NPTH Hatchery Operations and Snake River Steelhead Kelt Reconditioning Finding of No Significant Impact

Bonneville Power Administration
DOE/EA-2078
January 2019

SUMMARY

Bonneville Power Administration (BPA) announces its environmental findings for its proposal to provide funding to the Nez Perce Tribe for the ongoing production of Snake River fall and spring/summer Chinook salmon at the Nez Perce Tribal Hatchery (NPTH); and to provide funding to the Columbia River Intertribal Fish Commission (CRITFC) for a program of capture, reconditioning, and release of post-spawn female steelhead, including construction and operation of a new steelhead kelt reconditioning facility at NPTH.

BPA prepared an environmental assessment (EA) evaluating the Proposed Action and No Action Alternative. Based on the analysis in the EA, BPA has determined that the Proposed Action is not a major federal action significantly affecting the quality of the human environment, within the meaning of the National Environmental Policy Act (NEPA) of 1969 (42 United States Code [USC] 4321 et seq.). Therefore, the preparation of an environmental impact statement (EIS) is not required and BPA is issuing this Finding of No Significant Impact (FONSI) for the Proposed Action. The Proposed Action is not the type of action that normally requires preparation of an EIS and is not without precedent.

The comment received on the draft EA and a response to that comment is included in the final EA. The final EA also identifies changes made to the draft EA.

The attached Mitigation Action Plan identifies the mitigation measures that BPA and the Nez Perce Tribe are committed to implementing as part of the Proposed Action.

PUBLIC AVAILABILITY

This FONSI will be mailed to individuals who previously requested it; a notification of availability will be mailed to other potentially affected parties; and the EA and FONSI will be posted on BPA's project website: *http://www.bpa.gov/goto/NezPerceHatchery.*

PROPOSED ACTION

Under the Proposed Action, BPA would:

- Fund the Nez Perce Tribe for ongoing hatchery operations at NPTH for the continued production and release of spring/summer and fall Chinook salmon at the same production numbers (no increase) as in the past. Included in this proposal is a change to release locations of some of the hatchery-reared fall Chinook salmon smolts, and operations of a temporary weir on the South Fork Clearwater River; and
- Fund CRITFC for implementation of a Snake River Steelhead Kelt Reconditioning Program for the capture, reconditioning, and release of post-spawn Snake River steelhead, including construction of a steelhead kelt reconditioning facility within NPTH. This program would expand an existing experimental operation to a production level.

Kelt reconditioning, as proposed here, consists of the capture of post-spawned steelhead and the administration of disease-preventative medications and feed for the purpose of improving survival over what would be expected in the wild. Upon release, these fish are expected to return again to their spawning areas, successfully spawn, and thereby increase spawner returns and productivity. This program would expand an on-going, and successful, research program to production levels.

NO ACTION ALTERNATIVE

Under the No Action Alternative, BPA would not fund CRITFC or the NPT for any of the elements of the Proposed Action described above. This action is a federal funding decision by BPA, not a decision to proceed or not proceed with these programs. CRITFC and the NPT could acquire funding from other sources and proceed with these actions. For the purposes of this EA, however, the No Action Alternative was evaluated as if it was a decision to not proceed with these actions, and hatchery production of all stocks at NPTH would cease.

There would also be no funding for a kelt reconditioning program or for construction of a reconditioning facility, and the existing experimental program would cease, and not expand to a production scale.

This No Action Alternative would not include the removal of existing facilities.

SIGNIFICANCE OF POTENTIAL IMPACTS OF THE PROPOSED ACTION

To determine whether the Proposed Action has the potential to cause significant environmental effects, the potential impacts on human and natural resources were evaluated and presented in Chapter 3 of the EA. To summarize potential impacts, four impact levels were used - high, moderate, low, and no impact. These impact levels are based on the considerations of context and intensity defined in the Council on Environmental Quality regulations for implementing NEPA (40 CFR 1508.27). High impacts could be considered significant impacts, if not mitigated, while moderate and low impacts are not. Based on the analysis, the Proposed Action would have no significant impacts.

The following discussion provides a summary of the Proposed Action's potential impacts and the reasons these impacts would not be significant. Many of the effects discussed below would be minimized through the application of mitigation measures identified in the Mitigation Action Plan.

Geology and Soils

Impacts to geology and soils would be low.

- Soil disturbance impacts and potential erosion from the construction of the new kelt reconditioning facility within the NPTH hatchery would be limited to 0.25 acres of disturbance and minimized with mitigation measures and best management practices.
- Annual fish production and kelt reconditioning operations would have no ground-disturbing activities.

Water Resources

The impacts to water resources would be low.

- There would be no impacts on water quality during construction of the kelt reconditioning facility because it is on flat ground with no potential for runoff. It is over 300' from the Clearwater River and separated from it by roads and a railway corridor, with no potential for any runoff, if there were any, to reach the river.

- Effects on water quality would only come from the impacts of effluent discharge from ongoing hatchery operations and discharge increases from operations of the proposed kelt reconditioning program. The new kelt reconditioning program would increase effluent discharge by 19%, but this effluent amount would only be 0.41% of the river's lowest annual flows, a miniscule amount. Effluent effects would be discernible only in the immediate area downstream of its discharge site, with return flows dissipating quickly downstream and the effects diminishing accordingly.
- Effects on water quantity would come from the impacts of ongoing operations of the hatchery and satellite facilities, and the 19% increase in water use from operation of the proposed kelt reconditioning facility. The total withdrawal from the Clearwater River would be 20.59 cubic feet per second (cfs), which is only a 0.41% reduction in flow during the lowest flows in the fall, and only a 0.06% reduction during the high spring flows. This reduction is only realized between the intake and the effluent discharge, which is 500 feet downstream.

Vegetation

The impacts to vegetation would be low.

- Effects to vegetation come solely from the impacts of the heavy equipment use and ground disturbance associated with the construction of the kelt reconditioning facility which would occur on only 0.25 acre of mowed hayfield. There would be no disturbance to native vegetation since none is present there.
- Disturbance of soil would provide opportunity for the spread of invasive plants. Application of the mitigation measures would effectively minimize or prevent infestations.

Wetlands and Floodplains

There would be no impacts to wetlands or floodplains.

- Construction of the new kelt reconditioning facility would not occur in wetlands or floodplains.
- There would be no new actions within wetlands or floodplains for operation of the satellite facilities or the temporary South Fork Clearwater weir. All activities and effects are pre-existing and ongoing.

Fish

The impacts to fish would be moderately beneficial.

- A diverse set of effects on fish would come from the release of over 2 million hatchery-reared Chinook into the Clearwater River each year. These releases, over time, impact the genetic make-up of native Chinook stocks; they have the potential to transfer disease to natural-origin fish; and they would compete with natural-origin fish for food and cover (though the time together is short thus the impact of this is low). As returning adults, there would be competition with native fish for spawning sites and mate selection. Released juvenile Chinook are a food source for larger fish in the river, and returning adults transport marine-derived nutrients upriver, enriching the environments there. They would also provide for commercial and recreational harvest of fish.
- The change in release locations of hatchery-reared juvenile fall Chinook would result in more hatchery fish being released into the South Fork Clearwater, and fewer released into the lower mainstem Clearwater River. Rapid downstream migration of these juveniles would minimize the time these fish would compete with native fish in the South Fork, thus minimizing potential effects. They would, however, provide a temporary forage boost for

bull trout in the South Fork. The corresponding decrease in numbers of released fish in the mainstem would reduce any competitive impact those fish previously exerted on native fish there, but there would be no loss of forage to bull trout since bull trout are not present in that part of the river at that time of year.

- The installation, operation, and removal of the temporary weir in the South Fork would disrupt fish movement and habitat use and reduce habitat availability between October 1 and December 1 when it would be in operation. Non-target fish would be trapped and handled, though released upstream or downstream depending on their original movement direction. These effects, however, are temporary (October through November), with mitigation measures implemented to minimize harm to affected fish.
- The largest effect on fish from hatchery operations is the resulting increase in salmon populations in the Clearwater, Snake, and Columbia Rivers.
- Reconditioning of steelhead kelts, and their monitoring and evaluation after reconditioning, could be stressful to the adults captured. They would be trapped, handled, transported, injected, and fed non-natural food. As with broodstock and juveniles in hatchery operations, these actions are stressful and sometimes lethal to fish, but mitigation and following established fish handling protocols minimizes these impacts. Conversely, this reconditioning relieves these fish of the physical stress and environmental risk of downstream and upstream (returning) migrations which are stressful and often lethal.
- The effects of releasing reconditioned fish are anticipated to increase productivity on the spawning grounds by larger, more productive, steelhead than there would be otherwise. This would increase the numbers of steelhead naturally produced from the Snake River Basin overall, and thus increase the numbers of steelhead ultimately returning to spawn.
- There could be beneficial genetic effects on the steelhead population from this reconditioning program. Reconditioned fish would be more productive than other spawners and would likely contribute to the genetic pool disproportionately. This effect would likely magnify as time progresses and is anticipated to increase fitness of the offspring (from larger eggs) and increase the likelihood of maintaining the diversity of life history pathways (iteroparity, and consecutive/skip spawning) in the Snake River steelhead population.

Wildlife

Impacts to wildlife would be low.

- The construction and operational actions at the NPTH would be expected to affect few wildlife species since these actions would occur only at the existing hatchery site, which, as a mowed hayfield, provides little habitat.
- Activities at satellite facilities would not change from the ongoing level of human activities, which may disturb wildlife; and the presence of thousands of young fish, which attract fish-eating wildlife. There would be an increase in the number of fish released in the South Fork Clearwater River, but this is not expected to attract any more fish-eating wildlife than are already attracted by the annual release of thousands of young fish there.
- Maintaining increased runs of anadromous fish would continue to provide an increased contribution to the food web over what would be there without the hatchery release operations. This increased food base would benefit marine birds and mammals in the Pacific Ocean and the Columbia River Estuary as well as benefit piscivorous birds and mammals in the upper reaches of the Clearwater River basin.
- There would be no effect to wildlife or wildlife habitat from research monitoring or evaluation actions since these do not modify wildlife habitat nor require human occupancy of them, beyond a *de minimus* presence during surveys.

Socioeconomics and Environmental Justice

Impacts to socioeconomics and environmental justice would be low to moderate.

- There would be short-term economic benefits (wages and construction-related local purchases) from the construction activity associated with constructing the steelhead kelt reconditioning facility at NPTH.
- Hatchery operations provide local employment and expenditure benefits to local communities from the approximately 15 people employed there. The addition of the kelt reconditioning facility may provide additional benefits from the one permanent and one or two temporary employees it may support. These contributions are minor within the larger four-county area analysed in the EA, but could be meaningful in the small communities surrounding NPTH.
- The continued funding for Chinook production and the addition of the kelt reconditioning program would continue to support the tribal economy, traditions, and cultural practices of the Nez Perce Tribe.

Land Use and Recreation

Impacts to land use and recreation would be low to moderate.

- There would be no changes to land use by any element of the Proposed Action, or any effect to adjacent land uses.
- There would be a loss of approximately 0.25 acres of designated prime farmland at the site of the proposed kelt reconditioning facility, though it is not currently under agricultural production.
- Recreational fishing opportunities for fall Chinook are expected to increase as a result of the increased juvenile releases in the upper Clearwater Basin and subsequent adult returns. Similar increases in recreational fishing opportunity for steelhead fishing may also develop over time throughout the Salmon River basin from the kelt reconditioning program.

Visual Resources

Impacts to visual resources would be low.

- The Proposed Action adds one building to the existing NPTH facility but does not change the character of the landscape or the scenic view from local roads or the river.
- No changes to the satellite facilities or uses of them are proposed. The scenic values there would be unchanged.

Air, Noise, and Public Health and Safety

Impacts to air, noise, and public health and safety would be low.

- There would be short-term effects from the construction activities for the steelhead kelt reconditioning facility, but the application of mitigation measures would limit the amount of temporary fugitive dust; vehicle and equipment emissions; and noise from this construction. Similarly, effects from operational activities at the hatchery, reconditioning facility, and satellite facilities would be minimized by application of the mitigation measures.
- The limited extent and impacts of construction and operation of the sites would create no additional demands on the capacity of existing medical and public safety services.

Cultural Resources

Impacts to cultural resources would be low.

- The construction of the steelhead kelt reconditioning facility would be the only ground-disturbing action in the Proposed Action. This facility, however, would be located on lands that have been previously ploughed for agricultural crops, impacted by the construction of the NPTH, and are within the larger hatchery 'footprint' that has been surveyed in the past. Mitigation measures to mark avoidance areas and to stop work if cultural materials are revealed during construction would lessen potential cultural resource impacts.

Climate Change

Impacts to climate change would be low.

- The Proposed Action's contribution to climate change would be from the release of exhaust gases from construction vehicles necessary for construction of the kelt reconditioning facility and from vehicles necessary for ongoing hatchery operations.
- Operations of the kelt reconditioning program would increase truck use to transport kelts to and from the NPTH reconditioning facility which would increase greenhouse gas emissions from the few trucks operating at the hatchery at those times.
- The application of mitigation measures would limit the amount of exhaust produced by vehicles and equipment from these actions.

DETERMINATION

Based on the information in the EA, as summarized here, BPA determines that the Proposed Action is not a major federal action significantly affecting the quality of the human environment within the meaning of NEPA (42 USC 4321 *et seq*.). Therefore, an EIS will not be prepared and BPA is issuing this FONSI for the Proposed Action.

Issued in Portland, Oregon

/s/ Scott G. Armentrout — *January 16, 2019*

Scott G. Armentrout — Date
Vice President
Environment, Fish and Wildlife

NPTH Hatchery Operations and Snake River Steelhead Kelt Reconditioning Mitigation Action Plan

Mitigation Action Plan

This Mitigation Action Plan is part of the Finding of No Significant Impact (FONSI) for the NPTH Hatchery Operations and Snake River Steelhead Kelt Reconditioning Program. This action would provide funding to the Nez Perce Tribe for the ongoing production of Snake River fall and spring/summer Chinook salmon at the Nez Perce Tribal Hatchery (NPTH) in Nez Perce County, Idaho; provide funding to the Columbia River Intertribal Fish Commission (CRITFC) for a program of capture, reconditioning, and release of post-spawn female steelhead, including construction of a steelhead kelt reconditioning facility within NPTH.

This Mitigation Action Plan is for the Proposed Action and includes all of the integral elements and commitments made in the Environmental Assessment (EA) to mitigate potential adverse environmental impacts.

The BPA, CRITFC, and the Nez Perce Tribe (and their contractors) would be responsible for implementing the mitigation measures during various phases of project work. Relevant portions of this Mitigation Action Plan would be included in the construction contract specifications. This would obligate the contractor to implement the mitigation measures identified in the Mitigation Action Plan that relate to contractor responsibilities during construction and post-construction.

If you have any general questions about the project, contact the Project Manager, Tracy Hauser at 503-230-4296, or email thauser@bpa.gov.

The Mitigation Action Plan may be amended if revisions are needed due to new information or if there are any significant project changes.

Mitigation Measures

Minimization and mitigation measures have been identified to reduce potential impacts associated with the Proposed Action, and are provided below in the table below.

Mitigation Action Plan

Mitigation Measure	Implementation
Geology and Soils	
Install and maintain all temporary erosion controls downslope of applicable project activities until construction actions are complete.	Before and during construction (Contractor)
Segregate topsoil from subsoil and store during excavation for use in site reclamation.	During construction (Contractor)
Grade and cover disturbed areas and areas of excavated soils with at least 2 inches of compost upon completion of construction.	During construction (Contractor)
Implement BMP erosion and sediment control measures during construction.	Before and during construction (Contractor)
Water Resources	
Follow project-specific Clean Water Act permit protection measures.	Before, during, and after construction; and during acclimation/release operations (Contractor, Nez Perce Tribe, and CRITFC)
Comply with Nez Perce Tribe National Pollutant Discharge Elimination System Permit Waste Management Plan	During hatchery operations. (Nez Perce Tribe and CRITFC)
Use sediment barriers such as fences, weed-free straw matting/bales, or fiber wattles, as necessary, in all work areas to intercept any surface flow that might transport sediment to the Clearwater River.	Before and during construction (Contractor)
Inspect erosion and sediment controls weekly, maintain them as needed to ensure their continued effectiveness, and remove them from the proposed hatchery site when vegetation is re-established and the area has been stabilized.	During and after construction (Contractor)
Maintain materials for spill containment and clean-up on site during pre-construction, construction and restoration phases of the project.	Before, during, and after construction (Contractor)
Locate vehicle staging, cleaning, maintenance, refuelling, and fuel storage areas a minimum of 150 feet from the Clearwater River.	Before and during construction (Contractor)

Mitigation Measure	Implementation
Wash heavy equipment before delivery to project site to remove oils, fluids, grease, etc. Inspect and clean equipment regularly. Prohibit discharge of vehicle wash water into any stream, water body, or wetland without pre-treatment to meet state water quality standards.	During construction (Contractor)
Inspect machinery daily for fuel or lubricant leaks.	Before during and after construction (Contractor)
Design and operate on-site chemical storage buildings to fully contain accidental spills of chemicals stored at the proposed facilities.	Before, during, and after construction (Contractor)
Inspect and maintain access roads and other facilities after construction to ensure proper function and nominal erosion rates.	After construction (Nez Perce Tribe)
Perform all non-emergency maintenance of equipment off-site.	Before and during construction (Contractor)
Vegetation	
Seed disturbed areas with a native erosion-control grass seed mix to prevent future erosion, stem the invasion of noxious weeds, and provide wildlife benefit.	During and after construction (Contractor)
Cover all temporarily disturbed areas with at least 2 inches of compost and replant with native vegetation.	During construction (Contractor)
Implement a noxious weed control program which includes the following elements: • Treat known infestations before ground disturbance begins by scheduling appropriate weed treatments, such as mowing, hand pulling, and use of approved herbicides. • Map and flag areas of noxious weed populations so these populations can be avoided when possible. • Ensure equipment brought into the project area is free of weeds and weed seeds. • Work from relatively weed-free areas into the infested areas rather than vice-versa. • Clean equipment and vehicles of mud, dirt, and plant parts after working in infested areas. • Maintain weed-free staging areas. • Apply herbicides according to labeled rates and recommendations to ensure protection of surface water, ecological integrity, and public health and safety. • Implement and periodically schedule post-project control of noxious weeds on an as-needed basis.	After construction (Contractor and Nez Perce Tribe)
Fish	

Mitigation Measure	Implementation
Apply protective measures resulting from consultation with US Fish and Wildlife Service (USFWS) and National Marine Fisheries Service (NMFS).	Before, during, and after construction; and during hatchery and acclimation operations (Contractor, Nez Perce Tribe, and CRITFC)
Apply the screening criteria for water withdrawal devices found in the 2011 NMFS publication "Anadromous Salmonid Passage Facility Design" (NMFS 2011) that sets forth standards designed to minimize the risk of harming naturally produced salmonids and other aquatic fauna. This would be applied at all facilities, including the temporary weir.	During hatchery, acclimation and release operations (Nez Perce Tribe)
Daily monitoring for bull trout congregating above and below the weirs during bull trout migration periods would be conducted daily by the NPTH personnel. If congregations are evident, a section of the weir would be opened to facilitate migration through the weir facility.	During hatchery and acclimation operations (Nez Perce Tribe and CRITFC)
Coordinate timing and methods of construction with NMFS to minimize disturbance to Endangered Species Act (ESA)-listed species and life stages.	During construction (Nez Perce Tribe and CRITFC)
Maintain fish screens at water intake structures to minimize entrainment of aquatic species.	During hatchery and acclimation operations (Nez Perce Tribe)
Follow established protocols (legal or scientific) for handling ESA-listed species.	During construction, hatchery and acclimation operations (Nez Perce Tribe and CRITFC)
Ensure that the hatchery facilities are operating in compliance with all applicable fish health guidelines and facility operation standards and protocols, by conducting annual audits and producing reports that indicate the level of compliance with applicable standards and criteria.	During hatchery and acclimation operations (Nez Perce Tribe and CRITFC)
Adaptively manage fish releases to maximize survival of released and non-target fish based on recent studies and from NPTH and kelt reconditioning research, monitoring, and evaluation activities.	During acclimation and release operations (Nez Perce Tribe and CRITFC)
Conduct all MR&E activities in accordance with the terms and conditions of the existing Section 7 consultations terms and conditions.	During hatchery, acclimation, and release operations (Nez Perce Tribe and CRITFC)
Comply with all applicable terms and conditions of the existing ESA Section 10 permits issued for the NPTH and any future ESA Section 7 consultation terms and conditions.	During construction, hatchery, acclimation, and release operations (Nez Perce Tribe and CRITFC)
Screen all surface water pumps according to NMFS juvenile salmonid criteria.	During hatchery, acclimation, and release operations (Nez Perce Tribe)

Mitigation Measure	Implementation
If formalin treatments are necessary, the discharge would be managed to ensure 1 milligram per liter or less would be discharged to adjacent waters.	During hatchery, and acclimation operations (Nez Perce Tribe and CRITFC)
Use therapeutic chemicals only when necessary, and typically for short durations, to be in conformance with accepted standard practices and treatment applications.	During hatchery, acclimation, and release operations (Nez Perce Tribe and CRITFC)
Wildlife	
Coordinate timing and methods of construction with USFWS to minimize disturbance to ESA-listed species and life stages.	Before and during construction (BPA, Nez Perce Tribe, and CRITFC)
Coordinate timing and methods of construction with resource agencies to minimize disturbance to ESA-listed species and life stages.	Before and during construction (Nez Perce Tribe and BPA)
Land Use and Recreation	
Provide appropriate contact information for contractor liaisons and project staff to local residents for any concerns or complaints during construction.	During and after construction (Contractor and Nez Perce Tribe)
Repair damage to roads that may occur through project construction or construction vehicle use.	Before, during, and after construction (Contractor)
Limit construction activity to normal workday hours or 8:00 AM to 5:00 PM to minimize impacts to nearby residents.	During construction (Contractor)
Visual Resources	
Remove all temporary structures, devices, materials, and equipment from the site upon completion of all construction activities; and dispose of all excess spoils and waste materials in compliance with federal, state, and local regulations.	After construction (Contractor)
Air, Noise, Public Health, and Safety	
Sequence and schedule construction work to minimize the amount of bare soil exposed to wind erosion.	Before and during construction (Contractor)
Apply dust control measures (e.g. watering trucks, low speeds, apply gravel to access roads, etc.) as needed. Minimize dust generation during facility construction by watering and using dust suppression equipment. Sequence and schedule work to reduce the amount of bare soil exposed to wind erosion and potential fugitive dust production.	Before and during construction (Contractor)
Do not burn vegetation or other debris associated with construction clearing.	During construction (Contractor)
Handle and dispose of all potentially odorous waste during operation in a manner that does not generate odorous emissions.	During and after construction (Contractor)

Mitigation Measure	Implementation
Recycle or salvage non-hazardous construction and demolition debris, as well as waste generated during facility operation, where practicable.	During construction, hatchery and acclimation operations (Contractor, Nez Perce Tribe)
Use flaggers and safety signage as necessary to avoid vehicle and other conflicts.	Before and during construction (Contractor)
Use the least noise-generating equipment and methods for operations at facilities where noise might intrude into residential areas. Require sound-control devices on all construction equipment powered by gasoline or diesel engines that are at least as effective as those originally provided by the manufacturer.	Before and during construction (Contractor)
Require sound-control devices that are at least as effective as those originally provided by the manufacturer on all equipment powered by gasoline or diesel engines.	Before and during construction (Contractor)
Dispose of cleared vegetation and other debris in a manner other than burning, to avoid or minimize air quality impacts. Transport all such material to an approved composting or landfill facility, as appropriate.	During and after construction (Contractor)
Prepare and implement a Spill Prevention, Containment, and Control Plan. Include the following measures: • reduce and recycle hazardous and non-hazardous wastes, • notification procedures • specific clean-up and disposal instructions for different products • quick response containment and clean-up measures • proposed methods of disposal of spilled materials • employee training on spill containment	Before construction (Contractor)
Develop and follow the protocol for dealing with hazardous substances inadvertently discovered during project activities. Conduct all project-related activities in compliance with regulations and guidelines for use, handling, storage, and disposal of toxic and hazardous substances.	Before and during construction (Contractor)
Dispose of <u>non-hazardous</u> wastes in approved landfills. Dispose of <u>hazardous</u> wastes according to applicable federal and state laws.	During and after construction (Contractor)
Conduct all project-related activities in compliance with regulations and established guidelines for use, handling, storage, and disposal of toxic and hazardous substances.	During construction, hatchery and acclimation operations (Contractor, Nez Perce Tribe, and CRITFC)
Train staff in the proper use, transport, handling, and storage of all chemicals to minimize dangers of overexposure or accidental release to the environment.	During construction, hatchery and acclimation operations (Contractor, Nez Perce Tribe, and CRITFC)

Mitigation Measure	Implementation
Coordinate with local law enforcement, fire protection, and other emergency responders to ensure they are prepared to address any emergencies that may arise during construction.	Before and during construction (Contractor)
Prepare a Safety Plan in compliance with state requirements before starting construction; specify how to manage hazardous materials, such as fuel and any toxic materials found in work sites; include a Fire Prevention and Suppression Plan, and detail how to respond to emergency situations. Keep the Safety Plan on site during construction and maintain and update, as needed.	Before construction (Contractor)
Require the construction contractor to hold safety meetings with workers at the start of each work week to review potential safety issues and concerns.	Before and during construction (Contractor)
Cultural Resources	
Mark known cultural resource sites as avoidance areas on construction drawings and flag as no-work areas in the field prior to construction.	Before construction (BPA, Nez Perce Tribe, and Contractor)
Protect any unanticipated cultural resources discovered during construction as follows: • Stop all work; cover and protect find in place. • Notify NPTH Project Manager, BPA Archaeologist, and BPA Contracting Officer's Representative immediately. • Implement mitigation or other measures as instructed by BPA.	During construction (BPA, Nez Perce Tribe, and Contractor)
Climate Change	
Encourage the use of the proper size of equipment for each job because larger equipment requires the use of additional fuel.	Before construction (BPA, Nez Perce Tribe)
Ensure that all vehicle and construction equipment engines are maintained in good operating condition to minimize exhaust emissions.	Before and during construction (Contractor)
Minimize vehicle idling.	During construction (Contractor)
Encourage carpooling and the use of shuttle vans among workers to minimize emissions.	Before and during construction (Contractor)
Use alternative fuels, such as propane, for stationary equipment at the construction sites or use electrical power where practicable.	During construction (Contractor)