacts on groundwater report
BACKGROUND INFORMATION

PREPARATORY WASHING – BRIDGE PAINTING SCENARIOS

WSDOT’s groundwater study showed the dissolved metal concentrations in the bridge washing effluent for preparatory washing had the potential to violate groundwater standards. The study also developed criteria to use in determining if the effluent would result in a violation based on soil type, slope of ground, and distance of sheet flows to infiltrate wash water. The study concluded that discharges to an upland area where the groundwater table was at least 1.5 feet below the surface didn’t have the potential to impact ground water.

303(d) listing: If a project occurs over a water body that is 303(d) listed for any of the metals of concern (copper, lead, zinc) this permit does not allow discharge of the bridge effluent to surface waters. In this scenario, the Permittee could discharge all the wash water to ground or direct the wash water to sanitary sewer where available and permitted by the local sewer authority. The Permittee must identify an area where the groundwater depth is at least 1.5 feet below ground or meets the criteria outlined in Table 19 (above) based on soil type, slope of the ground and distance water can sheet flow over the surface. In all cases, BMPs must be utilized, if necessary, to contain the water to this area to allow for infiltration and prevent the discharge from reaching the near shore areas (where groundwater is less than 1.5 feet to surface) or reaching any exposed area below the OHWM or reaching surface waters.

Sufficient Surface Flow: If a project occurs over a water body where the flows (CFS) are sufficient for a mixing zone as outlined in this NPDES general permit, then the Permittee must evaluate the areas underneath those portions of the bridge structure that are over land and determine if they can discharge in this location or not. The discharge to surface waters is allowed and discharge to ground where the depth to ground water is at or greater than 1.5 feet is also allowed if the protocol outlined in Appendix B are followed to determine infiltration based on soils, slope, and sheet flow distance. Where the near shore area is soil but groundwater is within 1.5 feet of the surface, no discharge of wash water is allowed. For those areas, the Permittee must direct the discharge to identified upland locations where discharge to ground is allowed or direct the discharge directly to
the surface waters where mixing can occur. No discharge is allowed where the near shore area is riprap or is some other impermeable surface that traps and holds wash water. In those circumstances, direct the discharge to identified areas where discharge to ground is allowed or direct the discharge to surface waters. For any areas below the OHWM that are exposed, i.e. not covered with flowing water, no discharge is allowed and the Permittee must direct the discharge to areas where discharge to ground is allowed or direct the discharge to surface waters where safely possible.

MAINTENANCE WASHING SCENARIOS

The permit does not have flow restrictions of the receiving water body for maintenance washing where flows are above the thresholds identified in Section S4 of this permit and the permit does not require the use of a permeable tarp to filter maintenance wash water. Where stream flows are below flow thresholds identified in Section S4, the permit has timing windows identified in Section S4 for conducting maintenance washing. The boundary for the near shore area will have to be defined based on the ground water depth. WSDOT’s groundwater study demonstrated that dissolved metal concentrations in maintenance washing effluent do not have the potential to violate the groundwater standards if the protocol for discharge to ground in Appendix B is followed. However, the Permittee is still not allowed to discharge to exposed riverbed (areas between the OHWM and physical flow) where surface water quality standards apply which are more stringent than ground water standards and there is no mixing occurring in this area.

When discharging to the ground above the OHWM (referred to as upland area), there can be surface runoff traveling across the ground that could reach the river. In cases where there is no potential for violating groundwater standards, this runoff is allowed to discharge to the river provided there is no violation of the turbidity standards at the point of discharge. The Permittee must conduct visual monitoring of the turbidity levels or use BMPs to control turbidity to ensure compliance with the standards. Overland runoff is not allowed to discharge to an area below the OHWM where there is no flow.

If the Permittee has reason to believe the maintenance wash water can cause exceedance of the groundwater standards, then over land discharge to the receiving water is not allowed. The discharge must be directed to areas of upland where groundwater is at, or greater than, 1.5 feet below the surface or directly to the water body where water is flowing or discharged to flowing water.

303(d) listing: If maintenance washing occurs over a water body that is 303(d) listed for any of the metals of concern (copper, lead, and zinc) there can be no discharge of the bridge effluent to surface waters. In this scenario, the Permittee could discharge all the wash water to ground or capture and dispose of offsite. Alternatively, where sanitary sewer is available, the Permittee could direct the wash water to the sanitary sewer with the approval of the local sewer authority. For discharge to ground, the Permittee must identify an area where the groundwater depth is at least 1.5 feet below ground or meets the soil type, ground slope, and sheet flow distance as outline in Appendix B (originally from Ground Disposal of Effluent from WSDOT Preparatory Bridge Washing, January
Where necessary, BMPs must be employed to contain the water to this area to allow for infiltration of wash water and to prevent the discharge from reaching near shore areas (where groundwater is less than 1.5 feet to surface) or reaching any exposed area below the OHWM or reaching surface waters.

**SPOT CLEANING**

The groundwater plan or protocol developed for maintenance washing (contained in this Appendix B) also applies to spot cleaning.

**303(d) listing:** If a project occurs over a water body that is 303(d) listed for any of the metals of concern (copper, lead, and zinc) there can be no discharge of the bridge effluent to surface waters. In this scenario, the Permittee could discharge all the wash water to ground or capture and dispose of offsite. Alternatively, where sanitary sewer is available, the Permittee could direct the wash water to the sanitary sewer with the approval of the local sewer authority. For discharge to ground, the Permittee must identify an area where the groundwater depth is at least 1.5 feet below ground or meets the soil type, ground slope, and sheet flow distance as outline in Appendix B (originally from *Ground Disposal of Effluent from WSDOT Preparatory Bridge Washing, January 2008*). Where necessary, BMPs must be employed to contain the water to this area to allow for infiltration of wash water and to prevent the discharge from reaching near shore areas (where groundwater is less than 1.5 feet to surface) or reaching any exposed area below the OHWM or reaching surface waters.

**PROCESS FOR ESTABLISHING IF WASH WATER EFFLUENTS CAN BE DISCHARGED TO UPLANDS**

**Preparatory Washing:**

For upland discharge of preparatory washing, operators must investigate the upland areas adjacent to the bridge structure to determine if ground disposal of the wash water meets the soil, slope, and distance requirements outlined in Table 19 of the *Ground Disposal of Effluent from WSDOT Preparatory Bridge Washing, January 2008* report. Table 19 from the report is included above.

The pertinent portions of the above mentioned report must be included in any contract specifications if the work is contracted out, including no discharge of effluent to impervious surfaces such as riprap adjacent to the waterbody and no discharge to any portion of a dry bed. In lieu of following the soil, grade, and distance criteria for infiltration, operators may elect to establish that the groundwater table is at least 1.5 feet below the surface where wash water would be disposed of in the upland areas. This is done through field verification by digging a series of holes deeper than 1.5 feet where the water will be discharged. If no water is found standing in the hole after 30 minutes, then it is presumed the water table is deeper than 1.5 feet below the surface at that location. If standing water is visible in the bottom of the hole, another hole must be dug three feet up slope and process repeated until an upland area is found where the groundwater is deep enough for ground discharge of the wash water. In areas where riprap or other impervious services are under the structure or where the water level is
below the OHWM exposing parts of the stream bed, tarps must be utilized to direct the wash water to an acceptable upland area or directly into the receiving water. BMPs must be installed to contain surface runoff from reaching the riprap or the exposed stream bed.

**Maintenance Washing and Spot Cleaning:**

The Permittee must review plans of the bridge structure to be washed to determine if part of the bridge is located outside the OHWM. If it is, the Permittee must field verify the ground water depth by digging a series of holes at least 1.5’ deep just up slope of the OHWM. If no water is found standing in the hole after 30 minutes, then it is presumed the water table is deeper that 1.5’ below the surface at that location. If standing water is visible in the bottom of the hole, another hole must be dug three feet up slope and process repeated until it is established where the groundwater is deep enough for ground discharge of the wash water.

If the slope under the structure has been covered with an impervious material, such as a concrete slap or interconnected pavers, tarps must be installed to either direct the wash water into an acceptable upland area, or directly discharge the wash water into the waterbody.

If wash water is discharged to the upland above the impervious area, BMPs must be installed to contain the water and allow it infiltrate into the ground.

If at the time the bridge washing occurs the water level of the receiving water is below the ordinary high water line leaving an area of exposed bed, the same process used for riprap areas must be utilized.

If there is no impervious surface, and the water level is at, or above, the OHWM the wash water discharged to the upland area must be allowed to sheet flow into the water body. When this is done, the area where the water enters the water body must be visually monitored to insure no erosion is happening and there is no sediment discharge to the water. Appropriate BMPs must be installed, if necessary, to control erosion and sediments.

**OVERLAND DISCHARGE OF MAINTENANCE WASH WATER**

The data collected by WSDOT on maintenance washing in the table below indicates that discharges to ground would not result in a violation of the groundwater standards. Table 1 shows the data collected on dissolved metal concentrations from four bridge washing projects. WSDOT/Operators may continue discharge of maintenance wash water to ground for those portions of the structure that are located over upland areas. In addition to the data collected to date, this is also based on the *reasonable potential* analysis completed by Ecology showing that past maintenance projects have not resulted in a violation of water quality standards. Operators must discharge wash water to impervious surfaces (such as riprap) in the near shore area, or exposed areas located below the OHWM. The practices described above for maintenance washing would still apply to 303(d) listed waterbodies and, on all projects, WSDOT/operators must visually monitor any overland discharge to ensure no erosion is occurring. Appropriate BMPs must be installed if necessary to control erosion and sediments.
<table>
<thead>
<tr>
<th>Maintenance Wash Data from 2000 to 2005</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
</tr>
<tr>
<td><strong>Dissolved Copper</strong></td>
</tr>
<tr>
<td>I-5, Skookumchuck River 2004</td>
</tr>
<tr>
<td>US 101, Hoquiam River 2006</td>
</tr>
<tr>
<td>Interstate 5, Cowlitz River 2007</td>
</tr>
<tr>
<td>US 12, Wishkah River 2008</td>
</tr>
<tr>
<td>Ground Water Criterion</td>
</tr>
<tr>
<td><strong>Dissolved Lead</strong></td>
</tr>
<tr>
<td>I-5, Skookumchuck River 2004</td>
</tr>
<tr>
<td>US 101, Hoquiam River 2006</td>
</tr>
<tr>
<td>Interstate 5, Cowlitz River 2007</td>
</tr>
<tr>
<td>US 12, Wishkah River 2008</td>
</tr>
<tr>
<td>Ground Water Criterion</td>
</tr>
<tr>
<td><strong>Dissolved Zinc</strong></td>
</tr>
<tr>
<td>I-5, Skookumchuck River 2004</td>
</tr>
<tr>
<td>US 101, Hoquiam River 2006</td>
</tr>
<tr>
<td>Interstate 5, Cowlitz River 2007</td>
</tr>
<tr>
<td>US 12, Wishkah River 2008</td>
</tr>
<tr>
<td>Ground Water Criterion</td>
</tr>
</tbody>
</table>