

Mitigation Measures for the WDFW Deschutes Watershed Center Hatchery Project

Overall Mitigation Strategy

WDFW will coordinate with all appropriate agencies during the design, permitting, and construction processes to avoid, minimize, and mitigate impacts to aquatic, riparian, and terrestrial species and their habitats.

Avoidance

- A “No-Action” alternative was not considered. In 2000, as part of the Hatchery Reform Project established by the U.S. Congress, the Hatchery Scientific Review Group – an independent scientific review panel – recommended the construction of a new fish hatchery in the Deschutes River watershed to bring the fish-rearing program in the Deschutes Watershed into compliance with guidelines set forth by state and tribal representatives as the fisheries Co-managers.

Minimization

- The project will be designed to limit impacting upland and aquatic environments to the greatest extent practicable.

Mitigation

- Unavoidable impacts will be mitigated to ensure no net loss of habitat functions and values.

Specific Mitigation Measures

To mitigate impacts due to the construction and operation of the proposed facility, WDFW will incorporate the following mitigation and conservation measures into the project:

Mitigation for construction impacts:

- A site-specific Storm Water Pollution Prevention Plan (SWPPP) will be developed prior to project implementation. The SWPPP will identify best management practices (BMPs) and erosion/sediment control to minimize the inadvertent delivery of sediment or hazardous materials to waterbodies or runoff areas.
- BMPs may include, but are not limited to:
 - Straw wattles, silt fences, turbidity curtains, seeding of exposed soils, and diversion of surface waters to keep erosion and runoff to a minimum.
 - Waters of the state will be protected from erosion during and after construction consistent with permits and regulations.
 - Aquatic Invasive Species measures will be followed to minimize the risk of introducing or spreading invasive species.
 - Other erosion control measures will be incorporated, as necessary, in accordance with permit requirements.
 - Site temporary erosion and sediment control (TESC) plans will be developed during the design phase and implemented during construction to control erosion and site runoff.

- Equipment will be washed before entering the job site and inspected daily for fuel or lubricant leaks.
- Equipment staging and fueling areas will be completely isolated from surface waters to avoid the possibility of impacts to surface waters resulting from staging or fueling activities.
- The project will avoid impacts to wetlands as much as possible; however, a minor amount of wetland and wetland buffer impacts will occur due to the construction of the river intake, pump house, and access road.
 - The current anticipated area of impact to wetlands and wetland buffers is as follows, but has not yet been finalized. Approximately 500 ft sq of Category II riverine wetland and 20,000 ft sq of wetland buffer will be impacted to construct the intake, pump house, and access road.
 - Sufficient mitigation will be designed within the project to assure compliance with Thurston County, Department of Ecology, WDFW, and US Army Corps of Engineers mitigation requirements.
 - The mitigation plan is being developed and will include contingencies that can be readily implemented to ensure no loss of ecological functions.
 - On-site and watershed-level mitigation options are being explored in coordination with local watershed groups.
 - Stormwater will be treated; then infiltrated, detained, and/or dispersed outside the wetland and wetland buffer for any new runoff from impervious surfaces.
- In-stream work areas will be isolated from surface water to prevent sediment-laden water from impacting waters outside the work area and to protect aquatic resources.
- Fish exclusion and monitoring will occur before and during construction.
- Construction timing will be limited to drier months of the year (August, September) when possible, to construct the upland elements of the project.
- Construction of the intake will occur during the in-water work window, which will be determined in coordination with the WDFW Habitat Biologist.
- Construction below OHWM and within wetlands and wetland buffers will be limited to one season.
- WDFW will work with Thurston County using the USFWS Habitat Conservation Plan permit process to mitigate impacts to pocket gopher habitat from the construction of the residences and facility.
- WDFW will avoid tree removal where possible for the construction of the facility. Where trees must be removed, WDFW will replant at the appropriate ratio outlined by Thurston County regulations.

Mitigation for post-construction and early operational impacts:

- Mitigation for shoreline impacts, including riparian plantings, will comply with County, State, and Federal regulations.
- The mitigation plan is being developed and will include contingencies that can be readily implemented to ensure no net loss of ecological functions.
- Disturbed areas will be seeded or planted with native plants following construction activities. WDFW will work with Thurston County to determine a landscaping plan.
- The Deschutes River surface water intake and outfall will meet state and federal standards for fish screening.

Mitigation for future impacts:

- The proposed project will bring the fish-rearing program in the Deschutes Watershed into compliance with guidelines set forth by state and tribal representatives as the fisheries Co-managers.
 - Fish production at the proposed Deschutes Hatchery will allow for fish rearing and release within the watershed, which will reduce the need to transport fish to other facilities for incubation and rearing, thereby reducing associated disease and mortality.
- Deschutes River water withdrawn for facility usage will be returned to the river no more than 30 feet from the point of withdrawal.
- All discharges will meet the requirements of a National Pollutant Discharge Elimination System permit as administered by the Department of Ecology, and address water quality standards.
- The hatchery will be a public facility providing recreational opportunities, including fishing, wildlife viewing, and educational materials.