

**DECISION NOTICE AND FINDING OF NO SIGNIFICANT IMPACT:
RENEWAL OF PUGET SOUND ENERGY/CENTURYLINK
GREENWATER TO CRYSTAL MOUNTAIN
UTILITIES SPECIAL USE PERMITS**

**USDA FOREST SERVICE
MT. BAKER-SNOQUALMIE NATIONAL FOREST
SNOQUALMIE RANGER DISTRICT
PIERCE COUNTY, WASHINGTON**

DECISION

I have reviewed the April 2012 *Environmental Assessment: Renewal of Puget Sound Energy/CenturyLink Greenwater to Crystal Mountain Utilities Special Use Permits*; terrestrial, aquatic, and plant Biological Assessments (BAs) and Biological Evaluations (BEs); Archaeological Survey Report; Specialist Reports; applicable direction in the *Land and Resource Management Plan, Mt. Baker-Snoqualmie National Forest*, as amended (Forest Plan); other information available in the Project Record; and public comments regarding the proposal. Based on this information, it is my decision to implement Alternative 3, the Proposed Action. Alternative 3 is hereafter called the “Selected Alternative.” The Environmental Assessment (EA) is incorporated by reference herein.

The Selected Alternative comprises four elements:

- The Mt. Baker-Snoqualmie National Forest (MBS) will reissue a special use permit (SUP) to Puget Sound Energy (PSE) for operation and maintenance of the power line for a 50-year term, and a SUP to CenturyLink for a 20-year term.
- Nearly all overhead portions of the existing utility system will be removed and replaced with underground installations within the prisms of existing roads (SR 410, Crystal Mountain Boulevard, and various Forest System roads);
- The existing underground circuit that serves the Forest Service Boundary Creek compound will be replaced in the current location; and
- Forest Roads 7300-101, 7138, and an un-numbered non-system service road will be decommissioned and removed.

These project elements are described in detail below. Selected Alternative maps are located in Appendix A of this document. The project area has been divided into segments (Figure 2, Appendix A), and the length, location, management allocation, and activity are summarized in Table 1.

Table 1. Project segment length, location, and management allocation.

Segment	Length (miles)	Location	Management Allocation*	Activity
1	0.36	Greenwater Substation to Forest Boundary.	Not on MBS.	None.
2A	0.40	Forest boundary to SR 410, along Boundary Creek compound access road.	RR and MLA 8A5ALSR.	New underground lines.
2B	1.60	SR 410 from Boundary Creek compound access road south to Forest Road 7300.	LSR, RR, MLA 8ALSR, and MLA 8A8ELSR.	New underground lines.
3	1.42	Forest Boundary to Forest Road 7300.	RR, MLA 8A8E5ALSR, and MLA 8ALSR.	Remove existing overhead lines; decommission Forest Roads 7138 and 7300-101.
4	6.80	SR 410 from Forest Road 7300 to Forest Road 7174.	RR, MLA 8A5ALSR, and MLA 8A5BLSR.	None.
5A	3.10	Forest Roads 7174 and 7176 to Crystal Mountain Boulevard.	LSR, RR, MLA 1BLSR, MLA 8A5BLSR, MLA 8ALSR, MA 15, MLA 15LSR.	New underground lines.
5B	1.45	Crystal Mountain Boulevard from Forest Road 7176 to Crystal Mountain Generation Station.	RR, MA 2A, and MA 3C.	New underground lines.
5 Removed (cross-country segment)	0.31	Existing overhead alignment from Half Camp campground to Crystal Mountain Boulevard.	RR and MA 15.	Remove existing overhead lines.
6	1.43	Forest and riparian corridor from Crystal Mountain Boulevard to Crystal Mountain Generation Station.	RR, MA 2A, and MA 3C.	Remove existing overhead lines; decommission non-system service road.
Boundary Creek	0.05	Forest Boundary to Boundary Creek compound.	RR and MLA 8A5ALSR.	Replace existing underground lines.

*See Forest Plan Consistency below for definitions of these management allocations.

Replace Existing Utility System

The Selected Alternative will remove nearly all overhead portions of existing electricity and telecommunication utilities and replace them with an underground system. The underground system will be located within the prism of existing roads and will be developed as follows:

- A portion of the existing overhead utility system will be re-routed beginning at a point shortly after it crosses from private land to the east side of the White River (Segment 1) and enters National Forest System land (Figure 3 Appendix A). The existing system then continues south and parallel along Forest Roads 7138 and 7300-101 (Segment 3), and ends at the intersection of SR 410 and Forest Road 7300, where it currently connects to the previously buried utility system (Segment 4). As proposed, the system will be re-routed and buried within existing road prisms, starting with the Forest Service Boundary Creek compound access road north to the SR 410 junction (Segment 2A) then proceeding south within the prism of SR 410 to the intersection with Forest Road 7300 (Segment 2B), where it will connect to the existing buried Segment 4. There will be no changes to the existing overhead line in Segment 1.
- Once underground Segments 2A and 2B are constructed and energized, the Segment 3 structures (overhead lines and some supporting poles) will be removed. Most poles located on private land will be left in place and maintained by PSE to accommodate utility services to the adjacent Crystal Village Estates residences.
- A new underground system, in place of the existing overhead service, will be constructed within the existing 15-foot right-of-way along Forest Roads 7174 and 7176, between SR 410 and Crystal Mountain Boulevard (Segment 5A). Where the overhead line deviates from the Forest Road 7176 above the intersection with Crystal Mountain Boulevard, the line will be buried in the road prism and the overhead line will be removed (Figure 4 Appendix A).
- A new underground system will be constructed in the prism of Crystal Mountain Boulevard, extending from Segment 5A to the Crystal Mountain Generation Station (Segment 5B).
- Once the underground Segments 5A and 5B are constructed and energized, Segments 5A and 6 structures (overhead lines and some supporting poles) will be removed. Utility line access spur roads “Northway” and Forest Road 7190-510 to the Crystal Mountain trailhead will continue to be maintained for Forest Service and ski area administrative use and will remain open for public non-motorized recreation use.
- PSE electrical cables and CenturyLink telecommunications cables will be installed in separate conduits within the same trench in Segments 2A, 2B, 5A, and 5B.
- Gates will be installed on Forest Road 7176, and access will be limited to PSE, CenturyLink, and Forest Service personnel. Gates will be located just north of Half Camp campground and just south of the intersection with Forest Road 7175. The public will be able to use Road 7176 for non-motorized recreation activities, and public vehicular access between Silver Springs and Corral Pass Road will be maintained.
- The majority of the existing utility poles will be retained for raptor perches. Poles that will be removed include those that are: (1) at risk of falling into the White River or major creeks due to bank erosion (i.e., along Forest Roads 7138 and 7300-101); (2) in close proximity to streams (i.e., Silver Creek); or (3) along roads open to the public and/or in close proximity to developed recreation sites (i.e., the Silver Creek recreation residences).

Replace Boundary Creek Compound Circuit

As part of ongoing maintenance, PSE will replace the existing 260-foot underground electrical circuit that serves the Forest Service Boundary Creek compound. The replacement line will be placed in the same underground alignment as the existing line, beginning at Segment 2A and ending inside the compound.

Road Decommissioning

Three road segments will be decommissioned after the utility system is replaced. Collectively, these segments are approximately 1.6 miles long. The details of the decommissioning are as follows:

- Two Forest roads will be decommissioned adjacent to Segment 3 because access will no longer be necessary for future utility line maintenance (Forest Road 7138 from the north, and 7300-101 from the south). The public could continue to use these decommissioned roads as unmaintained paths to access the river.
- The decommissioning activities on Forest Road 7138 will avoid an adjacent wetland. The wetland's hydrologic function and perimeter will be maintained by installing a weir and boulders at the wetland's outlet, which is currently discharging through the road prism. A full description of site-specific avoidance and mitigation measures was prepared and is attached as Appendix B to the EA.
- An un-numbered, non-system service road located between the Crystal Mountain Generation Station and Forest Road 7190-510 will be decommissioned (approximately 0.33 mile) because access will no longer be necessary for future utility line maintenance.

OTHER ALTERNATIVES CONSIDERED

Alternative 1: No Action – Permits Renewed with No Change. Under Alternative 1, both SUPs would be renewed for a period of 20 years, with no changes in the existing utility system on National Forest System lands. No overhead components would be removed and no roads would be decommissioned. No new underground components would be installed or removed. The management requirements and mitigation measures that are included in the current SUPs would be applied and updated to meet current resource protection standards. Utility line maintenance is expected to continue for repairing any damaged or deteriorating infrastructure within the permit area, including replacement of poles and the existing underground segment that services the Forest Service Boundary Creek compound. Vegetation management within the current permit area of the existing overhead utility lines would continue with no changes (mechanical removal only of emerging hardwoods, protruding limbs, and danger trees). The Forest Service would monitor identified weed infestations within the permitted area and require PSE to treat them using Forest Service and EPA approved methods. Routine maintenance of existing roads needed to access the overhead utility lines would continue with no changes.

Alternative 2: No Action – Permits Not Renewed. Under Alternative 2, the SUPs would not be renewed, and PSE and CenturyLink would remove the utility system from National Forest System lands. This would entail the same actions described below to remove the existing overhead components and decommission those roads needed to access the utility system. Forest Road 7176 would remain open to

public vehicles in the near term, pending further analysis by MBS to evaluate closing or decommissioning it. The management requirements and mitigation measures for removing the utility system and decommissioning the roads would be the same as the ones described in the Proposed Action. Installation of new underground components would not take place, and the cable would be pulled from Segment 4 (the currently underground segment along SR 410) leaving the buried conduit in place.

For other alternatives considered but not further analyzed, refer to EA Chapter 2, pp. 25-26.

RATIONALE FOR THE DECISION

I chose Alternative 3 as the Selected Alternative, because it best meets the stated purpose and need, as outlined in Table 2.

Table 2. Effectiveness of No-Action and Proposed Action Alternatives in addressing purpose and need.			
Element	Alternative 1: No Action – Permits Renewed with No Change	Alternative 2: No Action – Permits Not Renewed	Alternative 3: Proposed Action
Maintain electrical and telecommunications services to utility subscribers between the Greenwater Substation and Crystal Mountain Generation Station.	Services would be maintained using the existing system.	Services would not be maintained using the existing utility system; alternative sources and/or routes would have to be identified and developed.	Services would be maintained using the proposed replacement system.
Increase system reliability	Service outages would remain frequent.	Utility system would be removed; reliability of any replacement system cannot be assessed at this time.	Service outages would be less frequent.

As discussed below, implementation of the Selected Alternative is consistent with the Forest Plan, the National Forest Management Act, and other pertinent laws and regulations, and no significant impacts were identified in the EA.

MITIGATION

Management requirements and mitigation measures are developed to avoid, reduce, eliminate, rectify, or compensate for the undesirable effects of project activities. Implementation of the management requirements and mitigation measures identified in the EA is a condition of my approval of the Selected Alternative. Appendix B lists these management requirements and mitigation measures, states their objectives, rates their effectiveness, identifies which Forest Plan standards and guidelines they address, and identifies the person responsible for their enforcement.

FOREST PLAN CONSISTENCY

I have reviewed the EA, including the environmental effects and Forest Plan consistency sections, for each affected resource (EA Chapter 3). I find the Selected Alternative to be consistent with the goals, objectives, standards and guidelines of the Forest Plan, as amended. The action will not alter the multiple-use goals and objectives for long-term land and resource management. Appendix C contains the Forest Plan consistency analysis for each resource affected by the Selected Alternative.

On December 17, 2009, the U.S. District Court for the Western District of Washington issued an order in *Conservation Northwest, et al. v. Sherman, et al.*, No. 08-1067-JCC (W.D. Wash.), granting Plaintiffs' motion for partial summary judgment and finding NEPA violations in the *Final Supplemental to the 2004 Supplemental Environmental Impact Statement to Remove or Modify the Survey and Manage Mitigation Measure Standards and Guidelines* (USDA and USDI, June 2007). In response, parties entered into settlement negotiations in April 2010, and the Court filed approval of the resulting Settlement Agreement on July 6, 2011. Projects that are within the range of the northern spotted owl are subject to the survey and management standards and guidelines in the 2001 ROD, as modified by the 2011 Settlement Agreement.

Protocol surveys were conducted for all special status plant, fish, and wildlife species, including survey and manage species as listed in the 2001 ROD, and none were found in the project area. Therefore, implementation of the Selected Alternative would have no impact on any survey and manage species, and is consistent with the Forest Plan as amended by the *2001 Record of Decision and Standards and Guidelines for Amendments to the Survey and Manage, Protection Buffer, and other Mitigation Measures Standards and Guidelines* (2001 ROD), as modified by the 2011 Settlement Agreement.

Tier 1 Key Watershed: The Upper White River is a Tier 1 Key Watershed, so a watershed analysis is required as part of the Aquatic Conservation Strategy (ACS). An analysis was completed and documented by the MBS (USDA Forest Service 2000). The watershed resources specialist report (Cirrus 2012a) provides additional project-specific analysis. In addition, the existing system and non-system road mileage is to be either maintained or reduced. Existing system road mileage would be decreased by about 1.6 miles under the Selected Alternative as a result of road decommissioning, which over the term of the SUPs would result in localized improvements in water quality and riparian habitat within the Key Watershed.

Riparian Reserves: Riparian Reserves are established to prohibit or regulate activities that retard or prevent attainment of ACS objectives. As described in the EA under ACS Compliance (pp. 50 – 53), ACS objectives would be maintained at the site and watershed scales under the Selected Alternative.

Late-Successional Reserves: LSR is identified as part of the agency's effort to protect and enhance late-successional and old-growth forest ecosystems and the species they support. The project area does not contain any LSR, though it passes through mapped LSR. The potential impact on northern spotted owl and marbled murrelet which could nest in the adjacent LSR would be mitigated under the Selected Alternative by not allowing work during the critical nesting period.

Matrix Management Area (MA) 1B – Semi-Primitive Non-Motorized: This MA is to provide dispersed recreation in semi-primitive settings. No timber harvest or road construction is allowed except to salvage catastrophic loss. Dispersed recreation would not be affected by the Selected Alternative, and there would be no timber harvest or road construction. Gating the middle segment of Forest Road 7176 and limiting access to PSE, CenturyLink, and Forest Service personnel would enhance non-motorized recreation.

Matrix MA 2A – Scenic Foreground: This MA is to provide a visually appealing foreground landscape as viewed from major travel corridors and use areas. The foreground as viewed from major use areas (e.g., Crystal Mountain Ski Area) would be visually appealing. No removal of forest canopy is included in the Selected Alternative. Replacing the existing overhead utility lines components with a buried system and decommissioning the un-numbered service road would improve the natural appearance of the Crystal Mountain foreground viewshed.

Matrix MA 3C – Winter Sports Resorts: This MA is to ensure that permits are not issued which would be incompatible with recreation use. Renewing these permits under the Selected Alternative would be compatible with winter recreation use at Crystal Mountain Ski Area. Electrical and telecommunication service would continue as part of the ski area infrastructure. Replacing the existing overhead line components with a buried system would increase service reliability and thus enhance winter sports. Decommissioning the un-numbered service road would not affect Forest Road 7190-510, and access to “Northway” and the Crystal Mountain trailhead would continue to be maintained for Forest Service, ski area administrative, and public non-motorized recreation use.

Matrix MA 5A and 5B – Proposed Wild and Scenic River Special Use Management: These MAs are to protect the outstandingly remarkable values and wild, scenic, and recreational characteristics of rivers and their environment from degradation. No established or recommended wild, scenic, or recreation river segments are located in or immediately downstream of the SUP. As a result, the Selected Alternative would have no direct or indirect effects on these resources. Burying Segment 2A in the Boundary Creek compound access road will also have no effect on the recommended recreation river, and removing overhead Segment 3 and burying the system along S.R. 410 will enhance the scenic value of the White River.

Matrix MA 8A – Mather Memorial Parkway Special Use Management: This MA, as it pertains to this project, is to ensure that transmission towers are designed to blend with the surrounding landscape. Since no new transmission towers would be installed under the Selected Alternative, the project would comply with this MA. The buried utility system would blend in with the surrounding landscape.

Matrix MA 8E – Greenwater Special Area: Two goals of this MA, as it pertains to this project, are to ensure that there is no loss of deer and elk foraging habitat within created openings, and to manage non-openings under the LSR standards and guidelines. The SUP area does not include any openings that were created for deer and elk foraging habitat and the Selected Alternative would not affect any such openings. Furthermore, the project is located within previously disturbed corridors and roads and would not alter the stand characteristics of any adjacent LSR (see LSR discussion in this section and in Wildlife section).

Matrix MA 15 – Mountain Goat Habitat: This management area is to provide habitat, including winter range, for a viable population of mountain goats. No new roads accessing winter range are to be constructed in mountain goat habitat. The Selected Alternative would not directly alter any mountain goat habitat. Replacing the existing overhead utility lines with a buried system would reduce the need to perform emergency maintenance and would reduce potential disturbances in mountain goat winter range.

ISSUES ADDRESSED

There is no set of standard issues applicable to every proposal, so it is important for the responsible official to consider a variety of laws, regulations, executive orders and input, with the help of the interdisciplinary team (FSM 1950.41). I reviewed and approved the issues analyzed in depth by the interdisciplinary team in the environmental analysis. They are as follows:

Watershed Resources

Environmental Effect 1: The surface disturbance associated with the Proposed Action could result in sediment transport and delivery, and turbidity in down-gradient streams during placement of new underground components at channel crossings and other areas near stream channels.

Environmental Effect 2: Decommissioning of Forest Road 7138 may disturb an adjacent wetland.

Vegetation

Environmental Effect 1: The Proposed Action may impact special-status plants through direct, physical disturbance or alteration of habitat.

Environmental Effect 2: The Proposed Action may increase the presence or extent of noxious weed populations in the project area through clearing and grading.

Fisheries

Environmental Effect: The proposed projects may reduce the quality and function of fish habitat and thus fish presence and abundance.

Wildlife

Environmental Effect: The proposed projects may impact the abundance, distribution, structure, and function of habitat for wildlife species, including special-status species. The impacts of construction noise and human activity may also affect wildlife use of project-area habitats.

Heritage Resources

Environmental Effect: Potential for damage to heritage resources, Native American traditional cultural places (TCPs), or treaty rights due to construction, maintenance, and operation.

Recreation Resources

Environmental Effect: The proposed road decommissioning and closures could reduce opportunities for motorized and other forms of recreation in the project area.

As discussed below (see Finding of No Significant Impact), the analysis documented in the EA indicated that none of these effects will be significant.

PUBLIC INVOLVEMENT

The MBS issued a scoping notice describing the Proposed Action and soliciting comments regarding the issues and concerns to be considered in the NEPA review. A formal notification letter of the scoping process was mailed on April 14, 2010, to 208 agencies, organizations, and individuals, and was posted on the MBS website. During the scoping period, comment letters were received from three organizations and five individuals. These letters included comments associated with the NEPA process and various natural resources. An analysis of scoping comments to determine how they were addressed in this NEPA process was prepared and is included in the Project Record. These comments were considered, as appropriate, in preparation of the EA.

The EA was made available on the MBS webpage on April 16, 2012. On April 17, 2012, a legal notice of the availability of the EA was published in the Everett *Herald* newspaper, initiating the 30-day pre-decisional comment period. No comments on the proposed action or pre-decisional EA were received.

TRIBAL CONSULTATION

The Forest Plan, p. 4-97, directs that the MBS “present information about planned project activities in all management areas (i.e., protected and otherwise) to religious and political leaders of Tribal groups whose traditional practices might be affected.”

Copies of the pre-decisional EA were mailed to the Yakima, Puyallup, and Muckleshoot tribes and to those who participated in the scoping process. Through government-to-government consultation during the scoping period and issuance of the pre-decisional EA, the Forest Service has provided the Yakima Tribal Council, Puyallup Tribal Council, and Muckleshoot Indian Tribal Council the opportunity for involvement in the NEPA process. No responses were received from any of these Tribes.

FINDING OF NO SIGNIFICANT IMPACT (FONSI)

I have evaluated the effects of the project relative to the definition of significance established by the Council on Environmental Quality (CEQ) Regulations in 40 CFR 1508.27. I have reviewed and considered the EA and documentation included in the Project Record, and I have determined that the Selected Alternative will not have a significant effect on the human environment. As a result, no environmental impact statement will be prepared. My rationale for this finding is as follows, organized by subsection of the CEQ definition of significance cited above.

1. *Impacts that may be both beneficial and adverse. A significant effect may exist even if the federal agency believes that on balance the effect will be beneficial [40 CFR 1508.27(b) (1)].*

In terms of beneficial effects, the Selected Alternative most effectively addresses the stated purpose and need for the project (see Rationale for the Decision and Table 2) and will achieve the anticipated benefits. I assessed the anticipated adverse environmental effects of the Selected Alternative, as detailed in EA Chapter 3, in terms of context and intensity, and I found them to be localized, minor, and in most cases temporary.

2. *The degree to which the proposed action affects public health or safety [40 CFR 1508.27(b) (2)].*

Since electronic communications, including the local, emergency 9-1-1 system is carried through the CenturyLink fiber optic line, increased system reliability will improve public safety for Crystal Mountain Ski Area, Alta Crystal Resort, and other commercial and residential customers. The increased reliability of the electrical system will also improve public health and safety. The existing overhead system will remain active until the new underground system is constructed and energized so that there is no lapse in the 9-1-1 connection. Public safety will be protected by maintaining adequate notification (i.e., construction cones, signs, etc.) and separation buffers between active construction sites and the public. Safe driving conditions will be maintained on SR 410 and Crystal Mountain Boulevard. When safe driving conditions cannot be maintained on Forest Roads 7174 and 7176, those roads will be closed to the public and alternative, safe access will be provided on Forest Road 7175 and Crystal Mountain Boulevard.

3. *Unique characteristics of the geographic area such as the proximity to historical or cultural resources, parklands, prime farmlands, wetlands, wild and scenic rivers or ecologically critical areas [40 CFR 1508.27(b) (3)].*

The EA addressed potential impacts on historic and cultural resources (Heritage Resources, pp. 44-45), the change in motorized access following road decommissioning (Recreation, pp. 45-46), and wetlands (Watershed Resources, pp. 27-30). No notable impacts on these resources associated with implementation of the Selected Alternative were identified. The hydrologic function and perimeter of an existing wetland adjacent to Road 7138 will be maintained. There are no prime farmlands, wild and scenic rivers, or ecologically critical areas in the project area.

4. *The degree to which the effects on the quality of the human environment are likely to be highly controversial [40 CFR 1508.27(b) (4)].*

Public involvement in this process, including scoping and formal comment on the pre-decisional EA, are described above. Based on my review of this input, I do not think any of the potential environmental effects identified in the EA are likely to prove highly controversial.

5. *The degree to which the possible effects on the human environment are highly uncertain or involve unique or unknown risks [40 CFR 1508.27(b) (5)].*

My review of EA Chapter 3 and supporting documentation indicates that the possible environmental effects of implementing the Selected Alternative are typical of utility relocation projects. They are well understood and predictable with a relatively high level of reliability, and they involve no unique or unknown risks. While any action carries some degree of risk, the Selected Alternative includes construction and best management practices, as well as management requirements and mitigation measures, that are designed to minimize risks. In addition, the MBS implementation procedures for road decommissioning will ensure that the effects will be similar to those predicted in the EA (EA Chapter 3).

6. *The degree to which the action may establish precedent for future actions with significant effects or represents a decision in principle about a future consideration [40 CFR 1508.27(b) (6)].*

My review of the EA and supporting documentation indicates that implementation of the Selected Alternative will establish no precedent for future actions with significant effects or represent a decision in principle about a future consideration.

7. *Whether the action is related to other actions with individually insignificant but cumulatively significant impacts. Significance exists if it is reasonable to anticipate a cumulatively significant impact on the environment. Significance cannot be avoided by terming an action temporary or by breaking it down into small component parts [40 CFR 1508.27(b) (7)].*

Cumulative impacts are discussed in each resource-specific section of EA Chapter 3. No significant cumulative effects associated with implementation of the Selected Alternative are identified for any resource.

8. *The degree to which the action may adversely affect districts, sites, highways, structures, or objects listed in or eligible for listing in the National Register of Historic Places or may cause loss or destruction of significant scientific, cultural, or historical resources [40 CFR 1508.27(b)(8)].*

According to the EA (Heritage Resources, pp. 44-45), the one heritage resource identified in the SUP area has been found ineligible for the National Register of Historic Places (NRHP) and would be avoided during project activities. Ten traditional cultural heritage resources (TCHRs) were identified in and near the project area, but there would be no direct impact or adverse indirect impact on NRHP-eligible or potentially eligible TCHRs (Traditional Cultural Properties, TCPs) or sacred sites due to removal of the existing overhead system or decommissioning of access roads. The Selected Alternative would not alter the integrity of, or tribal access to, these areas.

As discussed in the EA, the 0.25-mile section of Forest Road 7176 immediately north of Crystal Mountain Boulevard was not previously surveyed. All but approximately the first 500-feet north of Crystal Mountain Boulevard are on steep slopes and have limited potential for cultural resources. After applying the *Mt. Baker-Snoqualmie National Forest Inventory Strategy* (Hearne and Hollenbeck 1997) to this undertaking, the Forest Heritage Preservation Specialist determined that the limited potential area does not require a survey. However, PSE will be required to ensure that a professional archeologist is on site to monitor excavation of the trench for the first 500 feet of this segment of power line or, if scheduling allows, to pre-inspect this segment prior to construction.

Management requirements and mitigation measures listed in Appendix B will protect any heritage resources discovered during implementation, which will involve Tribes with interests and treaty rights in the area so that their concerns are not overlooked.

Review by the Forest Archaeologist has confirmed that the analysis documented in the EA is consistent with the current memorandum of understanding between the Washington State Historic Preservation Office and the MBS.

9. *The degree to which the action may adversely affect an endangered or threatened species or its habitat that has been determined to be critical under the Endangered Species Act of 1973 [40 CFR 1508.27(b) (9)].*

In regard to plant species, the EA (p. 32) concludes that the Selected Alternative will have “no effect” on federally listed species, as no federally listed plant species are known to occur on the MBS, and none were identified in the project area during past surveys. With implementation of mitigation management requirements and measures identified in Appendix B of this document, the Selected Alternative will have no impact on rare plants or sensitive habitats within the Project area. For wildlife species, the EA (p. 43) states the Selected Alternative will have “no effect” on federally listed species and that there is no habitat for these species within the project area. In terms of fish, the EA (pp. 35-38) reports a “may effect, not likely to adversely affect” determination for steelhead, Chinook salmon and bull trout, for Chinook salmon and bull trout designated critical habitat, and for Chinook salmon essential fish habitat

Based on the “no effect” determinations for plant, wildlife, and most fish species, no consultation under Section 7 of the Endangered Species Act is required. In regard to the Chinook salmon and bull trout, the MBS prepared a biological assessment in 2003 and completed informal consultation based on the “may effect, but is not likely to adversely affect” determination. This determination was confirmed by the Level 1 team March 8, 2012, without additional mitigation requirements.

10. Whether the action threatens a violation of federal, state, or local law or requirements imposed for the protection of the environment [40 CFR 1508.27(b) (10)].

Based on my review of the EA and supporting specialist reports, implementation of the Selected Alternative will be consistent with all federal, State, and local laws imposed for the protection of the environment.

NATIONAL FOREST MANAGEMENT ACT CONSISTENCY

The National Forest Management Act (NFMA) and its regulations (36 CFR 219) established guidelines for National Forest management. As required by NFMA regulations, I find that this project will be consistent with the Forest Plan. The Forest Plan Consistency section of this document and EA Chapter 3 contain the Forest Plan consistency analysis. Compliance with Forest Plan standards and guidelines specific to watershed resources, vegetation, fisheries, wildlife, and heritage resources is discussed below in Appendix C.

In regard to the use of the best available science, I find that the EA and material in the Project Record document a thorough review of relevant scientific information, a consideration of responsible opposing views, and the acknowledgement of incomplete or unavailable information, scientific uncertainty, and risk.

FINDINGS REQUIRED BY OTHER LAWS AND REGULATIONS

I have reviewed each resource-specific section EA Chapter 3 as well as the Other Required Disclosure section, and I have determined that each addresses compliance with all applicable laws and regulations, and potential conflicts with plans or policies of other jurisdictions.

ADMINISTRATIVE APPEAL

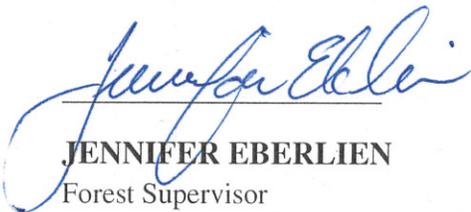
This decision is not subject to administrative appeal under the regulations at 36 CFR Part 215. The reason for this is that no substantive comments were received during the comment period for the proposed action and pre-decisional EA. Therefore, consistent with 36 CFR 215.12 (e)(1), this project decision is not appealable, and there is no 45-day appeal period.

PROJECT IMPLEMENTATION

Because this project decision is not appealable and there is no 45-day appeal period (see Administrative Appeal above), the project may be implemented immediately upon publication of the legal notice in the Everett *Herald*, as provided by 36 CFR 215.9 (c)(1). Implementation is expected to begin in summer 2013.

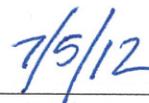
CONTACTS

For further information, contact Jennifer Eberlien, Forest Supervisor at the Forest Supervisor's Office, 2930 Wetmore Avenue, Suite 3A, Everett, WA 98201, (425) 783-6010; or Eric Ozog, ID Team Leader at the Verlot Public Service Center, 33515 Mountain Loop Highway, Granite Falls, WA 98252, (360) 691-4396.

**JENNIFER EBERLIEN**

Forest Supervisor

Mt. Baker-Snoqualmie National Forest

**Date**

APPENDIX A – SELECTED ALTERNATIVE MAPS

FIGURE 1. PROJECT AREA VICINITY MAP

FIGURE 2. UTILITY SYSTEM CORRIDOR

FIGURE 3. WHITE RIVER REROUTE DETAIL

**FIGURE 4. FOREST ROAD 7174, 7176 AND CRYSTAL MOUNTAIN BOULEVARD
DETAIL**

FIGURE 5. UTILITY SYSTEM CORRIDOR AND MERGED LAND ALLOCATIONS

FIGURE 6. UTILITY SYSTEM CORRIDOR AND RIPARIAN RESERVES



Figure 1. Project area vicinity map.

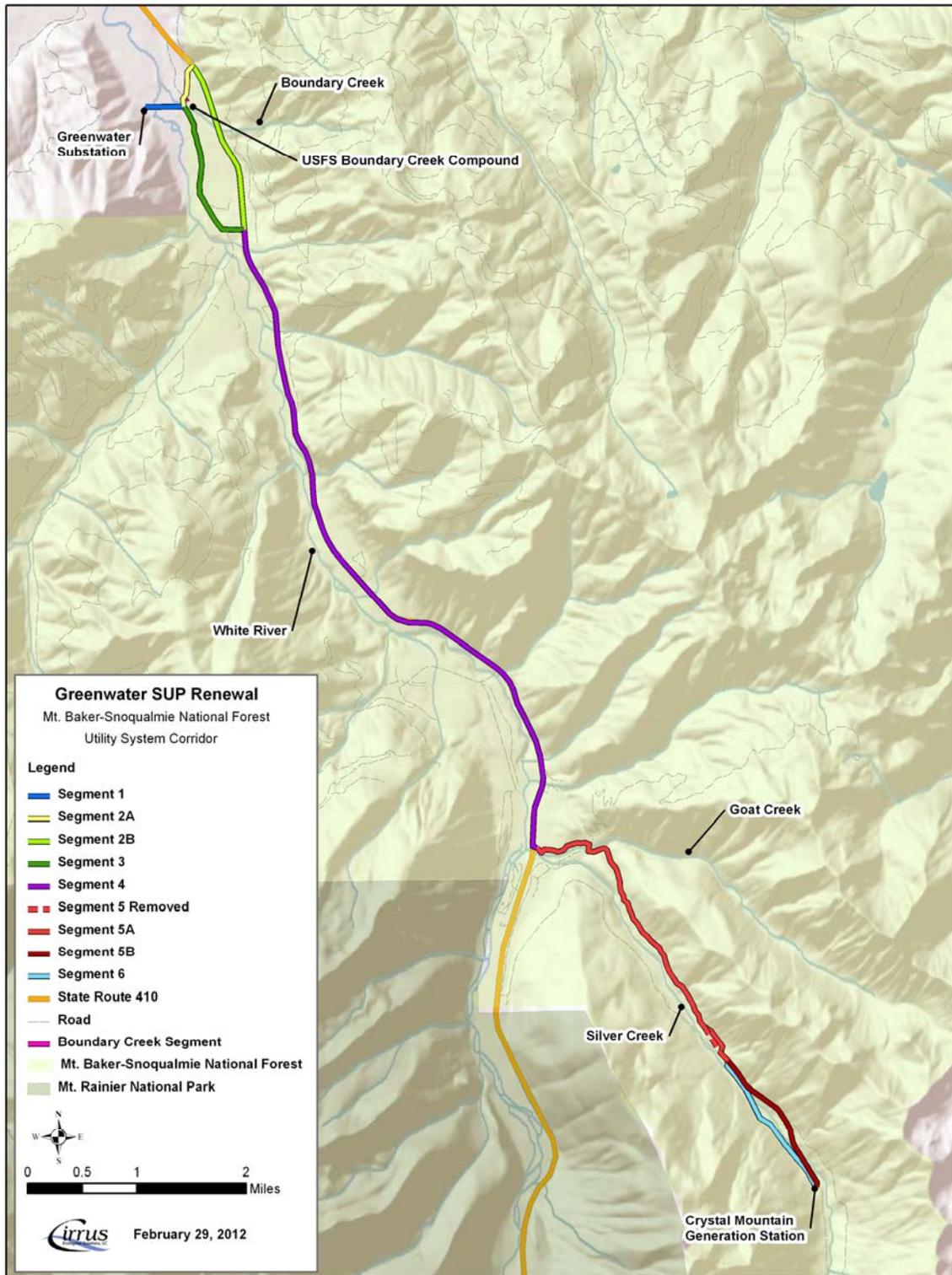


Figure 2. Utility system corridor.

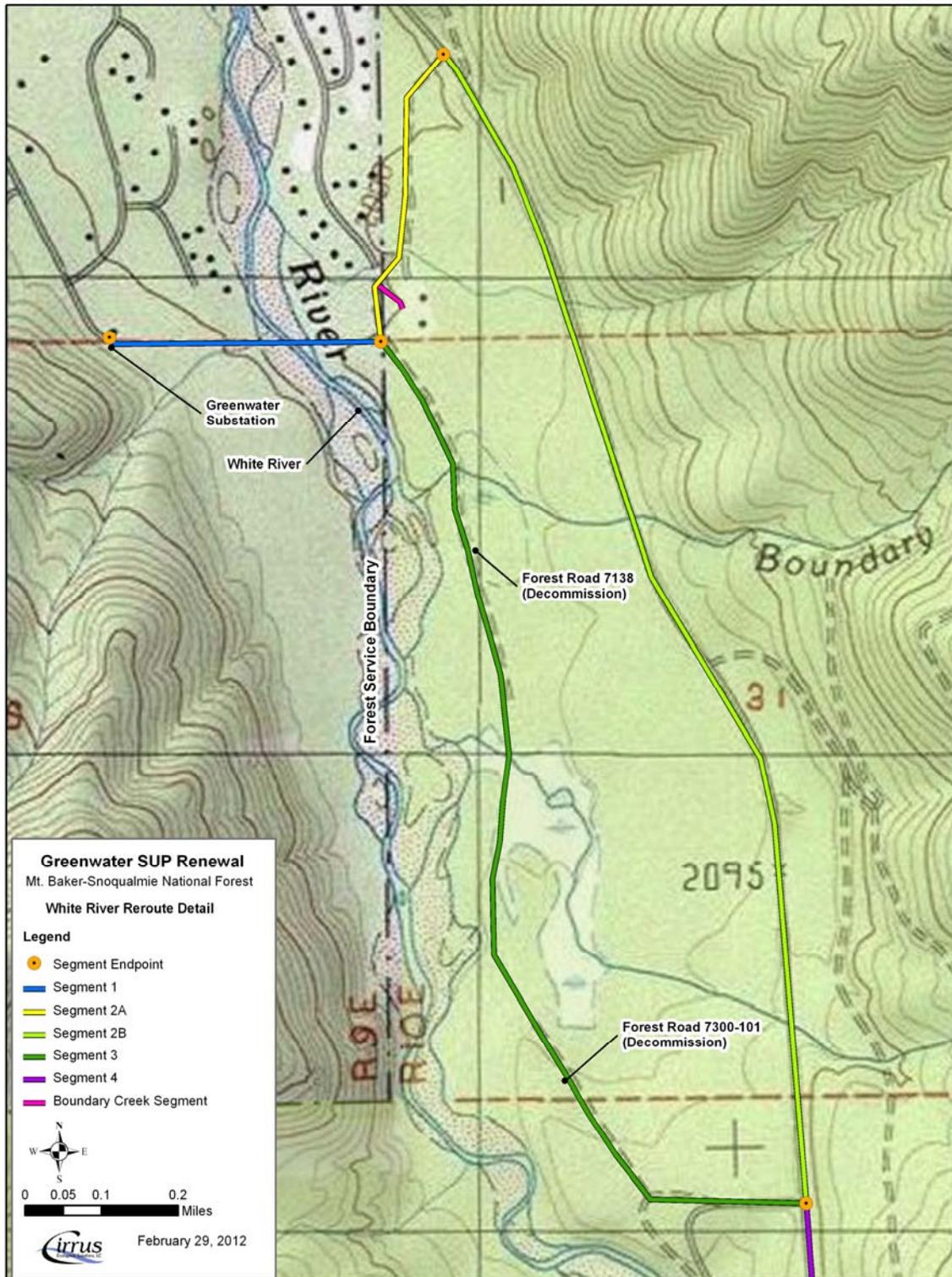


Figure 3. White River reroute detail.

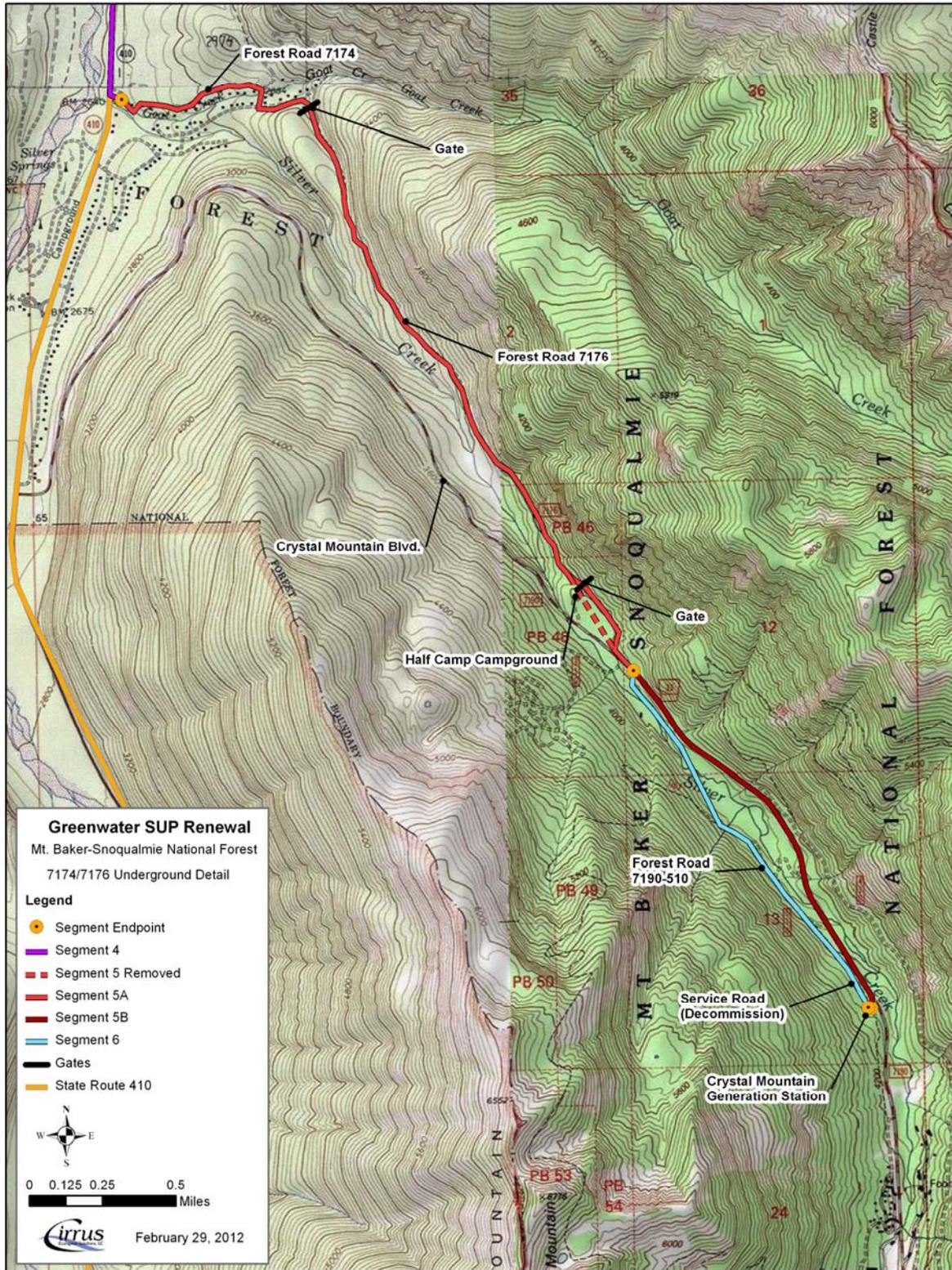


Figure 4. Forest Road 7174, 7176, and Crystal Mountain Boulevard detail.

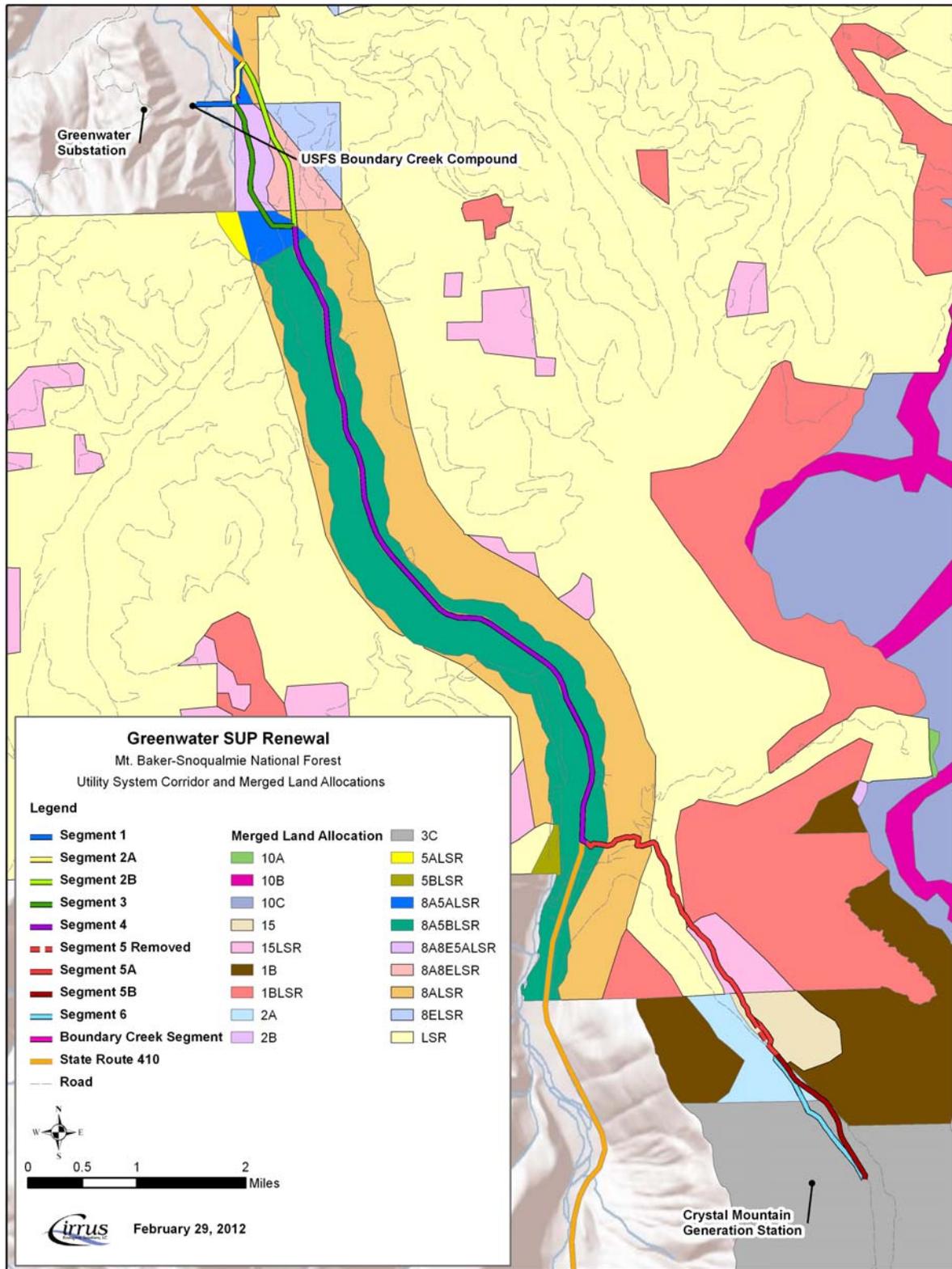


Figure 5. Utility system corridor and Merged Land Allocations.

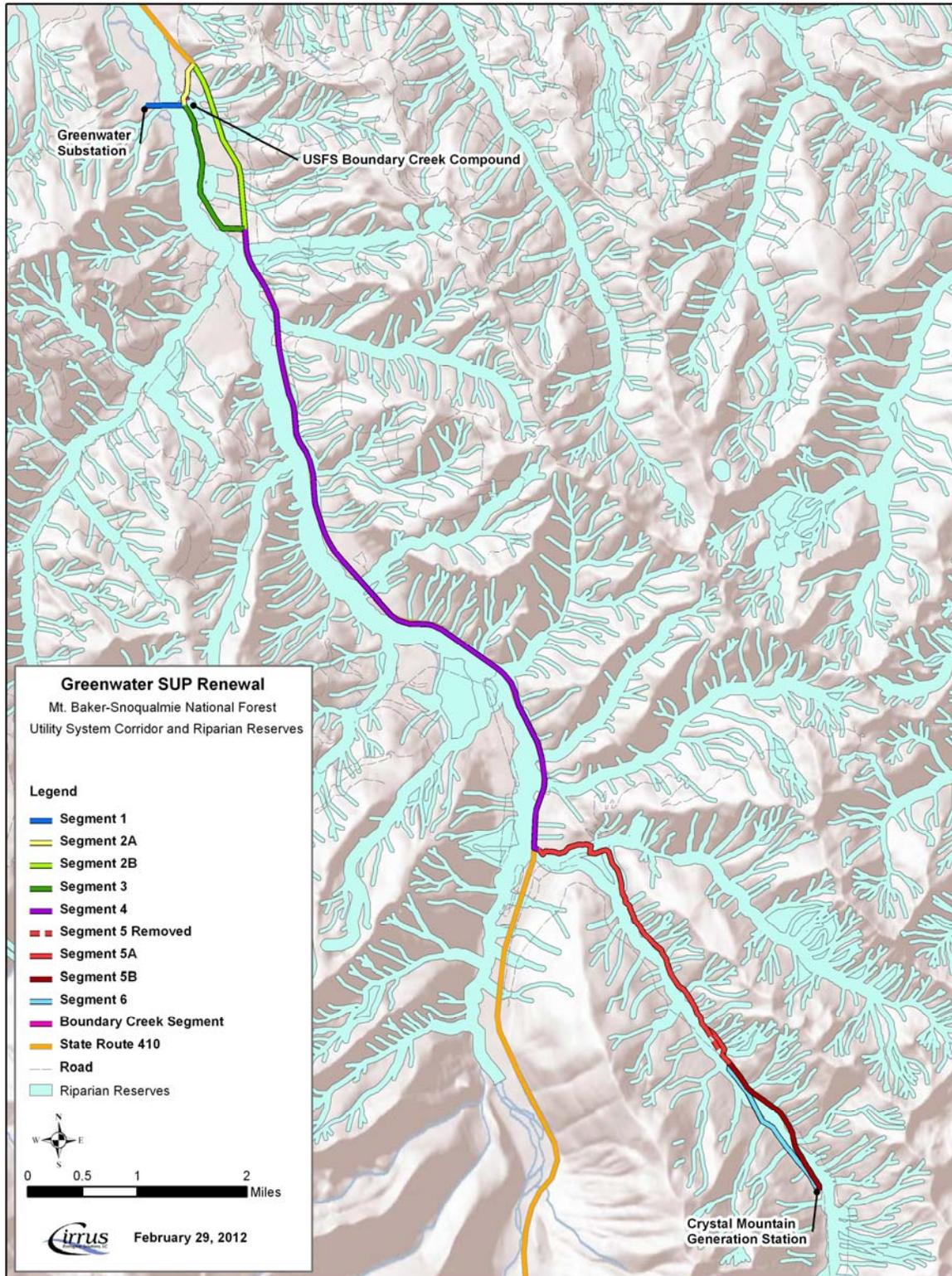


Figure 6. Utility system corridor and Riparian Reserves.

**APPENDIX B – RENEWAL OF PUGET SOUND
ENERGY/CENTURYLINK GREENWATER TO CRYSTAL MOUNTAIN
UTILITIES SPECIAL USE PERMITS MANAGEMENT REQUIREMENTS
AND MITIGATION MEASURES**

Management requirements and mitigation measures required under this decision.				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
Watershed Resources				
WS1 – Obtain Washington Department of Fish and Wildlife Hydraulic Project Approval (HPA) permit for all in-channel work activities. Comply with all requirements of the permit and maintain a copy on-site during implementation.	Maintenance of watershed and channel health per WDFW standards.	Moderate (State Law, MBS Experience)	WDFW (2005)	WDFW, Special Use Permit administrator.
WS2 – Comply with all requirements of and maintain a copy onsite of the U.S. Army Corps of Engineers (COE) Regional General Permit (RGP) 8 for Clean Water Act (CWA) 404 permitting July 19, 2011, agreement between the COE and Forest Service regarding aquatic restoration activities on National Forest System (NFS) lands within the State of Washington during implementation activities.	Maintenance of COE regulated Waters of the US as per COE standards.	Moderate (Federal Law, MBS Experience)	WDFW (2005) COE (2011)	COE, Special Use Permit administrator.
WS3 – All disturbed soil will be seeded with the Forest Service-approved non-invasive grass seed mix and covered with certified weed free straw or mulch after ground-disturbing work has been completed and prior to the onset of the wet season.	Protect stream channel from water quantity and quality impacts.	Moderate (MBS Experience)	COE (2011)	Special Use Permit administrator.
WS4 – All fill material and man-made structures shall be removed from stream channels. Approach fill shall be removed to match upstream and downstream channel dimensions, channel roughness, bank shape, natural floodplain contours and natural adjacent hill slope.	Restore ecohydraulic function of channel, valley bottom and riparian areas.	Moderate to High (Standard BMP, MBS Experience)	ACS, (1990 Forest Plan, p. 4-126, 119), COE (2011), WDFW (2005), NMFS (2007), FWS (2007)	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
WS5 – Evaluate channel incision/headcut risk and construct in-channel grade control structures of rock and wood when necessary. Place rocks and woody material to mimic adjacent channel in a manner to ensure channel and bank stability. Promote fish passage for all life stages present in the area.	Restore hydraulic function of channel, valley bottom and riparian areas.	High. (Standard BMP, MBS Experience.)	WDFW (2005), COE (2011), NMFS (2007), FWS (2007)	Special Use Permit administrator.
WS6 – Dispose of fill waste material generated from implementation at a stable location out of the flood prone area. Ensure that the waste material is disposed of in a location that will not result in erosion and sedimentation or cause roadway runoff drainage problems.	Prevent and minimize potential effects on water quality.	Moderate (Standard BMP, ESA Section 7 Consultation, MBS Experience)	WDFW (2005), COE (2011), NMFS (2007), FWS (2007)	Special Use Permit administrator.
WS7 – Fueling of machinery shall occur out of the Riparian Reserve area and/or as approved by Contracting Officer's Representative (COR).	Prevent and minimize potential effects on water quality.	Moderate (Standard for Construction)	WDFW (2005),	Special Use Permit administrator.
WS8 – Pumps and generators shall be kept and operated on a sorbent pad or petroleum containment basin with 150% of the fuel capacity.	Prevent and minimize potential effects on water quality.	High (Standard BMP, MBS Experience)	ACS, (1990 Forest Plan, p. 4-126), COE (2011)	Special Use Permit administrator.
WS9 – Heavy machinery and project service vehicles shall be free of leaks. Check heavy machinery for leaks prior to commencement of daily work. Repairs will be conducted before commencement or continuation of work.	Prevent and minimize potential effects on water quality.	High (Standard BMP, MBS Experience)	FP-03, ACS, (1990 Forest Plan, p. 4-126), COE (2011)	Special Use Permit administrator.
WS10 – Repairs to machinery or service vehicles shall be conducted at a location outside of Riparian Reserve areas and/or as approved by COR.	Prevent and minimize potential effects on water quality.	Moderate (Standard BMP, MBS Experience)	FP-03, ACS, (1990 Forest Plan, p. 4-126), COE (2011)	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
WS11 – Thoroughly clean heavy equipment (tracks, wheels, frame, undercarriage, bucket, etc.) and service vehicles offsite prior to commencement of work. Service vehicles leaving the local area (MBS and adjacent municipal areas) and used off of paved municipal roads shall be thoroughly cleaned before returning to work site. Equipment shall be inspected by COR prior to commencement of work to ensure machinery is clean and free of dirt and debris.	Minimize weed seed spread and potential effects of invasive plant species to Riparian Reserves.	High (Ferguson 2003, Standard BMP for Construction, MBS Experience)	FP-03, ACS, (1990 Forest Plan, p. 4-126), COE (2011)	Special Use Permit administrator.
WS12 – Waste water from construction activities shall be disposed of or routed away from the stream channel to allow the removal of fine sediments and other contaminants prior to infiltration back into a surface waterbody.	Prevent and minimize potential effects on water quality.	High (Consultation with WDOW, MBS Experience)	WDFW (2005), COE (2011)	Special Use Permit administrator.
WS13 – Power poles proposed for abandonment and located in the Riparian Reserves shall be assessed for potential capture by river migration. Poles with potential to be undermined shall be removed from the site and disposed of in an appropriate location outside of the Riparian Reserves.	Prevent and minimize potential effects on water quality.	Moderate (MBS Experience)	BMP	Special Use Permit administrator.
WS14 – Trash, power poles, and removed culverts shall be removed from the site and disposed of at an appropriate disposal area off NFS land.	Keep forest clean and free of trash.	High (MBS Experience)	BMP	Special Use Permit administrator.
WS15 – When the use of culverts cannot be avoided, they will be designed to accommodate 100-year flows, debris, and fish passage (if applicable). Hydraulic permits will be obtained for all activities in stream channels.	Provide stable stream crossings that will accommodate design flood events (per Forest Service standards), prevent flow obstruction, provide for fish	Moderate (MBS Experience)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 5 and 8.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
	passage, and prevent aquatic habitat degradation.			
WS16 – Unavoidable stream crossings will be oriented perpendicular to the stream channel. If construction equipment must cross a channel, it will be limited to a one-time crossing; crossing will occur in an area that minimizes disturbance of the stream bed and banks. If necessary, a temporary platform or bridge will be created to cross the channel. The Forest Service will approve all stream crossing locations and proposed methods of crossing prior to construction.	Protect bed and bank stability of permanent stream crossings. Minimize construction impacts resulting from use of heavy equipment in and around stream channels. Ensure that proposed stream crossing methods and locations meet agency standards.	High (MBS experience)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 5 and 8; Soil Resources, S&Gs no.3.	Special Use Permit administrator.
WS17 – All Management Requirements/Constraints and Mitigation Measures listed in the HPA from WDFW will be implemented for each aspect of the project involving an HPA.	Maintainance of watershed health per WDFW standards.	Moderate (Standard BMP, MBS experience)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 2 and 3.	Special Use Permit administrator.
WS18 – Stream crossings will be monitored at intervals following construction to verify that erosion is not initiated.	Ensure that designed stream crossing structures are continuing to function properly. Identify malfunctions or maintenance problems in stream crossing structures.	High (Logic and professional experience)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 2, 3, 4, 5, 10, 11, and 12; Soil Resources, S&Gs no. 5.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
WS19 – No new or temporary roads will be constructed. Existing/proposed roads will be used to convey construction equipment and materials to individual project sites.	Minimize construction-related impacts.	Moderate (MBS roads experience)	Forest Plan, Water Resources and Riparian Areas, S&Gs, nos. 5, 8; Soil Resources, S&Gs no. 3.	Special Use Permit administrator.
WS20 – For each project, a Spill Prevention and Response Plan will be developed as part of the construction documents. Maintain a spill remediation kit onsite for any temporary fuel stored on forest lands in association with this project. Petroleum products will not be discharged into drainages or bodies of water. No fuels will be stored within Riparian Reserves. All petroleum products will be secured in self-contained safety cans in locked a storage cabinet or vehicles.	Prevent contamination of soil and water resources.	Moderate (WSDOT 2011 <i>Highway Runoff Manual</i>)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 2, 3, and 6.	Special Use Permit administrator.
WS21 – Existing and future sources of coarse organic debris will be preserved whenever possible to enhance organic matter, nutrients, and surface roughness in soils. Where possible, felled trees or snags located outside of Riparian Reserves not sold or otherwise used in restoration projects will be left near their origin to maintain long-term sources of organic matter, consistent with other mitigation measures.	Maintain soil productivity and potential for successful revegetation. Maintain functional levels of large woody debris (LWD) and organic matter.	High (Brown 1985)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 5, 7; Soil Resources, S&Gs nos. 1, 4, and 5.	Special Use Permit administrator.
WS22 – Where existing or approved roads do not provide access, power pole footings will be excavated by hand or with a spider hoe.	Minimize construction related impacts on headwater areas or locations where minimal topsoil exists and revegetation is difficult.	Moderate (MBS Experience)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 2, 3; Soil Resources, S&Gs nos. 3 and 5.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
WS23 – All new pole locations will be placed outside of Riparian Reserves, or as far from stream channels and floodplains as possible.	Maintain stability of stream channel beds and banks. Minimize impacts on perennial channels and supported aquatic habitat.	High (MBS Experience)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 2, 3, 5, 8, and 14; Soil Resources, S&Gs nos. 3 and 5.	Special Use Permit administrator.
Riparian Reserves				
R1 – All shrub and tree plantings in Riparian Reserves will only utilize native species. In areas having developed cover, non-native herbs (such as grass) may be planted. Stock sources, planting methods, and fertilization or pest control treatments will be approved by a Forest Service botanist.	Prevent introduction and spread of weeds; maintain and restore habitat.	Moderate (Forest Service 2005)	Forest Plan, Vegetation Management, S&G no.2; ROD for preventing and managing invasive plants in the Pacific NW, S &G, nos. 12, 13 (Forest Service 2005)	Special Use Permit administrator; District Botanist.
R2 – Any trees greater than 12 inches dbh to be felled within reach of a stream shall be considered for felling toward the stream and left in place or utilized to armor disturbed stream banks if feasible. If a Forest Service aquatic specialist determines the trees are not needed to meet current or future instream large woody debris objectives, they may be removed for use in instream aquatic improvement projects or other administrative uses, left on-site to improve terrestrial large woody habitat, or sold, after interdisciplinary review.	Retain felled trees as large-woody debris to provide habitat within the stream. Protect stream bank integrity and aquatic resources.	High (MBS roads experience)	Forest Plan, Water Resources and Riparian Areas, S&G no. 2; Northwest Forest Plan, RF-2; RA-2.	Special Use Permit administrator.
R3 – LWD may not be removed from Riparian Reserves or stream channels. If trees need to be cut for safety reasons, they will be left in the Riparian Reserve or IDT discussion prior to disposition. Existing large woody material in	Provide stable channel bed and banks that will accommodate design flood events (per Forest Service	High (MBS Experience, Cederholm et al. 1997, Fausch and Northcote	Forest Plan Water Resources and Riparian Areas, S&Gs nos. 5, 7, 8, and 9.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
stream channels shall be left in place if feasible or replaced in the stream channel at the conclusion of the project, and large woody material removed from a culvert inlet shall be put back into the stream channel downstream of the culvert, unless doing so will cause degradation of habitat or put a drainage structure at risk.	standards), prevent flow obstruction, provide for fish passage, and prevent aquatic habitat degradation.	1992)		
R4 – Activities located within Riparian Reserves will be confined to the road prism or defined project boundary. If lack of compliance is found, work may be stopped and additional mitigation may be required at USFS discretion.	Minimize impacts on Riparian Reserves and meet Aquatic Conservation Strategy (ACS).	Moderate (Implementation of Storm Water Pollution Prevention Plan [SWPPP] is an industry standard)	Northwest Forest Plan, RM, S&Gs no.1 (p. C-34); MBS Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 7 and 8.	Special Use Permit administrator.
R5 – Effort will be made to salvage plant material and topsoil displaced during implementation for use in revegetation of Riparian Reserves.	Facilitate revegetation of disturbed sites and protect water quality.	Moderate (Burroughs and King 1989, Luce 1997; topsoil stockpiling is common industry practice)	Northwest Forest Plan, RM, S&Gs no.1 (p. C-34); MBS Forest Plan, Soil Resources, S&Gs nos. 1, 2, 4 and 5; Water Resources and Riparian Areas, S&Gs no. 3, 5, 7, and 10.)	Special Use Permit administrator.
R6 – If grading, excavation, or soil movement is to be performed within a jurisdictional stream or wetland that is not covered by the RGP-8, a Section 404 permit will be obtained from the COE Forest Service representative may be onsite to ensure that all applicable BMPs are followed. A field meeting with the construction manager and USFS will occur before construction to select required BMPs and discuss any additional methods to minimize impacts. As proposed,	Prevent silt-laden water from entering streams; reduce degradation of nearby terrestrial vegetation from surface erosion. Prevent impacts on wetlands.	Moderate (MBS experience, 404 permitting is required by the law for activities affecting Waters of the US)	Northwest Forest Plan, RM, S&Gs no.1 (p. C-34); MBS Forest Plan, Soil Resources, S&Gs, nos. 1, 2, and 4. Water Resources and Riparian Areas, S&G nos. 2, 5.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
construction would be in accordance with RGP-8, and a Section 404 permit would not be required.				
R7 – Revegetation of disturbed areas of Riparian Reserves will emphasize the objectives of filtration of eroded soil material, stream bank stability and wildlife habitat. Appropriate native species will be used for revegetation as approved by the USFS.	Minimize impacts on bed and bank stability and water quality of perennial channels and supported wildlife and aquatic habitat.	Moderate (Burroughs and King 1989, Luce 1997)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 5, 7, and 10; Soil Resources, S&Gs nos. 1, 2, and 4.	Special Use Permit administrator.
Sediment and Erosion Control				
SE1 – Minimize erosion and sediment delivery to streams and wetlands. During implementation, reduce sedimentation by use of erosion control methods and BMPs such as silt or filter fabric, silt or filter fencing, straw bales, temporary settling ponds, and rain cover.	Protect and minimize stream channel impacts.	Moderate (Standard BMP, Brown 1969)	ACS, (1990 Forest Plan, p. 4-126), COE (2011), WDFW (2005), NMFS (2007), FWS (2007)	Special Use Permit administrator.
SE2 – Roadbeds of decommissioned roads with prescribed ground based treatments will be ripped to a depth of 14 inches. To prevent re-compaction of the treated roadbeds, no equipment will be operated on ripped portions of roads after ripping has been completed.	Restore ecohydraulic function of soils and soil productivity.	Moderate to High (Standard BMP, MBS Experience)	USDA (2011)	Special Use Permit administrator.
SE3 – Design road drainage features to hydrologically disconnect road surface runoff from stream channels and wetland areas. Cross-drains or water bars will be installed at a maximum spacing of 400 feet or more frequently where road grade exceeds 2 percent.	Protect stream channel from water quantity and quality impacts.	Moderate to High (Standard BMP, MBS Experience, Copstead et al. 1998)	COE (2011), NMFS (2007), FWS (2007)	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
SE4 – Work during dry field conditions. If wet weather conditions during project operations generate and transport sediment to a stream channel or other water body, operations shall cease until the weather conditions improve, unless delaying operations would create the risk of adverse resource impacts. Coordination with USFS representative shall be part of this decision process.	Protect stream channel from water quality impacts.	Moderate to High (Standard BMP, MBS Forest Roads Experience)	WDFW (2005), COE (2011), NMFS (2007), FWS (2007)	Special Use Permit administrator.
SE5 – Dispose of fill waste material generated from implementation at a stable location out of the flood prone area. Ensure that the waste material is disposed of in a location that will not result in erosion and sedimentation or cause roadway runoff drainage problems.	Prevent and minimize potential effects on water quality.	Moderate (Standard BMP, MBS Experience)	WDFW (2005), COE (2011), NMFS (2007), FWS (2007)	Special Use Permit administrator.
SE6 – Evaluate channel incision/headcut risk and construct in-channel grade control structures of rock and wood when necessary. Place rocks and woody material to mimic adjacent channel in a manner to ensure channel and bank stability. Promote fish passage for all life stages present in the area.	Restore hydraulic function of channel, valley bottom and riparian areas.	High (Standard BMP, MBS Experience)	WDFW (2005), COE (2011), NMFS (2007), FWS (2007)	Special Use Permit administrator.
SE7 – The wetland culvert on forest Road 7138 shall be removed and stabilized in a manner to eliminate ongoing and potential future headcutting and maintain hydraulic control of water elevation in the wetland. Forest Service aquatics personnel are required to be onsite during removal and stabilization of this site. The road prism and road surface adjacent to the wetland shall be left intact and not ripped to maintain and protect wetland features. A detailed description of this measure is included in Appendix B of the EA.	Maintain and protect function of wetland adjacent to Forest System road 7138 during road decommission and over the term of the SUPs.	Moderate to High (MBS Experience)	MBS Project-specific requirement, See Appendix B of the EA.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objective	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
SE8 – (modified) – Stream channels and developed slopes will be stabilized with structural erosion/sedimentation control measures including revegetation by plant species native to the area and elevation.	Maintain stability of stream channel beds, banks, and upslope areas that may contribute surface runoff to receiving water bodies.	Moderate (MBS Experience, Industry standard BMPs)	Forest Plan, Water Resources and Riparian Areas, S&Gs nos. 5, 6, 8, and 10; Soil Resources, S&Gs nos. 2 and 5.	Special Use Permit administrator.
SE9 – Topsoil that is removed from a site during project implementation, and intended to be placed back onto the disturbed site, will be carefully stored using approved erosion and sediment control methods. Soil will be covered and protected from erosion if it needs to be stored during inclement weather.	Ensure success of rehabilitation.	Moderate (Topsoil stockpiling and erosion control is common industry practice)	Forest Plan, Soil Resources, S&Gs nos. 3 and 5.	Special Use Permit administrator.
SE10 – Erosion control fabric will be installed on disturbed areas of steep slopes around waterways as approved by the Forest Service.	Minimize sedimentation impacts on stream channels.	Moderate (Silt fence is common industry practice)	Forest Plan, Soil Resources, S&Gs nos. 2 and 5; Water Resources and Riparian Areas, S&Gs nos. 2, and 3; Northwest Forest Plan, RF-5.	Special Use Permit administrator.
SE11 – Excess soil material from construction will be transported to a suitable upland site, approved by the Forest Service, so that it is stored outside of stream or ditch corridors, wetlands (above the ordinary high-water mark), and Riparian Reserves.	Minimize sedimentation impacts on stream channels.	Moderate (Stockpiling is common industry practice)	Forest Plan, Soil Resources, S&Gs nos. 3 and 5; Water Resources and Riparian Areas, S&Gs nos. 2, 3, and 5.	Special Use Permit administrator.
SE12 – Erosion control filter fabric will be placed underneath rock apron drainages to prevent downslope gully erosion.	Maintain channel stability in disturbed areas.	Moderate (Burroughs and King 1989)	Forest Plan, Soil Resources, S&Gs nos. 1, 2, and 4.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objectives	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
SE13 – If flooding or weather results in detrimental erosion or sedimentation, operations will stop until the conditions improve. Avoiding disturbed areas under wet conditions will minimize risk of erosion and sedimentation.	Minimize risk of erosion and sedimentation during construction.	High (Logic, avoiding disturbed areas in wet conditions is common industry practice)	Forest Plan, Soil Resources, S&Gs nos. 1 and 2; Water Resources and Riparian Areas, S&Gs nos. 2 and 3.	Special Use Permit administrator.
SE14 – Sediment fences and or hay bales from Forest Service-approved sources will be installed between wetlands adjacent to construction areas.	Minimize sedimentation impacts on wetland areas.	Moderate (Use of erosion control practices is industry standard)	Forest Plan, Soil Resources, S&Gs nos. 1, 2, and 4; Water Resources and Riparian Areas, S&Gs nos. 2, 3, and 5.	Special Use Permit administrator.
Vegetation Resources				
V1 – If any previously undiscovered TES or other rare or uncommon vascular plants, bryophytes, lichens, or fungi are discovered, before or during project implementation, halt work until a USFS botanist is consulted and necessary mitigation measures are enacted.	Prevent impact on TES or S&M plants.	High (Logic)	Forest Plan p. 4-127, USDA Forest Service 1990.	Special Use Permit administrator.
V2 – Treat known infestations <i>before</i> ground disturbance begins. To be effective, a lag time of 2 weeks is needed between the time of treatment and the time of ground disturbance.	Eradicate known infestations.	High (USDA Forest Service 2005)	Best Management Practices, USDA Forest Service 1999, Forest Plan S&G #16, USDA Forest Service 2005.	Special Use Permit administrator.
V3 – For actions conducted or authorized by written permit by the Forest Service that will operate outside the limits of the road prism, require the cleaning of all heavy equipment <i>prior to entering NFS Lands</i> .	Prevent introduction of weeds into the MBS.	Moderate (USDA Forest Service 2005)	Forest Plan S&G #2, USDA Forest Service 2005.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objectives	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
V4 – Suppliers must provide annual documentation indicating that the following products have been examined by a qualified inspector and deemed free of State listed noxious weeds: <ul style="list-style-type: none"> • Straw or other Mulch¹ • Gravel, Rock, or other fill • Seeds (according to AOSA standards) 	Prevent introduction of weeds.	Moderate (USDA Forest Service 2005)	Forest Plan S&G #3 and7, USDA Forest Service 2005, Forest Plan Best Management Practices, USDA Forest Service 1999.	Special Use Permit administrator.
V5 – If weeds are present in the project area, all equipment and gear must be cleaned <i>before leaving the project area</i> to avoid spreading the infestation further.	Prevent weed spread.	High (USDA Forest Service 1999)	Best Management Practices, USDA Forest Service 1999.	Special Use Permit administrator.
V6 – If weeds are present in the project area, work from relatively weed-free areas into the infested area rather than vice versa.	Prevent weed spread.	Moderate (logic)	Best Management Practices, USDA Forest Service 1999.	Special Use Permit administrator.
V7 – Revegetate all areas of bare soil exposed by project activities if there is a risk of noxious weed invasion. Native plant materials are the first choice in revegetation where timely natural regeneration of the native plant community is not likely to occur. If native plant materials are not available, use the appropriate MBS non-native seed mix (per Potash and Aubry 1997).	Prevent erosion, prevent introduction and spread of weeds, maintain and restore habitat.	High (USDA Forest Service 2005)	Forest Plan S&G #13, USDA Forest Service 2005, Best Mgt. Practices, USDA Forest Service 1999, ACS S&G # 8 & 9, USDA Forest Service & USDI Bureau of Land Management 1994.	Special Use Permit administrator.
V8 – Application of any herbicides will be performed or supervised by a state or federally licensed applicator and completed in accordance with a project herbicide transportation and handling safety plan. Formulation, including adjuvants, and application will be selected from Forest-approved products and methods. Site-specific characteristics will be	Prevent inappropriate use of herbicides and inform public of herbicide use.	High (USDA Forest Service 2005)	USDA Forest Service 2005 Standards # 15, 16, 18, 19, and 20.	Special Use Permit administrator

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objectives	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
considered in selecting herbicide formulation. Prior to application, Forest system staff will ensure timely public notification.				
V9 – For Washington State Class A and B designated noxious weeds ² : treat with the most effective method; after treatment has taken effect, cover the infestations with geotextile fabric to avoid spreading seeds or roots remaining in the soil. Avoid disturbance to the area. If disturbance cannot be avoided, treat infestation first, then wash equipment after working in the infested area before moving into an uninfested area.	Eradicate known infestations and prevent weed spread.	High (MBS Experience)	WAC Chapter 16-750, RCW 17.10	Special Use Permit Administrator.
Fisheries Resources				
F1 – When removing culverts on fish bearing streams, construction activities shall be dewatered and or isolated from flowing waters. In-water work areas shall be isolated from the surrounding waterbody by a properly installed silt screen or a similar sediment containment device whenever practicable. The permit holder shall remove the silt screen or other temporary sediment containment devices as soon as they are no longer necessary to protect the surrounding waterbody.	Protect and minimize impacts on fish.	High (MBS Experience, ESA Section 7 Consultation)	WDFW (2005), COE (2011), USFWS (2007), NMFS (2007).	Special Use Permit administrator.
F2 – When removing a culvert from a first or second order, non-fish bearing stream, aquatic specialists shall determine if culvert removal should follow the isolation or dewatering criteria.	Protect and minimize impacts on fish.	Moderate (MBS Experience, Consultation with WDW)	WDFW (2005), COE (2011, Appendix A, #10).	Special Use Permit administrator.
F3 – Any pumps used during dewatering of fish bearing waterbodies shall be equipped with a fish guard to prevent passage of fish into pump. Pump intake shall be screened with 3/32 inch or smaller mesh.	Protect and minimize impacts on fish.	High (MBS Experience, Consultation with WDW)	WDFW (2005).	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objectives	Effectiveness and Rationale	Forest Plan Standard & Guideline and Other Guidance	Enforcement
F4 – Fish within construction sites that will be dewatered or isolated from the main waterbody shall be captured and safely removed from the job site. Fish capture equipment shall be maintained on the job site during all in-water activities.	Protect and minimize effects of on fish.	High (MBS Experience, Consultation with WDW)	WDFW (2005), COE (2011).	Special Use Permit administrator.
F5 – Immediately notify Forest Service personnel if any fish kill occurs. Stop all work that may affect fish habitat until notified by Forest Service that work may resume.	Protect fish.	High (MBS Experience, ESA Section 7 Consultation, Standard for Construction)	WDFW (2005), COE (2011), USFWS (2007), NMFS(2007).	Special Use Permit administrator.
F6 – Any ground-disturbing activities in channels and along the banks of fish bearing streams or streams located within ¼ mile of fish habitat shall be conducted during instream work windows. Consult Fish biologist prior to implementation activities to ensure proper adherence to work windows. Ground work outside of the bankfull channel with no potential to negatively affect fish is allowed outside of instream work windows.	Protect and minimize impacts on aquatic resources.	High (MBS Experience)	BMP, ACS, (1990 Forest Plan, p. 4-126, 119).	Special Use Permit administrator.
F7 – Promote fish passage at removed culverts and stabilized crossings for all life stages.	Protect and minimize impacts on fish.	High (MBS Experience, ESA Section 7 Consultation, Standard for Construction)	COE (2011), ACS, USFWS (2007), NMFS (2007).	Special Use Permit administrator.
Wildlife Resources				
W1 – Coarse woody debris already on the ground should be retained and protected to the extent possible from disturbances during construction.	Retain down woody material diversity and habitat values.	High (Logic, MBS Experience)	Forest Plan, Wildlife Habitat and Management, S&G no.2; ROD p. C-40.	Special Use Permit administrator
W2 – Snags over 20 inches diameter at breast height (dbh) should not be marked for cutting,	Avoids removal of large trees and snags that may	High (MBS Experience)	Forest Plan, Wildlife Habitat and	Special Use Permit administrator

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objectives	Effectiveness and Rationale	Forest Plan Standard and Guideline and Other Guidance	Enforcement
unless for safety purposes.	provide habitat for cavity nesting birds and mammal dens.		Management, S&G nos. 1, 2; ROD p. C-4.	
W3 – Revegetate as soon practical all areas of bare soil exposed by project activities. Native plant materials are the first choice in revegetation where timely natural regeneration of the native plant community is not likely to occur.	Prevent introduction and spread of weeds; maintain and restore habitat, particularly big game forage in graded sites.	Moderate (Logic)	Forest Plan, Vegetation Management, S&G no. 2.	Special Use Permit administrator; District Botanist
W4 – Construction activity is permissible within old-growth habitat of a current-year northern spotted owl activity center from July 16 through March 1 (dates inclusive).	To protect fledgling spotted owls from chronic disturbance during construction activities where power equipment and heavy machinery is employed.	High (Logic, MBS Programmatic BA)	Section 7 Consultation; refer to Appendix G MBS Programmatic BA (2003-2007, with extension)	Special Use Permit administrator.
Heritage Resources				
HR1 – If any previously unidentified heritage resources are identified or encountered at any time during project implementation, efforts shall be made to protect the resource until the USFS Heritage Specialist is notified and the Forest Service fulfills its consultation requirements.	Protect newly discovered cultural resources.	Moderate (MBS Experience)	MBS Forest Plan, Archaeological and Historical Properties, S&G nos. 1, 2; 36 CFR 800 Regulations of the National Historic Preservation Act.	Special Use Permit administrator.

Management requirements and mitigation measures considered in this analysis (cont'd).				
Management Requirement or Mitigation Measure	Objectives	Effectiveness and Rationale	Forest Plan Standard and Guideline and Other Guidance	Enforcement
HR2 – If any human remains or cultural items specifically identified in NAGPRA are inadvertently discovered on federal lands, the person making the discovery must immediately notify the responsible federal official by telephone, with written confirmation. The person must stop the activity in the area of the inadvertent discovery and make a reasonable effort to protect the remains/items. The agency will follow the requirements and procedures in 36 CFR 10 Subpart B.	Protect human remains and other cultural items.	Moderate (MBS Experience)	MBS Forest Plan, Archaeological and Historical Properties, S&G (general); 36 CFR 10 Subpart B.	Special Use Permit administrator.
HR3 – A professional archeologist is required to monitor excavation of the trench for the first 500 feet of the 0,25-mile segment of buried power line along Road 7176 immediately north of the junction with Crystal Mountain Boulevard or, if scheduling allows, to pre-inspect this segment prior to construction.	Protect undiscovered cultural resources.	Moderate (MBS experience, consultation with Washington State Historic Preservation Officer).	MBS Forest Inventory Strategy (1997)	Special Use Permit administrator
<p>¹Weed free straw for erosion control must be certified by WA State via the WWHAM program http://www.nwcb.wa.gov/WWHAM/WWHAM_suppliers.htm</p> <p>²<u>This approach may also be necessary for other species of high concern to the MBS if such species are highly invasive but not yet established in the watershed. Project manager should confer with MBS Invasive Plant Coordinator to determine if this additional measure is warranted.</u></p>				

APPENDIX C – FOREST PLAN CONSISTENCY

The Selected Alternative is consistent with the applicable Forest Plan standards and guidelines. Specific determinations for the most pertinent standards and guidelines are as follows.

WATERSHED RESOURCES

Lands – Issue leases, permits rights-of-way, and easements to avoid adverse effects that retard or prevent attainment of ACS objectives. Adjust existing leases, permits, rights-of-way, and easements to eliminate adverse effects that retard or prevent the attainment of ACS objectives. If adjustments are not effective, eliminate the activity. Priority for modifying existing leases, permits, rights-of-way and easements will be based on the actual or potential impact and the ecological value of the riparian resources affected (USDA USDI 1994, p. C-37).

Discussion: All disturbance under the Proposed Action would take place within the SUP area. As discussed in the EA (Chapter 3, pp. 50 – 53), all ACS objectives would be met under the Proposed Action, and no adverse effects would retard or prevent attainment of ACS objectives.

Prohibit or regulate activities in RRs that retard or prevent attainment of the ACS objectives (USDA USDI 1994, p. C-31).

Discussion: Under the Proposed Action, all disturbance in Riparian Reserves would take place in the prism of existing roads. As discussed in the EA (Chapter 3, pp. 50 – 53), no adverse effects would retard or prevent attainment of ACS objectives.

Reduce existing system and non-system road mileage. If funding is insufficient to implement reductions, there will be no net increase in the amount of roads in Key Watersheds (USDA USDI 1994, p. C-7).

Discussion: Existing system road mileage would be decreased by about 1.6 miles under the Proposed Action as a result of road decommissioning activities.

Watershed analysis is required prior to management activities, except minor activities such as those Categorically Excluded under NEPA (and not including timber harvest) (USDA USDI 1994, p. C-7).

Discussion: As indicated by this analysis, the Proposed Action is projected to have no notable impacts on watershed resources following proper use of stipulated mitigation measures and design features (Appendix B). As a result, no watershed analysis is required prior to the Proposed Action.

Maintain or enhance the recreation, visual, wildlife, fisheries and water quality values of the existing and recommended wild, scenic, and recreation rivers (MBS Forest Plan, p. 4-95).

Recommended wild and scenic rivers shall be managed to protect those characteristics that contribute to the eligibility of these rivers at their highest potential classification until Congress formally determines their status.

Discussion: No existing or recommended wild, scenic, and recreation river segments are located in or immediately downstream of the SUP. As a result, the Proposed Action would have no direct or indirect effects on existing and recommended wild, scenic, and recreation rivers. Removing overhead Segment 3 and decommissioning the power line access roads (some segments of which are within close proximity to the White River) would enhance the scenic value of the recommended recreational river in these locations.

Plan and conduct land management activities so that reductions of soil productivity potentially caused by detrimental compaction, displacement, puddling, and severe burning are minimized. Nutrient capital on forest and rangelands is to be maintained at acceptable levels as determined by state of the art technology (MBS Forest Plan, pp. 4-117).

Discussion: All disturbance associated with the Proposed Action would take place in existing road prisms where soil has been previously compacted to a designed level. Disturbed soils will be returned to their original compacted condition following excavation and placement of underground components. No other detrimental soil conditions would take place under the Proposed Action. No loss of nutrient capital would occur under the Proposed Action.

Plan and conduct land management activities so that soil loss from surface erosion and mass wasting, caused by these activities, will not result in an unacceptable reduction in soil productivity and water quality (as stated in FSM 2500 R- Supp. 45 or as revised) (MBS Forest Plan, p. 4-117).

Discussion: Under the Proposed Action, application of stipulated mitigation measures and design features listed in Appendix B would minimize the potential loss of soil from surface erosion and would not result in unacceptable reductions in soil productivity and water quality.

No more than 20% of an activity area may be severely burned, compacted, puddled, or displaced as a result of the activity. Only permanent features of the transportation system will remain in a detrimentally compacted, puddled, and/or displaced condition (MBS Forest Plan, p. 4-117).

Discussion: The Proposed Action would only disturb permanent features of the transportation system (i.e. existing Forest Roads) during construction and installation of underground components. Decommissioning of Forest and access roads would restore soil quality conditions.

Surface erosion will be minimized by maintaining effective ground cover after cessation of any soil disturbing activity (MBS Forest Plan, p. 4-117).

Discussion: Under the Proposed Action, soil erosion would be minimized by compacting previously disturbed road corridors to the original designed standards. Decommissioned roads would be mechanically scarified to provide a bed for seeding and surface revegetation. This effort would result in effective ground cover and minimize future soil erosion from these areas.

Meet or exceed Water Quality Regulations for waters of the State through application of Best management Practices. The key beneficial uses which BMP's are designed to protect are fish and water for domestic use (MBS Forest Plan, p. 4-118).

Discussion: Potential impacts on water quality have been identified in the Watershed Resources specialist report. Water quality regulation for waters of the state would be met or exceeded under the Proposed Action through mitigation efforts specified in Table 2.

Large woody material needed to meet the desired future condition shall be maintained and managed to: (1) maintain water quality in streamside management units of all streams at existing levels, and (2) maintain fish habitat at existing levels (MBS Forest Plan, p. 4-119).

Discussion: The Proposed Action would not result in disturbance to existing LWD or influence desired future condition for LWD in stream segments located in or adjacent to the SUP. See also the fisheries specialist report prepared for this project (Cirrus 2012b).

Maintain in-channel and streambank stability for upper and lower channels in the Forest watersheds in order to provide stable, high-quality habitat for salmon and trout, and provide high quality water for other in-stream beneficial uses (MBS Forest Plan, p. 4-119).

Discussion: Potential impacts on in-channel and streambank stability are identified in the Watershed Resources specialist report. The stability of these features would be maintained through mitigation efforts specified in Table 2. The majority of work completed under the Proposed Action would take place in existing road corridors and away from stream channels. Culverts located at road crossings would be replaced per Forest Service recommendations. Replacement of damaged culverts would improve local channel bed and bank conditions by providing unimpeded stream flow and greater stability where culverts contact stream channels. See also the fisheries specialist report prepared for this project (Cirrus 2012b).

Along perennial streams and fish bearing intermittent streams, vegetation should be maintained to provide cover and/or root strength so as to maintain streambank stability and fish habitat capability at existing levels (MBS Forest Plan, p. 4-119).

Discussion: Vegetation providing cover and root strength would be maintained at locations where culverts are replaced under the Proposed Action. See also the vegetation specialist report prepared for this project (Cirrus 2012c).

Consult with a hydrologist if the activity being planned involves riparian areas, wetlands, flood plains, or probable cumulative impacts on water resources (MBS Forest Plan, p. 4-120).

Discussion: Specialists have been consulted during a review of the Proposed Action and its potential impacts on riparian areas, wetlands, floodplains and probable cumulative impacts on water resources in the SUP.

VEGETATION RESOURCES

Threatened, Endangered, and Sensitive Species (USDA Forest Service 1990, p. 4-127):

- *All proposed management actions which have the potential to affect habitat of Endangered, Threatened, or Sensitive species will be evaluated to determine if any of these species are present. Biological evaluations will be completed for all proposed management activities which could affect T&E species.*

- *Before project decisions are made, consult with Federal, State, other agencies, groups, and individuals concerned with the management of T&E and Sensitive species. In the design of projects for implementation where such species, areas, or habitats are known to occur, insure that appropriate action is taken to protect these species, areas, and habitats. USDI Fish and Wildlife Service will be consulted for technical information and ESA Section 7 Consultation when a management activity may affect a T&E species.*

Discussion: The Proposed Action would be consistent with this Forest Plan guidance. It has been evaluated for impacts on Threatened, Endangered, and Sensitive species, as in the Wildlife Resources specialist report. This document serves as the Biological Evaluation required for Forest Service Sensitive species listed by the Regional Forester. A Programmatic Biological Assessment will not be required to be submitted to the FWS for federally-listed species as all determinations were that the Proposed Action would have **no effect** on federally listed species.

Survey and Manage species standards and guidelines apply within all land allocations; however, the Survey and Manage provision for each species will be directed to the range (or portion of range) of that species, to the particular habitats where concerns exist for its persistence, and to the management activities considered “habitat-disturbing” for that species. The Survey and Manage standards and guidelines will benefit species closely associated with late-successional and old-growth forests including certain amphibians, mammals, bryophytes, mollusks, vascular plants, fungi, lichens, and arthropod groups. (USDA Forest Service and USDI Bureau of Land Management. 2001, pp. 7 – 14.)

- *Category A and B Survey and Manage Species (Refer to Table 1-1 in the 2001 Survey and Manage and Protection Buffer Record of Decision). Manage all known sites and reduce the inadvertent loss of undiscovered sites.*
- *Category C and D Survey and Manage Species (Refer to Table 1-1 in the 2001 Survey and Manage and Protection Buffer Record of Decision). Identify and manage high-priority sites to provide for reasonable assurance of species persistence. Until high-priority sites can be determined, manage all known sites.*
- *Category E – Rare and Status Undetermined. Manage all known sites while determining if the species meets the basic criteria for Survey and Manage and, if so, to which category (A, B, C, or D) it should be assigned.*
- *Category F – Uncommon or Concern for Persistence Unknown, Status Undetermined Survey and Manage Species. Determining if the species meets the basic criteria for Survey and Manage and, if so, to which category (A, B, C, or D) it should be assigned.*

Discussion: See preceding response. Likewise, there would be no impact on Survey and Manage plant species.

Adhere to the prevention and treatment/restoration standards outlined in the Pacific Northwest Region Invasive Plant Program; Preventing and Managing Invasive Plants Record of Decision (ROD) (USDA 2005).

Discussion: The Proposed Action would be consistent with this guidance. The applicable standards and guidelines described in the 2005 ROD have been incorporated into the list of mitigation measures and project design features in Appendix B and would help prevent invasive plant introduction and manage invasive plants within the project area.

FISHERIES RESOURCES

Water quality shall be maintained or enhanced through application of Best Management Practices (MBS Forest Plan, p. 4-126).

Discussion: Water quality would be maintained by adhering to the mitigation measures and design criteria listed in Appendix B above, and in Table 2 of the watershed resources specialist report (Cirrus 2012b). The Cirrus Watershed Specialist Report also includes an analysis of potential changes to water quality as part of the ACS discussion. Any changes in water quality are expected to be temporary and within the levels observed naturally.

All forest management activities should provide for unobstructed fish passage to historically accessible fish habitat (MBS Forest Plan, p. 4-126).

Discussion: The Proposed Action is not anticipated to affect the extent of accessible fish habitat. If poor-condition stream and drainage culverts need to be replaced, it will be completed as specified in the mitigation measures and design criteria presented in Appendix B above and in Table 2 of the watershed resources specialist report, specifically WS15.

All proposed management actions which have the potential to affect habitat of Endangered, Threatened, or Sensitive species will be evaluated to determine if any of these species are present. Biological evaluations will be completed for all proposed management activities which could affect T and E species (MBS Forest Plan, p. 4-127).

Discussion: The fisheries specialist report prepared for this analysis serves as the biological evaluation required for Forest Service Sensitive species listed by the Regional Forester. Further, a Programmatic Biological Assessment was submitted to the FWS and NMFS for federally-listed species for all determinations because the Proposed Action **may affect but would not likely adversely affect** federally listed fish species (see Table 6 of the specialist report).

Before project decisions are made, consult with Federal, State, other agencies, groups, and individuals concerned with the management of T&E and Sensitive species. In the design of projects for implementation where such species, areas, or habitats are known to occur, insure that appropriate action is taken to protect these species, areas, and habitats. USDI Fish and Wildlife Service will be consulted for technical information and ESA Section 7 Consultation when a management activity may affect a T&E species (MBS Forest Plan, p. 4-127).

Discussion: Prior to any decisions being made, the EA was sent to stakeholders and the interested public for comment. Ample time was provided for review of the NEPA document and response to the Forest Service with concerns and recommendations. Appropriate action identified through this analysis will be taken when construction plans are drafted to ensure species and habitats are maintained. Use of Forest

Plan standards and guidelines, management requirements, and mitigation measures will ensure these resources are protected. The MBSNF completed consultation with USFWS and NMFS on March 8, 2012.

WILDLIFE RESOURCES

All proposed management actions which have the potential to affect habitat of Endangered, Threatened, or Sensitive species will be evaluated to determine if any of these species are present. Biological evaluations will be completed for all proposed management activities which could affect Threatened and Endangered species (MBS Forest Plan, p. 4-127).

Discussion: This wildlife specialist report prepared for this analysis serves as the biological evaluation required for Forest Service Sensitive species listed by the Regional Forester. Further, a Programmatic Biological Assessment was not required to be submitted to the FWS for federally-listed species as all determinations were that the Proposed Action would have **no effect** (section 7.2.3 of the EA) on federally-listed species.

Before project decisions are made, consult with Federal, State, other agencies, groups, and individuals concerned with the management of T&E and Sensitive species. In the design of projects for implementation where such species, areas, or habitats are known to occur, insure that appropriate action is taken to protect these species, areas, and habitats. USDI Fish and Wildlife Service will be consulted for technical information and ESA Section 7 Consultation when a management activity may affect a T&E species (MBS Forest Plan, p. 4-127).

Discussion: Prior to any decisions being made, the EA was sent to other relevant agencies, organizations, and the interested public for comment. Ample time was provided for review of the NEPA document and response to the Forest Service with concerns and recommendations. Appropriate design features and mitigation measures identified through this analysis will be included when construction plans are drafted to ensure species and habitats are maintained.

No loss of deer and elk forage habitat within created openings (USDA Forest Service 2001).

Discussion: The Proposed Action would not impact created openings that provide forage for deer and elk. Ground disturbances would be limited to the prism of existing roads and would not extend to foraging areas.

Non-openings to be managed under LSR standards and guidelines (USDA Forest Service 2001).

Discussion: The Proposed Action would not create any disturbances in LSR managed for elk forage. Disturbances would be limited to the prism of existing roads and would not change the canopy characteristic of adjacent LSR.

Special Use Permits - Existing right-of-way agreements, contracted rights, easements, and special use permits in LSRs will be recognized as valid uses. New access proposals may require mitigation measures to reduce adverse effects on LSRs. In these cases, alternate routes that avoid late-successional habitat should be considered. If roads must be routed through a reserve, they will be designed and located to

have the least impact on late-successional habitat. Review all special use permits and when objectives of LSRs are not being met, reduce impacts through either modification of existing permits, or education (Northwest Forest Plan, p. C-19).

Discussion: Greenwater SUP #4141-14 is an existing SUP, and is thus valid. No new roads would be constructed under the Proposed Action. Disturbances would be limited to the prism of existing roads and would not change the canopy characteristics of adjacent LSR. Construction would be in accordance to mitigation measure W4 (Appendix B) and would avoid the critical nesting period of northern spotted owls. Other special-status species found in the LSR adjacent to the project would also benefit from avoiding construction during this period.

HERITAGE RESOURCES

Protect confidentiality of American Indian religious and cultural use areas.

Discussion: While religious and cultural use areas have been discussed in analysis of the Proposed Action, specific locations remain confidential.

Identify specific American Indian religious and cultural sites and areas according to the nature of the religious use or ceremonial practice:

- *Spirit Quest and legendary sites*
- *Cedar area*
- *Ceremonial flora and plant areas*
- *Cemeteries*

Discussion: As discussed in the EA, the SUP and surrounding area have been inventoried for heritage and traditional cultural resources. And as discussed above, the first 500 feet of Forest Road 7176 north of the intersection with Crystal Mountain Boulevard will be monitored during construction or inspected prior to construction.

Review the Inventory of American Indian Religious and Cultural Use, Practices, Localities, and Resources during the scoping phase of environmental analyses.

Discussion: The Forest Service has reviewed the cited document.

Present information about planned project activities in all management areas (i.e., protected and otherwise) to religious and political leaders of tribal groups whose traditional practices might be affected.

Discussion: Through scoping, the Forest Service has provided potentially affected Tribes with a project description and opportunity to comment. Further opportunities for involvement will be available as needed, including compliance for inadvertent discoveries identified in mitigation measures HR1, HR2, and HR3 (Appendix B).

Where projects will affect American Indian religious and cultural use sites, protection and mitigation measures shall be worked out with the leaders of the affected tribal groups on a project specific basis or through Memoranda of Agreement.

Discussion: No effects warranting such consultation have been identified through analysis of the Proposed Action. Mitigation measures HR1, HR2, and HR3 (Appendix B) would ensure compliance in the event of unanticipated discoveries.

Project level protection and mitigation measures shall consider the nature of the religious site, type, and duration of use and other factors of concern to tribal leaders in determining what appropriate measures can be designed to protect site values. They shall maximize retention of purity, privacy, and isolation, consistent with overall Plan objectives.

Discussion: See preceding response.

In the event that religious artifacts or features are discovered during implementation of a project, follow the appropriate procedures.

Discussion: Mitigation measures HR1, HR2, and HR3 (Appendix B) address this guidance.

National Forest System lands shall be managed to recognize and reduce social and administrative barriers to religious uses of the Forest by American Indians.

Discussion: This report and its findings document compliance with this guidance.

Results of project-level cultural resource inventories shall be documented through environmental analysis for the project. Cultural resource compliance shall be documented according to the current Programmatic Agreement (PA) between the Washington State Historic Preservation Office (SHPO) and the Mt. Baker-Snoqualmie National Forest.

Discussion: As discussed in the Heritage Resources specialist report, the cited analysis has been completed and documented in the EA prepared for this project. Review by the Forest Heritage Specialist ensured that documentation is consistent with the cited PA.

Evaluate the significance of inventoried sites by applying the criteria for eligibility to the National Register of Historic Places. This will be accomplished by a professional cultural resource specialist. Sites may be treated as individual properties, thematic groups, or historic districts. Give priority to those properties that may be affected by project activities. Evaluations will be coordinated with the criteria contained in the Cultural Resource Overview and the State Historic Preservation Plan.

Discussion: As discussed in the Heritage Resources specialist report, this evaluation has occurred in a manner consistent with the cited direction. No sites eligible for inclusion on the NRHP would be affected by the Proposed Action.

Consider the effects of all National Forest undertakings on significant cultural resources.

Discussion: See preceding response.

Until proper evaluation occurs, all known cultural resource properties shall be protected.

Discussion: See preceding response.

Develop measures, in consultation with the Washington SHPO, Advisory Council, and other interested parties as defined in 36 CFR 800 to protect significant sites from adverse effects due to Forest development or management practices. Avoidance of impacts (leaving resources undisturbed) shall be explicitly considered for all significant resources. Other measures may range from avoidance of the site and protection of its environmental setting to data recovery or recordation to the Historic American Buildings Survey or Historic American Engineering Record standards. Actual measures will be determined through Programmatic Memoranda of Agreement or during consultation for specific projects.

Discussion: See preceding response.

Confidentiality of cultural resource site location shall be maintained as required by section 304 of the National Historic Preservation Act.

Discussion: While cultural resources have been discussed in analysis of the Proposed Action, specific site locations remain confidential.

Based on management plans, protect eligible cultural resources from degradation due to public use and natural deterioration. Protection activities may include, but are not limited to, scientific study and collection (as outlined in a data recovery plan), the use of fences and barriers, proper use or removal of signs, stabilization techniques, closure plans, patrol and site monitoring, maintaining site anonymity, and gaining public understanding and support through education.

Discussion: See preceding responses.