Chapter Five Section 4(f) Evaluation

5.1 Introduction

Section 4(f) of the Department of Transportation Act of 1966, codified in Federal law at 49 United States Code §303, declares that "It is the policy of the United States Government that special effort should be made to preserve the natural beauty of the countryside and public park and recreation lands, wildlife and waterfowl refuges, and historic sites."

Section 4(f) specifies that "The Secretary [of Transportation] may approve a transportation program or project…requiring the use of publicly owned land, of a public park, recreation area, or wildlife and waterfowl refuge of national, State, or local significance, or land of an historic site of national, State or local significance (as determined by the Federal, State, or local officials having jurisdiction over the park, area, refuge, or site) only if

1) there is no prudent and feasible alternative to using that land; and

2) the program or project includes all possible planning to minimize harm to the park, recreation area, wildlife and waterfowl refuge, or historic site resulting from the use."

The Federal Highway Administration (FHWA) is acting under authority of the Secretary of Transportation and is required to comply with Section 4(f). Section 4(f) further requires consultation with the Department of the Interior, and, as appropriate, the involved offices of the Departments of Agriculture, and Housing and Urban Development in developing transportation projects and programs that use lands protected by Section 4(f).

This Section 4(f) Evaluation has been prepared to accompany the Environmental Impact Statement (EIS) for the Interstate 90 (I-90) Snoqualmie Pass East project in Kittitas County, Washington. FHWA and Washington State Department of Transportation (WSDOT) are proposing the project, and anticipate using federal funds for design and construction. Because one or more of the alternatives under consideration impacts a Section 4(f) resource, a Section 4(f) Evaluation must be completed.

The portion of I-90 that is under analysis passes through an area of public land and recreational opportunities, and contains both known and unrecorded historical and cultural resources.

5.2 Project Purpose

The purpose of this project is to improve public safety and meet identified project needs on a 15-mile portion of I-90. The project corridor begins on

the eastern side of Snoqualmie Pass at Milepost (MP) 55.1 in the Snoqualmie Pass/Hyak vicinity and ends at MP 70.3 near the unincorporated community of Easton (see **Figure 5-5**).

5.3 Project Need

WSDOT is addressing several key issues by implementing this project. Specifically, the project would meet the following needs: 1) reduce the risks of snow avalanches to the traveling public and eliminate required road closures for avalanche control; 2) reduce the risk of rock and debris from unstable slopes reaching the roadway; 3) provide for predicted increases in traffic volume; 4) replace the damaged pavement; and 5) connect wildlife corridors and habitat across the freeway.

I-90 is a major transportation facility that links Puget Sound to Eastern Washington and the rest of the nation. Currently, an average of 27,000 vehicles, of which 20 percent is truck traffic, cross Snoqualmie Pass daily. Following are the conditions that currently exist in the I-90 project corridor:

- The pavement near the pass is heavily deteriorated and is in need of replacement.
- Congestion on weekends occurs frequently and will continue to worsen with the expected growth in traffic.
- Substandard highway curves and poor sight distance contribute to numerous accidents each year.
- Snow avalanches can completely close the route several times each year.
- I-90 acts as a barrier to wildlife movement.

The project will reconstruct the route to improve safety and traffic flow, reduce delays due to avalanches, and provide crossing opportunities for wildlife.

5.4 Description of Proposed Action

At the project onset, WSDOT considered alternative routes for the I-90 corridor and a Limited Construction Alternative. The corridor is described as the entire 15 miles of the project from the Hyak Interchange at MP 55.1 to the West Easton Interchange at MP 70.3.

Four specific route alternatives were considered within this corridor: the Rampart Ridge, Roaring Ridge, Split Route, and Common Route Alternatives. The Common Route is the only build alternative carried forward for detailed analysis based on a comprehensive set of screening

criteria that included Section 4(f) and Section 6(f) considerations. As required by National Environmental Policy Act (NEPA) regulations, a No-Build Alternative is assessed in the EIS.

5.4.1 Common Route

The Common Route would reconstruct I-90 in its existing vicinity. This proposed route avoids new impacts to the surrounding environment by reconstructing I-90 within the existing footprint to the greatest extent practicable (between 80 percent and 100 percent).

Two elements of the proposed action require further consideration. The two decisions to be made by FHWA and WSDOT include the following:

1) Which proposed Keechelus Lake Alignment Alternative would be constructed?

2) How would connections for wildlife and habitats be incorporated along with other improvements throughout the corridor?

In order to answer these two questions, WSDOT developed Alignment Alternatives along Keechelus Lake within the Common Route. Connectivity Enhancement Areas (CEAs), with multiple options, were designated to provide wildlife and habitat connectivity (see ***Chapter 2, Description of Alternatives*** in the EIS for more information about these options).

5.4.1.1 KEECHELUS LAKE ALIGNMENT ALTERNATIVES

WSDOT developed four variations of how the Common Route would negotiate the Slide Curve area (between MP 56.6 and MP 59.9, Rocky Run Creek to Resort Creek). These variations are analyzed as Alternatives 1 through 4 in the EIS, and that terminology is retained in this Section 4(f) Evaluation.

There are three main differences among the proposed alignment alternatives: design speed of curves, avalanche control, and cost. In Washington, rural interstate roadways are typically designed to a speed of 75 miles per hour (mph); however, the design speed can be lowered depending on the terrain (i.e., 70 mph in rolling terrain and 60 mph in mountainous terrain). A higher design speed means a straighter alignment, which would theoretically result in a safer road.

Alternative 1: Long Tunnels

Alternative 1 would construct twin three-lane, 1.9-mile-long tunnels through Slide Curve. The alignment throughout this area would be realigned to straighten the curves. The realigned roadway would meet standards for an 80 mph design speed and completely avoids all avalanche areas. At Resort

Creek, single-span bridges would be built to span the active channel migration zone. Based on preliminary January 2003 estimates, the cost to complete Alternative 1 would be $467 million.

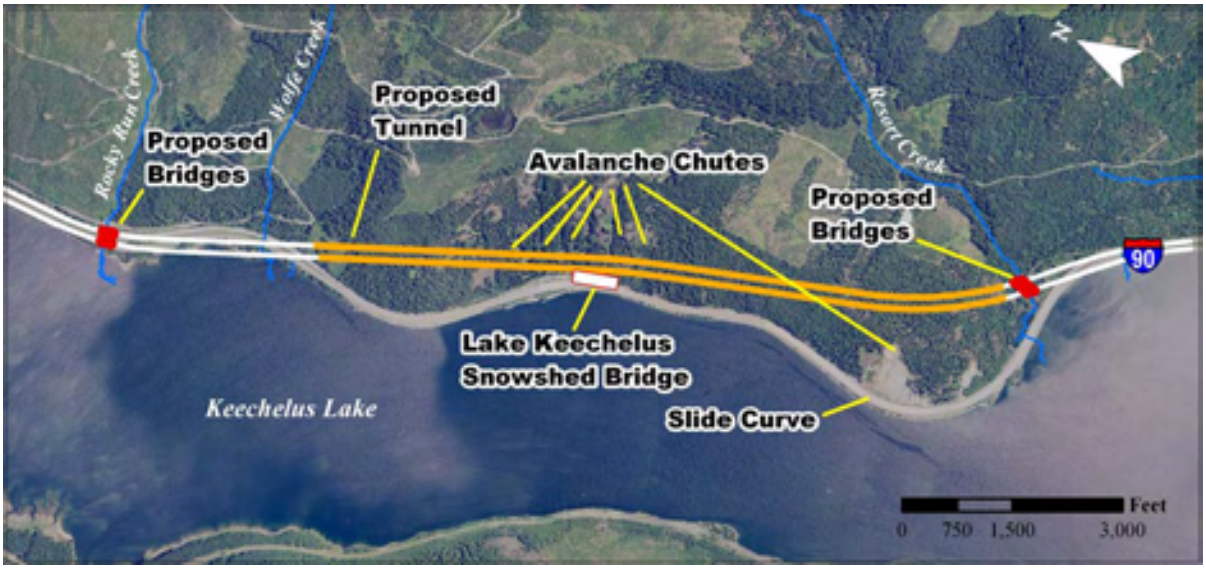

Figure 5-1. Keechelus Lake Alignment Alternative 1

Alternative 2: Short Tunnels

Alternative 2 would construct twin three-lane, 0.6-mile-long tunnels through Slide Curve. West of the Lake Keechelus Snowshed Bridge, the road would cut into the hillside to straighten out the "S" curve between Rocky Run Creek and the Lake Keechelus Snowshed Bridge. In the vicinity of the Lake Keechelus Snowshed Bridge, bridges would be constructed over Keechelus Lake so that avalanches could pass underneath them. This alignment would meet standards for a 70 mph design speed. Single-span bridges would be built to span the active channel migration zone at Resort Creek. Based on preliminary January 2003 estimates, the cost to complete Alternative 2 would be $311 million.

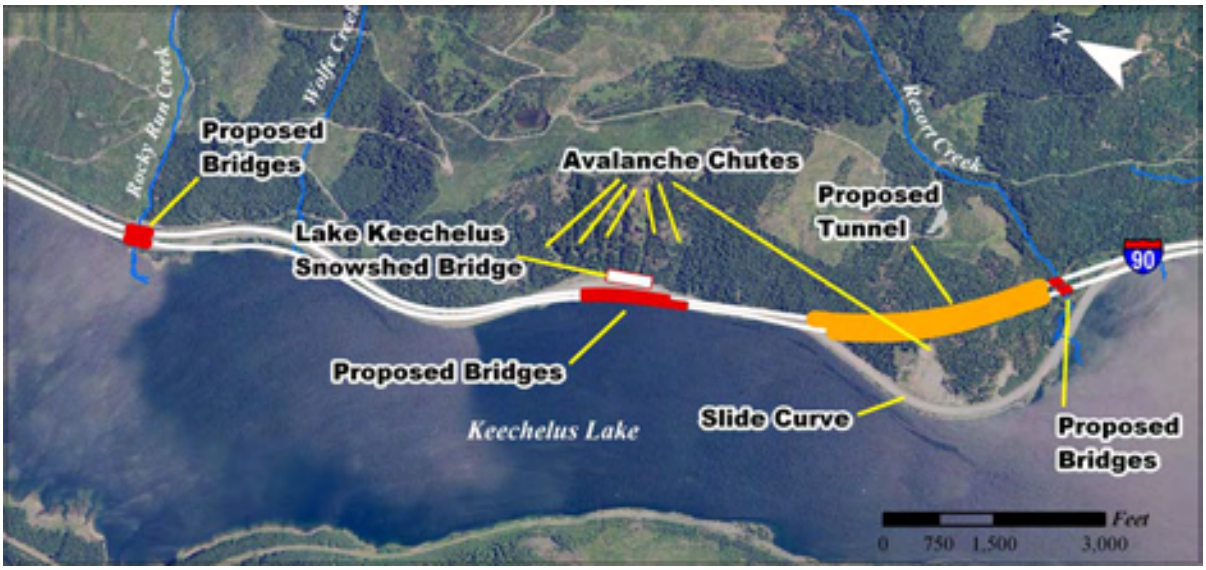

Figure 5-2. Keechelus Lake Alignment Alternative 2

Alternative 3: Short Tunnel Westbound, No Tunnel Eastbound

Alternative 3 would construct a westbound three-lane, 0.6-mile-long tunnel through Slide Curve and would construct the eastbound lanes along the shoreline around Slide Curve west of the Lake Keechelus Snowshed Bridge. The road would cut into the hillside to straighten out the "S" curve between Rocky Run Creek and the Lake Keechelus Snowshed Bridge. In the vicinity of the Lake Keechelus Snowshed Bridge, bridges would be constructed over Keechelus Lake so that avalanches could pass underneath them. At the west end of Slide Curve, on the eastbound lanes only, a small bridge would be constructed. Westbound lanes would meet standards for a 70 mph design speed, and eastbound lanes would meet standards for a 60 mph design speed. At Slide Curve, snow retention fences would be used on avalanche paths above the eastbound lanes to prevent most avalanches from starting. At Resort Creek, a single-span bridge would be constructed on the westbound lanes, and a series of bottomless culverts would be constructed on the eastbound lanes. Based on preliminary January 2003 estimates, the cost to complete Alternative 3 would be $241 million.

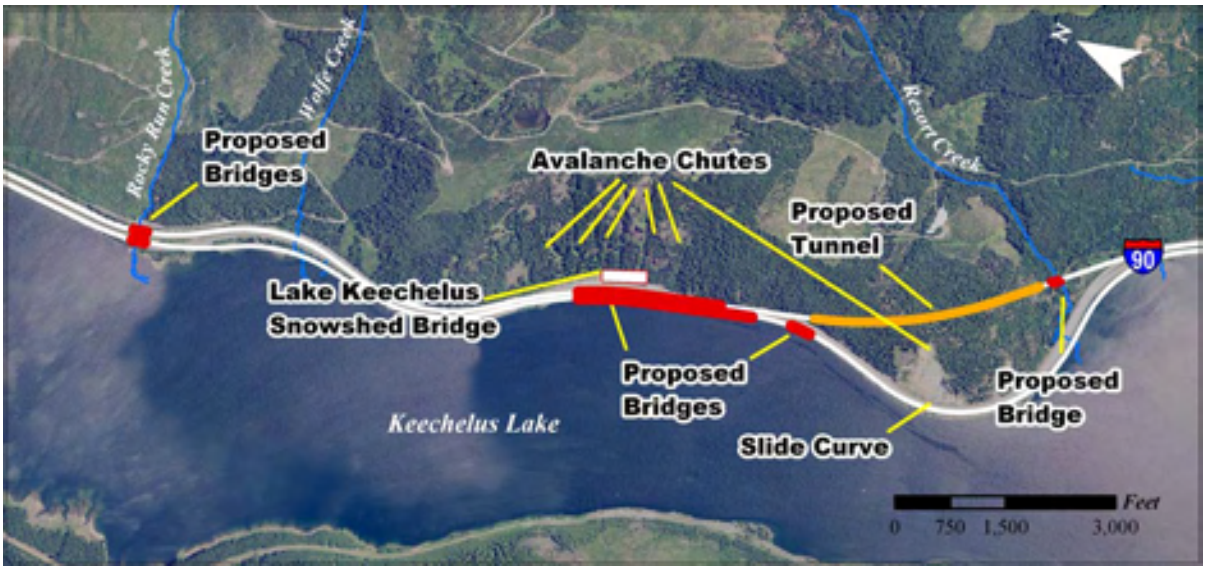

Figure 5-3. Keechelus Lake Alignment Alternative 3

Alternative 4: Both Directions of Traffic Along Keechelus Lake Around Slide Curve

Alternative 4 would construct the roadway to move both directions of traffic around Slide Curve and would meet standards for a 60 mph design speed. West of the Lake Keechelus Snowshed Bridge, the road would cut into the hillside to straighten out the "S" curve between Rocky Run Creek and the Lake Keechelus Snowshed Bridge. An eastbound bridge, approximately 800 feet long, would be required at the west end of Slide Curve. At Slide Curve, snow retention fences would be used on avalanche paths to prevent most avalanches from starting. At Resort Creek, a series of bottomless culverts would be constructed. Based on preliminary January 2003 estimates, the cost to complete Alternative 4 would be $140 million.

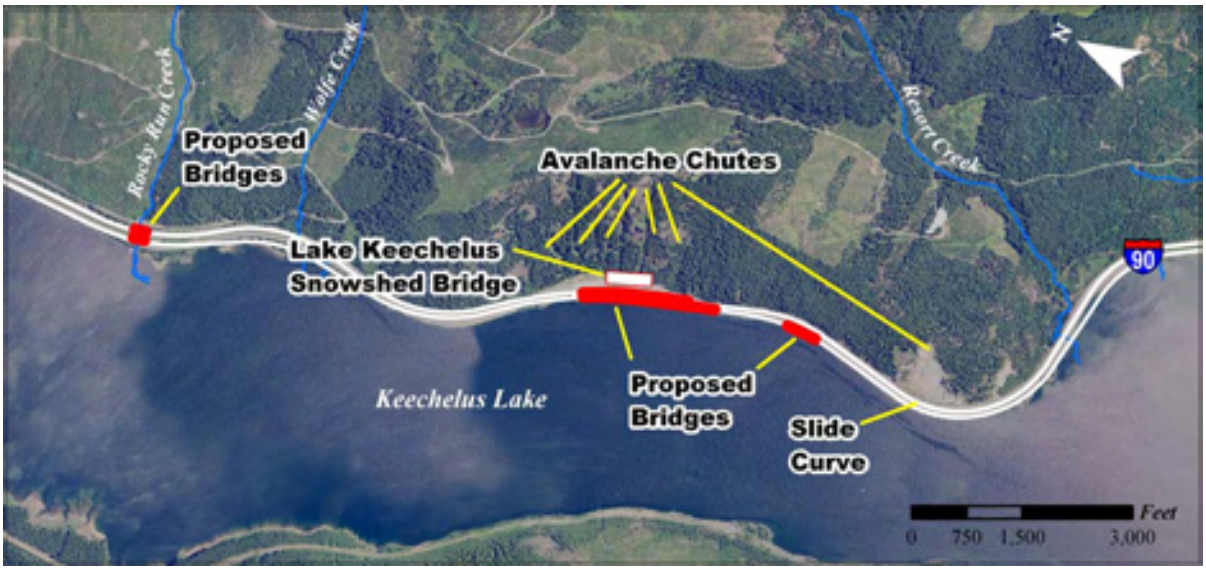

Figure 5-4. Keechelus Lake Alignment Alternative 4

5.5 Description of Section 4(f) Resources

There are publicly owned parks, publicly owned recreation sites, and significant historic sites within the project area (see **Figure 5-5**). Significant historic sites are considered a Section 4(f) resource if they are on or eligible for listing on the National Register of Historic Places (NRHP), and warrant preservation in place.

5.5.1 Publicly Owned Parks

- **Iron Horse State Park:** The Iron Horse State Park is a 1,612-acre park that was once part of the Chicago-Milwaukee-St. Paul-Pacific Railroad. The Iron Horse State Park has more than 100 miles of trail, and provides opportunities for hiking, biking, horseback riding, and winter sports, with an annual average of 90,000 users. It is accessible from Exit 62 and is located to the south of I-90. Washington State Parks and Recreation Commission (WSPRC) administers the Iron Horse State Park. Since it is located more than ½ mile from the project area, the Iron Horse State Park would not be affected.

- **Lake Easton State Park:** The Lake Easton State Park is a 516-acre park, with campgrounds and a boat launch, and provides access to the John Wayne Pioneer Trail, with an annual average of 212,400 users. During the winter, it is managed as the Lake Easton Sno-park, providing access to snowmobile, dog sled, and snowshoe trails, and cross-country skiing. It is accessible from Exit 70, and is located to the north and south of I-90. WSPRC administers the Lake Easton State Park, and a Washington State Sno-park permit is required to park in this area during the winter.

- **Crystal Springs Campground:** The Crystal Springs Campground is an 8-acre campground and provides opportunities for picnicking, fishing, berry picking, mushrooming, and mountain biking, with an annual average of 2,000 users. It is accessible from Exit 62 and is located to the south of I-90. The United States Forest Service (USFS) administers the Crystal Springs Campground, and a Northwest Forest Pass is required to park. The USFS has allocated existing and potential developed recreation sites as RE-1 in the 1990 *Wenatchee National Forest Land and Resource Management Plan*, as amended by the 1994 *Northwest Forest Plan Record of Decision*. The USFS then determines whether a RE-1 site should be provided protection as a Section 4(f) resource on a case-by-case basis. The USFS has allocated the Crystal Springs Campground as a developed recreation site (RE-1), and the USFS has determined that the Crystal

Springs Campground should be provided protection as a Section 4(f) resource.

- **Gold Creek Pond Picnic Area:** The Gold Creek picnic area contains a 15-acre spring-fed pond, and provides opportunities for nature viewing and wildlife viewing, with an annual average of 7,000 users. It is accessible from Exit 54 and is located to the north of I-90. The USFS administers the Gold Creek Pond picnic area, and a Northwest Forest Pass is required to park. The USFS has allocated the Gold Creek Pond picnic area as a developed recreation site (RE-1), and the USFS has determined that the Gold Creek Pond picnic area should be provided protection as a Section 4(f) resource. Since it is located more than ½ mile from the project area, the Gold Creek Pond picnic area would not be affected.

- **Kachess Lake Campground:** The Kachess Lake Campground is a 92-acre campground with a boat launch, and provides opportunities for hiking, fishing, swimming, berry picking, and picnicking, with an annual average of 23,000 users. It is accessible from Exit 62; the USFS administers the Kachess Lake Campground, and a Northwest Forest Pass is required to park. The USFS has allocated the Kachess Lake Campground as a developed recreation site (RE-1), and the USFS has determined that the Kachess Lake Campground should be provided protection as a Section 4(f) resource. Since it is located more than ½ mile from the project area, the Kachess Lake Campground would not be affected.

5.5.2 Publicly Owned Recreation Sites

- **John Wayne Pioneer Trail:** The John Wayne Pioneer Trail follows the former roadbed of the Chicago-Milwaukee-St. Paul-Pacific Railroad across two-thirds of Washington, from the western slopes of the Cascade Mountains to the Idaho border. The 100-mile portion from Cedar Falls near North Bend to the Columbia River near Vantage is managed as the Iron Horse State Park. The trail is used for hiking, biking, horseback and wagon riding, snowmobiling, dog sledding, and cross-country skiing, with an annual average of 90,000 users. The northern trailhead to the John Wayne Pioneer Trail is accessible from Exit 54, and the southern trailhead is accessible from Exit 62. The John Wayne Pioneer Trail is located to the south of I-90. WSPRC administers and maintains the John Wayne Pioneer Trail. Since it is located more than ½ mile from the project area, the John Wayne Pioneer Trail would not be affected.

- **Keechelus Lake Boat Launch:** Keechelus Lake has 2,560 water-surface acres and provides recreational water sports opportunities, with an annual average of 5,000 users. The Keechelus Lake boat

launch is accessible from Exit 54, and is located to the south of and on the opposite shoreline from I-90. The USFS administers the Keechelus Lake boat launch. The USFS has allocated the Keechelus Lake boat launch as a developed recreation site (RE-1), and the USFS has determined that the Keechelus Lake boat launch should be provided protection as a Section 4(f) resource. Since it is located more than ½ mile from the project area, the Keechelus Lake boat launch would not be affected.

- **Kachess Lake Boat Launch:** Kachess Lake has 4,535 water-surface acres and provides recreational water sports opportunities, with an average of 11,000 users. The Kachess Lake boat launch is accessible from Exit 62, and the USFS administers the Kachess Lake boat launch. The USFS has allocated the Kachess Lake boat launch as a developed recreation site (RE-1), and the USFS has determined that the Kachess Lake boat launch should be provided protection as a Section 4(f) resource. Since it is located more than ½ mile from the project area, the Kachess Lake boat launch would not be affected.

- **Gold Creek Sno-park:** During the winter, a portion of Forest Service Road 4832 is managed as the 2.2-acre Gold Creek Sno-park, providing access to winter recreation trails. Visitor use numbers are not gathered for this area. The Gold Creek Sno-park is accessible from Exit 54 and is located to the north of I-90. The USFS administers the Gold Creek Sno-park, and a Washington State Sno-park permit is required to park in this area. The USFS has allocated the Gold Creek Sno-park as a developed recreation site (RE-1), and the USFS has determined that the Gold Creek Sno-park should be provided protection as a Section 4(f) resource.

- **Hyak Sno-park:** The Hyak Sno-park is approximately 10 acres and is managed during the winter as a parking lot that provides access to cross country skiing, snowshoe and dog sled trails, and sledding, with an annual average of 50,000 users. In the summer, the Hyak Sno-park provides opportunities for hiking, horseback riding, and bicycling, and provides access to the John Wayne Pioneer Trail. The Hyak Sno-park is accessible from Exit 54, and WSPRC administers the Hyak Sno-park. Since it is located more than ½ mile from the project area, the Hyak Sno-park would not be affected.

- **Cabin Creek Sno-park:** The Cabin Creek Sno-park is 3.8 acres and is managed during the winter as a parking lot that provides access to cross country skiing, with an annual average of 14,000 users. The Cabin Creek Sno-park is accessible from Exit 63 and is located to the south of I-90. The USFS administers the Cabin Creek Sno-park, and a Washington State Sno-park permit is required to park in this area.

The USFS has allocated the Cabin Creek Sno-park as a developed recreation site (RE-1), and the USFS has determined that the Cabin Creek Sno-park should be provided protection as a Section 4(f) resource.

- **Kachess Lake Sno-park:** The Kachess Lake Sno-park is 1 acre and is managed during the winter as a parking lot that provides access to snowmobiling trails. The Kachess Lake Sno-park is accessible from Exit 62, and the USFS administers the Kachess Lake Sno-park. The USFS has allocated the Kachess Lake Sno-park as a developed recreation site (RE-1), and the USFS has determined that the Kachess Lake Sno-park should be provided protection as a Section 4(f) resource. Since it is located more than ½ mile from the project area, the Kachess Lake Sno-park would not be affected.

5.5.3 Significant Historic Sites

- **Lake Keechelus Snowshed Bridge:** WSDOT is the owner of the Lake Keechelus Snowshed Bridge, which is located within the existing I-90 right-of-way (ROW) at approximately MP 58 and occupies only the westbound lane of I-90. The Lake Keechelus Snowshed Bridge is approximately 500 feet long, and was constructed between 1950 and 1951. The Lake Keechelus Snowshed Bridge was listed on the NRHP in 1995.

- **Prehistoric Site 45KT2196:** Prehistoric Site 45KT2196 is a prehistoric campsite located within the boundaries of Lake Easton State Park and south of the old U.S. 10 roadway. Prehistoric Site 45KT2196 is eligible for NRHP listing. Since the project would be constructed north of the U.S. 10 roadway, Prehistoric Site 45KT2196 would not be affected.

- **Historic Site 03-23:** Historic Site 03-23 is the Keechelus Dam Construction Camp located southeast of the Keechelus Dam, and was built between 1912 and 1914. Historic Site 03-23 is eligible for NRHP listing.

- **Historic Site 03-550 (Rocky Run Summer Home Tract, Lot 2):** Historic Site 03-550 is a privately owned recreation cabin constructed in 1949 located north of Forest Service Road (FSR) 4832. Historic Site 03-550 is eligible for NRHP listing. Since the project would be constructed south of FSR 4832, Historic Site 03-550 would not be affected.

- **Historic Site 03-552 (Rocky Run Summer Home Tract, Lot 6):** Historic Site 03-552 is a privately owned recreation cabin constructed in 1944 located north of FSR 4832. Historic Site 03-552

is eligible for NRHP listing. Since the project would be constructed south of FSR 4832, Historic Site 03-552 would not be affected.

- **Historic Site 03-555 (Rocky Run Summer Home Tract, Lot 10):** Historic Site 03-555 is a privately owned recreation cabin constructed in 1949 located north of FSR 4832. Historic Site 03-555 is eligible for NRHP listing. Since the project would be constructed south of FSR 4832, Historic Site 03-555 would not be affected.

5.5.4 Other Publicly Owned Recreation Sites

- **Price Creek Sno-park:** The Price Creek Sno-park, which is accessible from Exit 62, was originally designated by WSDOT as a future rest area that would be developed in the I-90 ROW. After the property was designated for this purpose, WSDOT and the USFS entered into negotiations to jointly develop the area as a rest area and Sno-park; however, a Memorandum of Understanding was never signed. Due to difficulties in providing utilities and water availability, WSDOT did not develop the rest area, and the parking lot is used as an unofficial Sno-park even though the property is within the I-90 ROW and designated for future transportation purposes. The provisions of Section 4(f) would not come into play for the Price Creek Sno-park since this property has been designated for future transportation purposes.

- **Cabin Creek Ski Area and Nordic Track:** The Cabin Creek ski area and Nordic track provides 6.9 miles of Nordic skiing trails, and portions of these trails are used in the summer for biking and hiking, with an annual average of 14,000 users. It is located both north and south of I-90 between Exit 62 and Exit 63, and WSPRC grooms and maintains the trails. The USFS administers the Cabin Creek ski area for multiple uses, but did not allocate the Cabin Creek ski area and Nordic track as a developed recreation site (RE-1). Therefore, the provisions of Section 4(f) would not come into play for the Cabin Creek ski area and Nordic track.

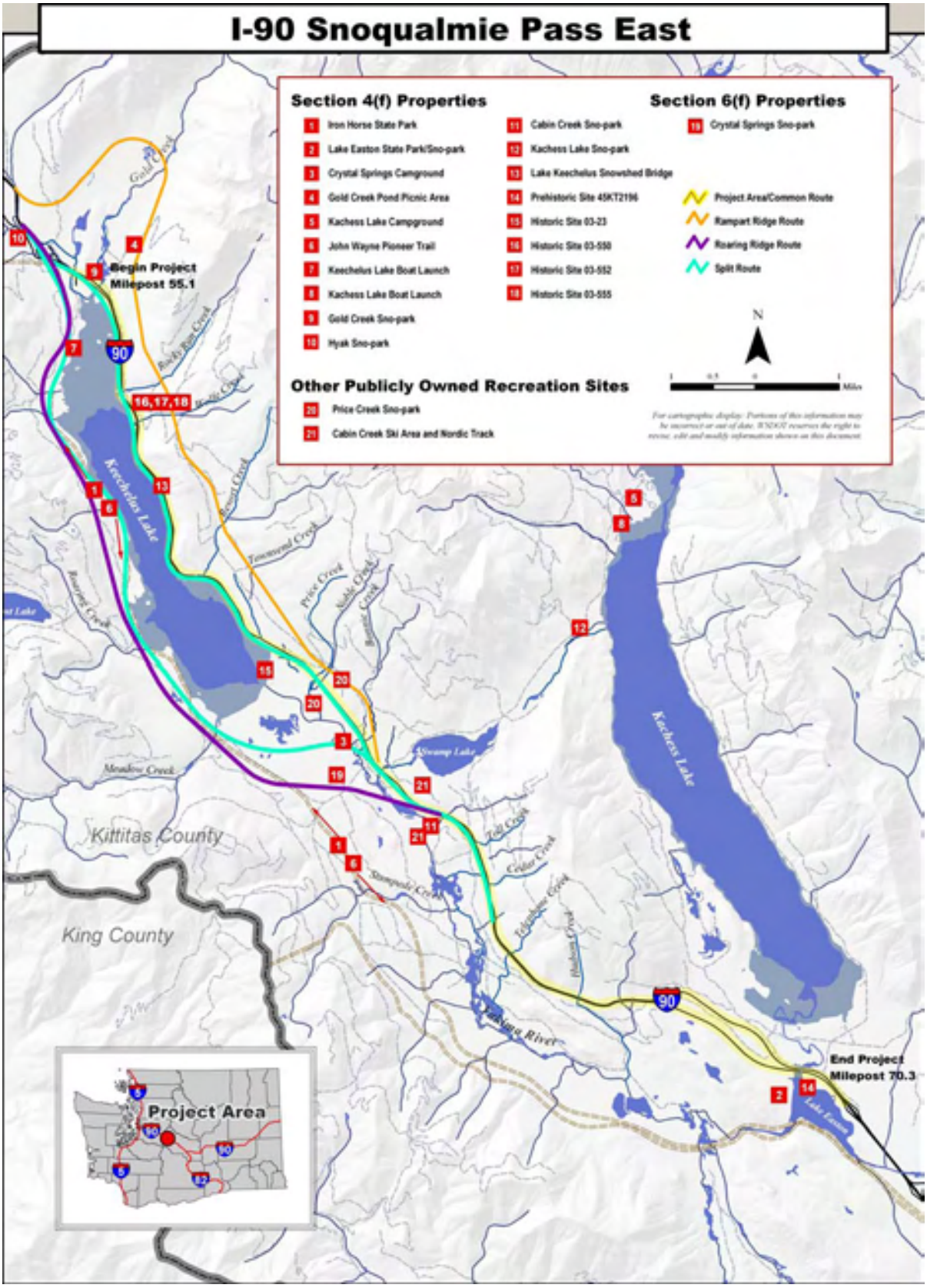

Figure 5-5. Section 4(f) and Section 6(f) Properties

5.6 Avoidance Alternatives

Under Section 4(f), the evaluation must consider alternatives that completely avoid the use of Section 4(f) resources. If FHWA determines that the "avoidance alternatives" are not feasible and prudent, no further evaluation for Section 4(f) is required.

5.6.1 No-Build Alternative

The No-Build Alternative does not include any new lanes, related capacity improvements, or connectivity improvements. No impacts to cultural resources are expected under this alternative. Resources on federal lands would continue to be managed in compliance with Section 106 of the National Historic Preservation Act (NHPA) and agency regulations.

The No-Build Alternative would not correct the project's safety deficiencies or address other improvement needs, and is not considered prudent.

5.6.2 The Limited Construction Alternative

The Limited Construction Alternative solely addresses the capacity element of the project need, but it does not address safety, delays due to avalanches, and wildlife crossing needs of the project.

Transportation System Management (TSM) and Transportation Demand Management (TDM) strategies typically are most effective in urban environments where population exceeds 200,000, different modal options exist, and specific travel patterns (i.e., commuting) can be targeted. These transportation characteristics do not exist within the project area.

Implementation of these strategies is expected to continue into the future. However, combinations of these strategies cannot fully address the purpose and need of the project as stand-alone alternatives since these strategies only address transportation demand and capacity issues. TDM/TSM strategies cannot address safety, connectivity, or other key elements of the project's purpose and need. Applicable TSM/TDM strategies (e.g., incident management, traveler information, enhanced enforcement, and winter storm traffic metering) would be implemented, together with any alternative to maximize the efficiency of the system.

Strategies to improve the private freight rail system to carry more freight or to subsidize freight rail to reduce truck volumes on I-90 have also been suggested. Neither of these strategies would reduce volumes enough to meet future traffic demands on I-90. If all of the trucks using I-90 were shifted to rail in the design year 2025, the freeway would operate at Level of Service (LOS) D, which falls below the capacity objective.

Although implementing the Limited Construction Alternative is feasible, limiting the I-90 improvements to it would not be prudent because the Limited Construction Alternative does not meet the purpose and need of the project to improve public safety and meet projected traffic volumes.

5.6.3 Rampart Ridge Route

The Rampart Ridge alternative would construct a new six-lane highway where none previously existed, and would generate additional direct and indirect environmental impacts when compared to alternatives that use more of the existing footprint. In addition, operational and maintenance problems would be created from avalanches and rockfall. While reclaiming the existing highway's footprint would be required, it is highly unlikely that the landscape could be restored to pre-highway conditions, and a net loss of natural resources would occur.

The Rampart Ridge Route is not feasible and prudent due to environmental impacts, engineering difficulties and costs, and maintenance concerns.

5.6.4 Roaring Ridge Route

The Roaring Ridge alternative would construct a new six-lane highway where none previously existed, and would generate additional direct and indirect environmental impacts when compared to alternatives that use more of the existing footprint. This alternative would include: acquiring lands within the ROW and noise level increases at the Iron Horse State Park, a Section 4(f) resource; displacing the Crystal Springs Campground, a Section 4(f) resource; and displacing a portion of the John Wayne Pioneer Trail, a Section 4(f) resources. In addition, operational and maintenance problems would be created from avalanches and rockfall. While reclaiming the existing highway's footprint would be required, it is highly unlikely that the landscape could be restored to pre-highway conditions, and a net loss of natural resources would occur.

Although the Roaring Ridge Route is feasible, it is not prudent due to predicted environmental impacts and impacts to Section 4(f) resources.

5.6.5 Split Route

The Split Route alternative would construct new lanes where none previously existed, and would create additional direct and indirect environmental impacts when compared to alternatives that utilize more of the existing footprint. This alternative would require acquiring lands within the ROW of the Iron Horse State Park, a Section 4(f) resource. In addition, operational and maintenance problems would be created from avalanches and rockfall. While reclaiming the existing highway's footprint would be required, it is

highly unlikely that the landscape could be restored to pre-highway conditions, and a net loss of natural resources would occur.

Although the Split Route is feasible, it is not prudent due to predicted environmental impacts and impacts to Section (f) resources.

5.6.6 Common Route

The Common Route would reconstruct I-90 in its existing vicinity, and 80 percent to 100 percent of the existing alignment would be used. The following Section 4(f) resources are immediately adjacent to I-90, but they would be avoided since construction would occur within the existing highway ROW:

- Lake Easton State Park
- Crystal Springs Campground
- Gold Creek Sno-park
- Cabin Creek Sno-park
- Historic Site 03-23

Within the Common Route, the Keechelus Lake Alignment Alternatives use tunnels or bridges to bypass the Lake Keechelus Snowshed Bridge (see **Figure 5-6**) and the avalanche-prone Slide Curve area. The following section discusses how the Keechelus Lake Alignment Alternatives avoid the Lake Keechelus Snowshed Bridge.

Figure 5-6. Lake Keechelus Snowshed Bridge (Eastbound View)

5.6.6.1 KEECHELUS LAKE ALIGNMENT ALTERNATIVE 1

Tunnels would be used to bypass the Lake Keechelus Snowshed Bridge and the Slide Curve area (see **Figure 5-1**), and the Lake Keechelus Snowshed Bridge would be abandoned in place. Because of safety concerns since it is located within an avalanche zone, no further use of the Lake Keechelus Snowshed Bridge is planned. The roadway leading to the Lake Keechelus Snowshed Bridge will likely be reclaimed and revegetated as mitigation for project impacts.

Within the last 25 years, the Lake Keechelus Snowshed Bridge has not required any maintenance in order for it to maintain its structural or historic integrity. Since the proposed alternative avoids the Lake Keechelus Snowshed Bridge and abandoning it in place will not substantially diminish its historic integrity, there will be no Section 4(f) use of the historic Lake Keechelus Snowshed Bridge.

5.6.6.2 KEECHELUS LAKE ALIGNMENT ALTERNATIVES 2, 3, AND 4

Bridges over Keechelus Lake would be used to avoid the Lake Keechelus Snowshed Bridge (see **Figures 5-2**, **5-3**, and **5-4**), and the Lake Keechelus Snowshed Bridge would be abandoned in place. Because of safety concerns since it is located within an avalanche zone, no further use of the Lake Keechelus Snowshed Bridge is planned. The roadway leading to the Lake Keechelus Snowshed Bridge will likely be reclaimed and revegetated as mitigation for project impacts.

Within the last 25 years, the Lake Keechelus Snowshed Bridge has not required any maintenance in order for it to maintain its structural or historic integrity. Since the proposed alternatives avoid the Lake Keechelus Snowshed Bridge and abandoning it in place will not substantially diminish its historic integrity, there will be no Section 4(f) use of the historic Lake Keechelus Snowshed Bridge.

5.7 Description of Section 6(f) Properties

Section 6(f) of the 1964 Land and Water Conservation Funds Act lists the conversion requirements and prohibitions for lands purchased through the Land and Water Conservation fund state-matching program. This statute applies to all projects with impacts on recreational lands purchased or improved with Land and Water Conservation funds or funding programs administered by the Interagency Committee for Outdoor Recreation. The project area was reviewed to determine whether there were any Section 6(f) properties and to provide an analysis of potential impacts resulting from this project.

One state park site within the project area has received funding through programs administered by the Interagency Committee for Outdoor Recreation. These projects include acquiring (project number 93-858) and developing (project number 96-1266) the Crystal Springs Sno-park facility (see **Figure 5-5**), which is considered to be protected under the provisions of Section 6(f). WSPRC administers this site, and a Washington State Sno-park permit is required to park in this area.

5.8 Impacts on Section 6(f) Properties

The Common Route would not have a permanent or a constructive use of the Crystal Springs Sno-park, a Section 6(f) resource, assuming that road widening could be accomplished within the existing ROW. However, during non-winter months, this area may be temporarily used as a stockpile and/or staging area during construction of the I-90 corridor improvements.

5.9 Measures to Minimize Harm

Under the Keechelus Lake Alignment Alternatives, the Lake Keechelus Snowshed Bridge, a Section 4(f) resource, is avoided and would be abandoned in place. Leaving the Lake Keechelus Snowshed Bridge in place would not interfere with construction of the proposed alignment. Other measures to minimize harm may be added during development of the Section 106 Memorandum of Agreement, and these measures will be documented in the Memorandum of Agreement.

5.10 Coordination

The following agencies and individuals were interviewed or involved to provide up-to-date information on Section 4(f) resources in the study area:

- Roger Skistad, recreational planner, Wenatchee National Forest
- Steve Johnson, program manager, Wenatchee National Forest
- Floyd Rogalski, natural resource core team manager, Wenatchee National Forest
- Dave Redmond, recreational planner, Mount Baker-Snoqualmie National Forest
- Tim Schmidt, park area manager, Lake Easton and Iron Horse State Park
- Colleen Hawley, park ranger, Lake Easton State Park

- Keith Wersland, park ranger, Iron Horse State Park
- Brian Hovis, parks planner, Washington State Parks and Recreation Commission
- Marguerite Austin, recreation project manager, Interagency Committee for Outdoor Recreation, Recreation and Habitat Section
- Charlie Raines, director, Sierra Club Cascade Checkerboard Project
- Jeff Eustis, Kongsberger Ski Club member

This Section 4(f) Evaluation is being distributed to the following managers of Section 4(f) properties in the project area for their review, comment, and concurrence:

- USFS
- United States Department of the Interior
- National Park Service
- WSPRC
- Colville Confederated Tribes
- Muckleshoot Tribe
- Snoqualmie Tribe
- Tulalip Tribes
- Wanapum Tribe
- Yakama Nation