

# PACKS Checklist

## CATEGORY A: REPAIR, REPLACE, MAINTAIN IN-PLACE

Category	Subcategory and Covered Activity	Covered Activity Details
<b>Category A: Repair, Replace, Maintain In-Place<sup>b</sup></b>	<b>A1. Shoreline Stabilization Measures - Structural and Non-Structural</b>	Repair, replacement, and/or maintenance of existing shoreline stabilization measures, including structural measures (e.g., concrete, rock, or lumber <sup>c</sup> ; including bulkhead, footings, and/or foundations) and non-structural measures (e.g., natural shorelines or bioengineering).
	<b>A2. Boat Ramps - Community and Public</b> NOTE: Private boat ramps are prohibited.	In-place repair, replacement, or maintenance of existing community and public boat ramps comprised of poured concrete, concrete planks, and/or packed gravel.
	<b>A3. Dock - Single Family, Shared, and Community<sup>d</sup></b>	Repair or replacement of non-commercial dock structure (including pile installation and removal).
	<b>A4. Stairways/Steps and Walkways; Paths</b>	Repair or replacement of existing stairway/steps, walkways, and paths.
	<b>A5. Temporary Use/Temporary Access</b>	Temporary uses that require a CWA Section 404 permit (e.g., Use of construction-related materials during reservoir drawdown [e.g., bulk bags, sandbags] to access site).

<sup>b</sup> In-place equates to repair/replacement/maintenance of structures within the same footprint and location of existing structure, with an allowed expansion no greater than 10 percent beyond the original footprint, below the OHWM, for shoreline stabilization and boat ramps.

<sup>c</sup> The use of pressure-treated lumber is not authorized.

<sup>d</sup> A dock is a structure built over or floating upon the water that abuts the shore and is used to provide water access or moorage facility for watercraft. Docks include any combination of piers, ramps, and floats attached to the shore.

## DIRECTIONS

You have determined that your project includes this PACKS category. Multiple subcategories may apply to your project.

Continue below to review the PACKS category-specific CCMs. As emphasized at the top of the CCMs section, in the space provided after each CCM, applicants must provide a citation referencing the page number addressing that CCM of the appropriate document (i.e., geotechnical report, plan sheet) or “n/a” if not applicable.

Submit these documents as part of your permit application package. Once an applicant has reviewed and cited applicable CCMs, they must sign and date the last page agreeing to incorporate the applicable CCMs into their design, construction, and methods.

Lastly, if your project includes an additional PACKS category (or categories), proceed to and complete the additional applicable PACKS Checklist(s).

## DISCLAIMER

This checklist is provided by Tacoma Power as a Corps Section 404 application tool and does not guarantee PACKS coverage.

## CATEGORY A CONSTRUCTION CONSERVATION MEASURES (CCMS):

All activities under this PACKS category must comply with the following category-specific CCMS, as applicable:

In the space provided after each CCM, applicants must provide a citation referencing the page number addressing that CCM in the appropriate document (i.e., geotechnical report, plan sheet) or “n/a” if not applicable. Submit these documents with your permit application package.

Subcategory A1 – Shoreline Stabilization Measures	Citation or N/A
This programmatic requires that applicants first consider non-structural stabilization measures, and demonstrate that such alternatives are infeasible, before requesting authorization for structural shoreline stabilization measures.	N/A
Wherever feasible, applicants should utilize living shoreline techniques to provide, maintain, or improve habitat and/or ecosystem function(s), and enhance shoreline resilience. Feasibility is determined with a geotechnical assessment as part of the Mason County shoreline permitting process, and available through the Mason County Shoreline Planner.	N/A
The repair and replacement of structural stabilizations with non-structural measures is encouraged where possible to maintain fish habitat, hydrologic processes, and water quality and ensure no net loss of ecological function along the shoreline.	N/A
To be eligible for programmatic coverage, applicants must remove all creosote-treated wood from existing shoreline stabilization structures proposed for full replacement within the proposed project area and waterward of OHWM.	N/A
A licensed engineer must stamp all drawings for repair to existing shoreline stabilization measures (structural or non-structural).	N/A
In the event that any applicant desires to replace residential shoreline stabilization or armoring, the applicant must use the least impactful technically feasible bank protection alternative for the protection of fish life.	N/A
<p>An applicant that desires to replace residential shoreline stabilization or armoring must conduct a site assessment to consider the least impactful alternatives. The site assessment requirement can be fulfilled with submittal of the Shoreline Geotechnical Assessment prepared for Mason County for structural stabilization per Mason County Code 17.50.340.B.2, or updates, as amended. The applicant should propose a hard armor technique only after considering site characteristics such as the threat to major improvements or other factors in an analysis of alternatives. The common alternatives are listed below in order from most preferred to least preferred:</p> <ul style="list-style-type: none"> <li>• Remove the existing shoreline stabilization structure and restore the shoreline.</li> <li>• Remove the existing shoreline stabilization structure and install native vegetation.</li> <li>• Remove the existing shoreline stabilization structure and replace it with a soft structure constructed of natural materials, including bioengineering.</li> <li>• Remove the existing hard structure and replace it with a hard shoreline structure at the toe of slope.</li> </ul>	N/A
Structural shoreline stabilization measures are prohibited in Resource Management shoreline classification areas.	N/A
The activity may not exceed an average of 1 cubic yard of fill per running foot, as measured along the length of the treated bank, below the plane of the OHWM. [The threshold of 1 cubic yard of fill per running foot, as defined by Corps Nationwide Permit guidance (Corps 2022), applies only to the volume of fill waterward and below the plane of the OHWM, rather than the entire volume of fill placed as part of the activity.] Activities that do not meet this threshold but are within 10 percent of the original structure footprint below the OHWM will be considered consistent with the programmatic.	N/A

Subcategory A1 – Shoreline Stabilization Measures	Citation or N/A
No material may be placed in excess of the minimum needed for erosion protection.	N/A
Rock armoring to protect the toe of an existing shoreline stabilization structure is authorized as long as the rock placement proposed is demonstrated as the minimum quantity required to achieve long-term stability.	N/A
If a rock toe is not present, new rock may be placed to ensure minimal encroachment into the lakebed at the threshold of 1 cubic yard per running ft of stabilization/ bulkhead described above.	N/A
No material may be of a type, or placed in any location, or in any manner that will impair surface water flow into or out of any waters of the United States.	N/A
No material may be placed in a manner that will be eroded by normal or expected high reservoir conditions.	N/A
The activity must be properly maintained, which may require repair after severe storms or erosion events. As noted in Section 2.1 above, all work within the OHWM of Lake Cushman (including repairs) must occur when the reservoir is drawn down and the full pool elevation is a minimum of 5 ft waterward of proposed activities (i.e., 5 ft of dry land between water and work area).	N/A
Large wood may be chained as part of the design.	N/A
Coir logs, coir mats, stone, native wood debris, and other structural materials must be adequately anchored, of sufficient weight, or installed in a manner that prevents relocation in most wave action or reservoir conditions, except for extremely severe storms.	N/A
Degradable fabric and support filters may be used but must be designed and constructed to prevent surface exposure of the material through time.	N/A
Land-based equipment will be used to deliver materials. If the project area is inaccessible via land-based equipment due to steep slopes or dense native vegetation, material delivery by barge or boat is permitted as an alternative to limit disturbance.	N/A
Temporary stockpiling on the exposed lakebed will be permitted only with appropriate containment and with full and expedient removal at completion of work.	N/A
All depressions created during construction must be filled prior to inundation.	N/A
<b>(For Structural Shoreline Stabilization)</b> Buried rock may be used below grade where necessary to stabilize the toe of the slope and must be covered with sand/small gravel mixes in such a way to minimize net erosion through time.	N/A
<b>(For Structural Shoreline Stabilization)</b> Structural measures that utilize natural materials such as rock are preferred over structural measures that use manufactured materials such as concrete or lumber.	N/A
<b>(For Structural Shoreline Stabilization)</b> Structures made of tires, rubble, petroleum-based products, railroad ties, filled barrels, brick, asphalt, solid waste, or scrap machinery are not allowed.	N/A
<b>(For Structural Shoreline Stabilization)</b> Gabion baskets are not allowed.	N/A

Subcategory A1 – Shoreline Stabilization Measures	Citation or N/A
(For Structural Shoreline Stabilization) Adequate bank toe protection must be provided to ensure stability without relying on additional riprap.	N/A
(For Structural Shoreline Stabilization) Construction of stabilization structures must be completed prior to any backfilling.	N/A
(For Structural Shoreline Stabilization) All construction materials, including riprap and backfill, must be obtained from an upland source.	N/A
(For Structural Shoreline Stabilization) Structures must be driven into the reservoir bed a depth sufficient to prevent undermining caused by erosion.	N/A
(For Structural Shoreline Stabilization) Structures must be structurally tight to prevent seepage of backfill material.	N/A
(For Structural Shoreline Stabilization) All nuts, bolts, nails, cables, straps, etc. used to secure and support structures must be noncorrosive (e.g., stainless steel, aluminum, galvanized steel).	N/A
(For Structural Shoreline Stabilization) Applicants must follow guidelines from the Integrated Streambank Protection Guidelines (WDFW 2002) and WAC 220 when designing shoreline stabilization measures. The key points, amended to be applicable to this programmatic, are as follows:	N/A
When an existing bulkhead is being repaired, construction shall occur no farther waterward of the existing bulkhead than is necessary for construction of the new footing.	N/A
The replacement structure shall be designed, located, sized, and constructed to minimize effects on shoreline process and fish and wildlife habitat.	N/A
Replacement of a failed bulkhead shall be permitted at the toe of slope.	N/A
Existing bulkheads that are being replaced shall be removed unless removing the structure would cause more ecological disturbance than leaving it in place.	N/A
Replacement bulkheads shall not encroach any farther waterward of the OHWM than the existing structure unless a geotechnical assessment concludes that it is the only feasible way to address overriding safety or environmental concerns. In such cases, the replacement shall abut the waterward side of the existing structure.	N/A

Subcategory A2 – Boat Ramps - Community and Public ONLY	Citation or N/A
This action does not include private boat ramps. Private boat ramps are a prohibited use within the Project Boundary (Tacoma Power 2014 or the most recent version thereof).	N/A
Covered activities are limited to the in-place repair, replacement, and/or maintenance of existing community and public boat ramps. This action does not include new community or public boat ramps.	N/A
Replacement boat ramps must occur within the same footprint or be no more than 10 percent larger than the footprint of the original structure to be considered consistent with the programmatic.	N/A
The discharge of dredged or fill material into waters of the United States must not exceed 50 cubic yards (waterward of the OHWM) of concrete, rock, crushed stone, or gravel into forms or in the form of pre-cast concrete planks or slabs.	N/A

Subcategory A2 – Boat Ramps - Community and Public ONLY	Citation or N/A
Asphalt or other petroleum-based surfaces are not allowed. Bituminous concrete is not allowed as a ramp surface. Ramp surfaces may consist of gravel or clean stone; pre-cast concrete planks, panels, or slabs; or, cast-in-place concrete.	N/A
Gravel or stone ramps must be designed to prevent the materials from eroding into the reservoir.	N/A
Ramps containing concrete must be sufficiently cured to prevent leaching prior to contact with water.	N/A

Subcategory A3 – Dock - Single-Family, Shared, Community	Citation or N/A
A single-family dock is used by a single lessee. A shared dock is defined as a non-commercial shoreline structure associated with three or more shoreline-adjacent, single-family residences/lessees. A community dock is defined as a dock that provides moorage for pleasure craft and/or accommodates recreational activities for use in common by residents of a subdivision or community.	N/A
Because single-family, shared, and community docks are prohibited in Resource Management shoreline classification areas, repair and replacement of such structures in this shoreline classification are also prohibited.	N/A
To avoid and minimize impacts to listed species, open-celled, beadboard-type polystyrene is not an approved flotation material for docks. Non-foam flotation systems may be used; however, structures cannot be covered with metal. Injected drum flotation is not allowed for docks.	N/A
Repaired and replacement single-family structures can have no more than 300 square ft of total overwater coverage. [Overwater coverage refers only to portions of structures at or below the full pool elevation of 738 ft at Lake Cushman.] If the existing single-family structure has more than 300 square ft of total overwater coverage, the size of the repaired or replacement structure must be reduced to no more than 300 square ft of total overwater coverage to be eligible for coverage under this programmatic.	N/A
Repaired and replacement shared dock structures can have no more than 300 square ft of total overwater coverage.	N/A
To be eligible for programmatic coverage, applicants must remove all creosote-treated wood from existing docks proposed for full replacement within the proposed project area and waterward of OHWM.	N/A
Float cradles may be repaired or replaced as part of this activity, if included as part of the existing structure design.	N/A
Repaired and replacement single-family and shared dock structures may include the addition of new floats as long as the total overwater coverage of the entire structure (including the float) does not exceed 300 square ft. The entire structure (including the float) must abide by the restrictions and CCMs described herein and may not introduce new effects on ESA-listed species and their habitat beyond those considered in this programmatic.	N/A
All synthetic flotation material associated with the replaced dock must be permanently encapsulated to prevent breakup into small pieces and dispersal in water.	N/A

Subcategory A3 - Dock - Single-Family, Shared, Community	Citation or N/A
The width of each replacement ramp shall not exceed 5 ft and the width of each pier, not including the pilings, shall not exceed 6 ft. Additionally, the width of each replacement float shall not exceed 8 ft.	N/A
Docks must extend at least 12 inches above the water surface at all times, but no more than 5 ft at full reservoir elevation.	N/A
Replacement float design must incorporate stop blocks to prevent them from grounding when the reservoir is drawn down.	N/A
A dock anchorage system is required to secure mooring of the replacement structure.	N/A
Anchorage systems utilizing a 'deadman' (i.e., an anchor buried on shore) or ground stakes must be installed flush with the existing grade. Anchor cables may not be attached to trees, stumps, power poles, guardrail posts, or similar items.	N/A
Ground stakes or other shore-side anchoring must be countersunk into the grade.	N/A
Countersinking accommodates shoreline erosion and extends the period of time that anchors are covered.	N/A
Removal of shoreline and aquatic vegetation must be limited to that necessary to gain access to construct the shoreline use.	N/A
Tree removal to repair or replace docks is not authorized.	N/A
Replacement floating dock structures must be built so that they can adapt to changes in reservoir elevation.	N/A

Subcategory A4 - Stairways, Steps, Walkways, and Paths	Citation or N/A
This activity does not include new stairways, walkways, and paths.	N/A
Stairways and walkways are prohibited in Resource Management shoreline classification areas.	N/A
For portions of replacement stairways, walkways, and paths located below the OHWM, activities must occur within the same footprint as the original structure to be considered consistent with the programmatic.	N/A
The path should be the minimum width necessary to accommodate shoreline access and shall not exceed 4 ft in width in the Shoreline A and B Classifications and shall not exceed 3 ft in width in the Resource Management Classification.	N/A
Path surfaces should consist of natural materials such as grass, wood chips, or gravel/crushed rock, and placement of such must not involve earth moving or soil disturbance.	N/A
Materials used for the maintenance, repair, or replacement of stairways and walkways should consist of metal, dry laid stone, wood, or wood with loose stone, gravel, or wood chips.	N/A

Subcategory A4 - Stairways, Steps, Walkways, and Paths	Citation or N/A
Paths may extend from the common boundary between the Project Boundary (742 ft elevation for Lake Cushman and 482 ft at Lake Kokanee) and the adjacent lot to the full pool elevation (738 ft elevation at Lake Cushman and 478 ft elevation at Lake Kokanee).	N/A
Stairways below OHWM must be open-frame construction and not solid structures (i.e., concrete).	N/A

Subcategory A5 - Temporary Use, Temporary Access	Citation or N/A
Temporary materials may be used only when the reservoir is drawn down and may be placed only in the dry.	N/A
Temporary devices and structures may remain in place for no longer than 60 days.	N/A
Following completion of construction, temporary materials must be entirely removed to an upland area.	N/A
Affected areas must be restored to pre-construction elevations and must be revegetated with native species if vegetation was removed for the placement of temporary materials.	N/A

**I have read through the above-listed CCMs and agree to incorporate all applicable CCMs into the project design, construction, and methods.**

Project Applicant Name Signed	Date
Project Applicant Name Printed	