

5.2 TRAFFIC AND TRANSPORTATION

WAC 463-42-372 Built Environment—Transportation.

(1) Transportation systems - *The applicant shall identify all permanent transportation facilities impacted by the construction and operation of the energy facilities, shall identify the nature of the impacts, and shall identify the methods to mitigate impacts. Such impact identification, description, and mitigation shall, at least, take into account the following:*

- (a) Expected traffic volumes during construction, based on where the work force is expected to reside;*
- (b) Access routes for moving heavy loads, construction materials, or equipment;*
- (c) Expected traffic volumes during normal operation of the facility;*
- (d) For transmission facilities, anticipated maintenance access; and*
- (e) Consistency with local comprehensive transportation plans.*

(2) Vehicular traffic - *The applicant shall describe existing roads and shall estimate volume, types, and routes of vehicular traffic that will arise from construction and operation of the facility. The applicant shall indicate the applicable standards to be utilized in improving existing roads and in constructing new permanent or temporary roads or access and shall indicate the final disposition of new roads or access and identify who will maintain them.*

(3) Waterborne, rail, and air traffic - *The applicant shall describe existing railroads and other transportation facilities and indicate what additional access, if any, will be needed during planned construction and operation. The applicant shall indicate the applicable standards to be utilized in improving existing transportation facilities and in constructing new permanent or temporary access facilities, and shall indicate the final disposition of new access facilities and identify who will maintain them.*

(4) Parking - *The applicant shall identify existing and any additional parking areas or facilities that will be needed during construction and operation of the energy facility and shall identify plans for maintenance and runoff control from the parking areas or facilities.*

(5) Movement/circulation of people or goods - *The applicant shall describe any change to the current movement or circulation of people or goods caused by construction or operation of the facility. The applicant shall indicate consideration of multipurpose utilization of rights of way and describe the measures to be employed to utilize, restore, or rehabilitate disturbed areas. The applicant shall describe the means proposed to ensure safe utilization of those areas under the applicant's control on or in which public access will be granted during project construction, operation, abandonment, termination, or when operations cease.*

(6) Traffic Hazards - *The applicant shall identify all hazards to traffic caused by construction or operation of the facility. Except where security restrictions are imposed by the federal government the applicant shall indicate the manner in which fuels and waste products are to be transported to and from the facility, including a designation of the specific routes to be utilized.*

5.2.1 Existing Conditions

The region within which the Project is located is a rural area with low population density in Kittitas County, Washington between the cities of Cle Elum to the west and Ellensburg to the southeast. The main study area has a triangular shape, bound by State Route 970 in the north, I-90 in the south, and US 97 in the east. The study area also includes roads maintained by Kittitas County such as Bettas Road and Hayward Road. Most of the public roads within the region are paved county roads, with a few state routes traversing the area. The remaining public road system is comprised of county roads that have bituminous pavement, gravel, or unimproved dirt. Exhibit 17-1, 'Project Site and Surrounding Roadway Network', illustrates the locations of the Project's main transportation routes.

5.2.1.1 Street Network

Two kinds of roads are involved in constructing the Project: transporter routes and turbine site access roads. Transporter routes are roads used to bring in equipment, materials and manpower from outside of the Project study area to the Project site. Transporter routes include state and county roads within the study area, as well as existing private roads and newly constructed roads. Site access roads are gravel surfaced roads that run between the individual turbines, and are described in Section 2.3.2, 'Roads and Civil Construction Work'. The site access roads connect to the transporter route. There is currently one main transporter route that will provide access to the site.

I-90 is an interstate highway and the main Project access heading east from the Port of Seattle to the Project site. I-90 has posted speed limits of 60 miles per hour (mph) in urban areas and 70 mph in rural areas. The 70 mph designation begins east of Issaquah. From I-90, US 97 (north of I-90) will be the next leg on the transporter route. US 97 has a posted speed limit that ranges between 40- to 65 mph and is a two-lane, north-south roadway with 4- to 8-foot-wide asphalt shoulders between I-90 and State Route 970. There are no sidewalks on this road, which is classified as a rural-principal arterial, according to the WSDOT road classification system. US 97 is also classified as having rolling terrain, causing trucks to slow down frequently. US 97 provides access to and across Blewett Pass in the north. From US 97, Kittitas County roads that will be used include Bettas Road, (between US 97) and the northern portion of Hayward Road above the KRD canal bridge (which branches off of Bettas Road). These roads only provide local access. Bettas Road is a two-lane, north-south paved roadway that branches off of US 97 approximately 10 miles north of the I-90 interchange. Hayward Road, which will also be utilized for transport, is a two-lane, north-south gravel road that branches off of Bettas Road to the south.

5.2.1.2 Traffic Patterns and Volumes

Table 5.2.1.2-1 shows the average daily traffic (ADT) volumes on roadways in the study area between 1997 and 2001. These volumes are based on available traffic data from WSDOT. US 97 varies as it runs north from a fairly urban setting near I-90 to a much more rural setting near Bettas Road. Therefore, traffic was analyzed in two different sections where data was available from WSDOT. The first 2 mile section immediately north of I-90 represents US 97 in an urban setting and is referred to as US 97 (North of I-90). The 2 mile section immediately before the intersection of Bettas Road represents a rural setting and is referred to as US 97 (South of Bettas Road).

**Table 5.2.1-1
Average Daily Traffic (ADT) Volumes and Estimated Percent Trucks**

Roadway	1997 ADT	1998 ADT	1999 ADT	2000 ADT	2001 ADT	Estimated % Truck
I-90 (West of US 97)	22,000	23,000	23,000+	22,000+	22,000	20
US 97 (N. of I-90)	2,500	2,600	2,800	2,800	2,800	N/A
US 97 (S. of Bettas Rd.)	2,000	2,100	2,200	2,200	2,200	26
Bettas Road	N/A	N/A	43	36	26	N/A
Hayward Road	N/A	N/A	N/A	29	24*	N/A

ADT = Average daily traffic.

N/A = Not available.

+ 1999 and 2000 ADT for I-90 estimated.

* 2001 ADT for Hayward Road estimated.

Sources: Washington State Department of Transportation, 2000, 2001. Kittitas County Public Works.

5.2.1.3 Truck Volumes and Routes, Weight and Load Limitations

The Kittitas County road network would comprise the primary public haul routes used in the construction of the Project. The regulatory framework for transportation in Kittitas County consists of program and project planning, design standards related to roadway geometry and paving materials, load limits for bridges, and weight limits or closures under defined circumstances. Kittitas County roads are designed to sets of standards with respect to paving materials and methods, and with respect to roadway geometry and design. All new road construction in the County must be in accordance with the current edition of WSDOT's "Standard Specifications for Road & Bridge Construction." Kittitas County Road Standards state the minimum requirements for road construction in the County.

Kittitas County Code 10.28 specifies load and weight restrictions on Kittitas County roads during load sensitive periods. It also authorizes the county engineer to issue emergency permits for the operation of vehicles exceeding the allowable gross load.

Along the Transporter Route, there is a restricted bridge on I-90. This is the Cle Elum River Bridge. This bridge is height restricted only in the westbound direction and thus will not cause problems for loaded trucks carrying oversize equipment eastbound on I-90 to the Project site. Besides this bridge, there are no other weight and load limits on any of the roads in the vicinity of the Project site.

The Cle Elum and Ellensburg School Districts indicate that their buses use US 97 and some stop on the route where shoulders are provided. Given that construction-related traffic is not anticipated to increase total truck volume along the highways by more than 15% over the current level and this increase will be for a short period, it is not expected to cause problems for school bus service in the area.

5.2.1.4 Existing Roadway Levels of Service

To analyze the traffic conditions, ADT data from WSDOT and the County were used to determine a level of service (LOS) for each of the roadways. LOS is a qualitative measure describing operational conditions in a traffic stream, and motorists' or passengers' perceptions of those conditions. A LOS definition generally describes these conditions in terms of speed and travel time, freedom to

maneuver, traffic interruptions, comfort, convenience, and safety. There are six LOS classifications, each given a letter designation from A to F.

LOS A represents the best operating conditions and LOS F represents the worst. A conservative estimate of 10 percent of the ADT volume is used to estimate the peak hour volumes.

LOS was determined on the basis of the most current Highway Capacity Manual (HCM) (Transportation Research Board Special Report 209, 2000). Daily volumes represent the estimated 2001 ADTs in both directions of travel.

To determine the LOS for selected roadways in the study area, daily traffic capacity was determined by estimating capacities obtained from the HCM. Daily traffic volumes were compared with these capacities to determine volume-to-capacity ratios, which were used to calculate the existing LOS. Table 5.2.1-2 summarizes the existing roadway traffic conditions in the Project vicinity and includes existing roadway classification, number of lanes, daily volume, design capacity, peak-hour volume, and LOS.

**Table 5.2.1-2
2001 Conditions of Affected Roadways**

Roadway	Classification	No. of Lanes	Average Daily Volume	(a) Hourly Design Capacity	(b) PM Peak Hour Volume	PM Peak Hour LOS
I-90 (W. of US 97)	Rural-Interstate	4	22,000	6,020	2,200	C
US 97 (N. of I-90)	Rural-Principal Arterial	2	2,800	2,800	280	C
US 97 (S. of Bettas Rd.)	Rural-Principal Arterial	2	2,200	2,800	220	C
Bettas Road	County Road	2	26	2,800	3	B
Hayward Road	County Road	2	24	2,800	3	B

a) Maximum number of vehicles per hour in both directions for LOS E.

b) Peak hour volumes estimated at 10% of ADT.

LOS = Level of service.

The overall LOS for the current roadways surrounding the proposed Project site prior to construction is LOS C, which represents generally smooth traffic operating conditions. Individual users feel unrestricted by the presence of others in the traffic stream.

5.2.1.5 Existing Intersection Level of Services

Existing intersections along the Transporter Route include ramp termini at I-90 and State Route 97, and also at State Route 97 and Dolarway Road.

All intersections without traffic signals are expected to operate at LOS C or better during construction due to the low existing traffic on these roadways.

5.2.1.6 Accident Rates

Accidents are generally expressed in terms of accident rate, where accident occurrence is indexed to the amount of traffic using a given roadway. For roadway segments, accident rates are computed as the number of accidents per million vehicle-miles (MVM) of travel. Table 5.2.1-3 shows an estimated number of accidents for the selected roadways based on 1996 average daily traffic volumes and multi-year accident rates. Because the most recent accident rates provided by WSDOT are from 1996, the number of accidents for 2001 had to be estimated. The accident data for 2001 in the table below was estimated from 2001 volumes and 1996 accident rates.

Roadway	Milepost	Length (mi)	(a) Accident Rate (acc/MVM)	1996		2001	
				ADT	No. of Accidents	ADT	No. of Accidents
I-90	106.06	3.28	0.80	21,000	20	22,000	21
US 97	135.38	14.31	0.60	1,900	6	2,200	7

a) 1996 Multi-year accident rate. Rate is in accidents per million vehicle-miles. Source: Washington State Department of Transportation, 1996 (Accident Report).
MVM = million vehicle-miles.

There are no records of accidents or collisions on the other roads on the Project's transporter route. Accident data on Bettas Road and Hayward Road were not collected by Kittitas County because of the extremely low average daily traffic.

The 1996 Accident Data on State Highways Report (WSDOT, 1996) indicates an average statewide accident rate of 1.48 accidents per MVM for the type of roadway corresponding to US 97 (Rural – principal arterial). The average statewide accident rate is higher than the accident rate of these roads (0.60 accidents per MVM for US 97). Similarly, the statewide average accident rate for a Rural – interstate type roadway is 0.86, which is higher than the accident rate for I-90 (0.80 accidents per MVM). Therefore, based on the average accident rates, the above roadways are not considered to have safety issues.

5.2.1.7 Future Plans and Projects

Kittitas County Department of Public Works staff stated that there are currently no construction projects planned on county roads in the Project area. Washington State DOT has also stated that there are no projects planned on the state roads in the area.

5.2.1.8 Local Comprehensive Transportation Plans

There are currently no plans for major improvements to the transportation system in Kittitas County.

5.2.1.9 Pedestrian/Bicycle Facilities

Within Kittitas County, State Route I-90 and US 97 are identified for bicycle use on the Washington Bicycle Map. Kittitas County Code 12.10 states that all roadway improvements shall include pedestrian access as part of the design unless otherwise approved by the county. There are currently no planned roadway improvements and no planned pedestrian or bicycle facilities on the roadways near the Project site.

5.2.1.10 Public Transportation

Kittitas County is primarily a rural county where the need for public transportation in or near its towns is not a high priority. The cities of Cle Elum and Ellensburg, near the vicinity of the Project site, currently do not have public transit systems. However, there is an accessible/special needs transportation program provided by the Kittitas County Action Council (KCAC) for citizens. Besides this service, Greyhound bus service is the main form of public transit between cities such as Cle Elum and Ellensburg.

5.2.1.11 Air Traffic

There are no regional or municipal airports in the vicinity of the Project site. The nearest airport is near Ellensburg, approximately 12 miles to the southeast. The Ellensburg airport does not have scheduled air service, but is limited to private and charter plane service. Small planes may use private runways at ranches or farms in the area, but the frequency of this type of use is unknown. It is not planned that any of the equipment or materials necessary for the Project operations or conduction will be transported by air to the Project site.

5.2.1.12 Rail Traffic

Burlington Northern operates an active main line between Auburn and Tri-Cities over Stampede Pass, passing through Ellensburg. Portions of the line had been inactive, until 1996 when the pass portion reopened to freight traffic. Approximately 4-10 trains traverse the route daily. It is not anticipated that any of the equipment or materials necessary for the Project operations or conduction will be transported by rail to the Project site and therefore there will be no rail traffic burden impacts.

5.2.1.13 Waterborne Traffic

Over 100 miles southeast of the Project site, the Ports of Pasco, Benton, and Kennewick have ports on the Columbia River. Grain is the major commodity using barge transportation on this stretch of the river. It is not anticipated that any of the equipment or materials necessary for the Project operations or conduction will be transported by barge or ship up the Columbia River; therefore, there will be no impact to barge or river vessel traffic.

5.2.2 Impacts of the Proposed Action

On the basis of historical ADT levels on the stated roadways, a 1 percent growth factor is assumed in establishing impacts on future background levels of traffic. This growth factor is considered reasonable because of the area's rural nature.

Local policies are aimed at keeping the public road service at or above an accepted level of service determined by the county. Roadways which will experience heavy truck traffic can be assessed on an

individual basis by the county during the Project. All of the roadways in the study boundaries currently provide LOS C or better.

Table 5.2.2-1 describes the existing and future daily peak-hour traffic volumes and LOS's without any construction traffic impacts. It is estimated that during the peak hour in 2004, all roadways in the Project vicinity will function at LOS C or better, without the Project.

**Table 5.2.2-1
Existing, Future Daily, and Peak-Hour Traffic Volumes and LOS without Project**

Roadway	No. of Lanes	Daily		Estimated Peak Hour without Project			
		2001	2004	2001	LOS	2004	LOS
I-90 (W. of US 97)	4	22,000	22,660	2,200	C	2,266	C
US 97 (N. of I-90)	2	2,800	2,884	280	C	288	C
US 97 (S. of Bettas Rd.)	2	2,200	2,266	220	C	227	C
Bettas Road	2	26	27	3	B	3	B
Hayward Road	2	24	25	3	B	3	B

LOS = Level of service.

Source: Washington State Department of Transportation, 2001.

5.2.2.1 Construction

The Applicant will construct a road system on the Project site, with site access roads between the turbines which also run to the planned access way from US 97, Bettas Road or Hayward Road. The access ways or driveway entrances off of US 97 will be constructed with the required slopes and culverts according to WSDOT and Washington State access management under Title 468 Washington Administrative Code (WAC) and Chapter 47.50 Revised Code of Washington (RCW). Driveway entrances from the county Roads (Bettas or Hayward) will be also be constructed with the appropriate slopes and culverts in accordance with Kittitas County roads department requirements for construction in the county right of way.

5.2.2.1.1 Traffic

Construction of the Project requiring the transportation of major equipment and constituting the highest amount of construction traffic will span approximately nine months. It is anticipated that the majority of the construction workers will access the site from within a 75-mile radius.

US 97 will be the primary roadway to and from the Project site. As the primary access route to the site, this roadway will likely have the greatest impact from the construction vehicles and workers. It is anticipated that the majority of the construction workforce traffic will originate from the Ellensburg and Yakima area and travel north on US 97 until reaching the junction with Bettas Road where the workers will then disperse to the various construction locations at the Project site. This is the shortest and most direct route from the major urban areas within a 75-mile radius.

Trucks will be used to deliver construction equipment and materials. Some of these trucks will have a gross vehicle weight of upwards of 105,500 pounds. Any oversize or overweight vehicles will comply with state requirements. Because the surface condition of the pavement near the Project site is built to WSDOT standards and is of good bituminous or asphalt quality, the delivery of construction materials and equipment is not expected to significantly degrade existing conditions.

The wind turbines, towers, transformers and other large equipment will be transported to the site using a semi-truck and lowboy transporter designed for heavy loads (i.e., multiple axles). The truck will deliver the equipment to the Project site. Movement of the transporter will have a short-term impact on traffic along State Route 97 and other roadways used along the Transporter Route.

Construction is anticipated to commence in October 2003 with site preparation. At the time winter weather sets in, major civil work will cease and re-commence after spring thaw and when ground conditions allow. There will be an on site peak workforce of about 160 workers during the 2-month period from June through July as described in Section 2.12 'Construction Schedule and Operation Activities'. The average workforce for the remaining 7 months of construction will be about 100 workers. During the peak construction period, construction workers will generate an estimated 160 daily trips (assuming 1 truck per every 2 workers), 80 of which will occur during the evening peak hour. (This trip estimate includes trip reductions resulting from carpooling). In addition to worker traffic, there will be an estimated 20 light duty delivery trucks daily for the peak of the construction period, resulting in 40 daily trips. Therefore the total of light duty vehicles at construction peak would be 100 (80 vehicles for worker traffic and 20 vehicles for light duty delivery).

Construction-related traffic increases will consist of deliveries of Project equipment and construction materials (such as concrete and steel) by truck. Truck deliveries are anticipated to occur between 8 a.m. and 4:30 p.m. on weekdays. In total, 8,200 heavy duty truck deliveries are expected during the 9 month period. Assuming 180 work days (9 months at 20 workdays per month), this would result in an approximate average of 45 trucks per day or 90 daily truck trips. It is anticipated that truck deliveries will include:

- Major equipment (e.g. tower sections, nacelles, blades);
- Gravel for site access roads, O&M facility area and substation;
- Water trucks for road wetting during compaction and for dust control;
- Construction equipment delivery and pickup;
- Concrete and reinforcing steel;
- Mechanical equipment;
- Electrical equipment and material (transformers, cable, etc.);
- Miscellaneous steel, roofing, and siding;
- Construction consumables;
- Contractor mobilization and demobilization.

Table 5.2.2-2 provides a summary of PM peak hour traffic and LOS during the construction time period of the Project.

**Table 5.2.2-2
Total PM Peak Hour and LOS Construction Impacts to the Roadways**

Roadway	No. of Lanes	2004 Base ADT	Construction			Total PM Peak	LOS
			2004 PM Peak	Worker Truck Traffic	Construction Traffic		
I-90 (W. of US 97)	4	22,660	2,266	45	145	2,456	D
US 97 (N. of I-90)	2	2,884	288	45	145	478	C
US 97 (S. of Bettas Rd.)	2	2,266	227	45	145	417	C
Bettas Road	2	27	3	45	145	193	C
Hayward Road	2	25	3	45	145	193	C

ADT = Average daily traffic.
LOS = Level of service.

The construction LOS during the PM peak hour with construction worker traffic and delivery traffic causes the Transporter Route to operate at LOS D or better. It is anticipated that the LOS will change back to existing conditions LOS once the Project is completed.

5.2.2.1.2 Parking

During construction, parking will be located at the site of the O&M facility and along the site access roads. The O&M facility site will also serve as a construction staging area. Dust control will be implemented as needed to minimize fugitive dust. Parking along turbine string roads will be primarily for those workers working on turbine foundations and electrical infrastructure and turbine erection crews. Vehicles will park in areas that are already temporarily or permanently disturbed for other construction purposes, no additional ground disturbance is anticipated solely for parking needs. It is anticipated that roughly half of all construction worker vehicles will be parked at the O&M facility location and the other half will be dispersed across the various turbine strings. Assuming a peak workforce of 160 people, the maximum number of worker vehicles anticipated at any one time is 106, assuming that efforts to encourage carpooling will result in about one third of construction workers carpooling to and from the Project site. In terms of acreage necessary for parking, the worst-case scenario (assuming no carpooling) would require less than 2 acres for parking.

5.2.2.1.3 Hazardous Materials

As described in Section 4.1.3, 'Releases or Potential Releases of Hazardous Materials to the Environment', diesel fuel is the only potentially hazardous material that will be used in any significant quantity during construction of the Project. During construction, the EPC contractor will utilize fuel trucks for refueling of construction vehicles and equipment on site. The fuel trucks will be properly licensed and will incorporate features in equipment and operation, such as automatic shut off devices, to prevent accidental spills. Measures to prevent and contain any accidental spills resulting from this fuel transportation and use are described in detail in Section 2.9.2.1, 'Spillage Prevention-Construction'. Construction of the project will not result in the generation of any hazardous wastes in quantities regulated by state or federal law.

5.2.2.1.4 Construction Accidents

Although the additional vehicular and construction traffic attributable to the proposed action would increase the risk of accidents, it is anticipated that the overall accident rate or pattern would be similar to existing conditions.

A Traffic Management Plan will be submitted to EFSEC for review prior to the startup of construction, and that plan will include measures to minimize impacts of construction related traffic and to minimize hazards during construction.

5.2.2.2 Operation and Maintenance

5.2.2.2.1 Traffic

The Project will operate continuously (24 hours per day, 7 days per week) using an automated system. It will employ an estimated 16 to 18 full time workers. The operations crew will normally work 8 hour days Monday through Friday, with one person working half days on the weekends. This equates to a maximum of 36 trips during a 24-hour period. Traffic between the O&M facility and the individual turbines will be minimal during operations, as scheduled maintenance is normally performed only every 6 months on each turbine. The Applicant will be responsible for maintenance of turbine string access roads, access ways, and other roads built by the Applicant to construct and operate the Project.

Table 5.2.2-3 describes current and future traffic volumes, and LOS during the operation phase of the Project, including traffic volumes from the generation plant site. Future year 2030 volumes were estimated using a 1 percent growth factor. This growth factor is considered reasonable because of the area's rural nature. As shown in Table 5.2.2-3, all roadways will operate at LOS D or better during evening peak conditions.

5.2.2.2.2 Parking

During the operational phase, parking will be at the O&M facility parking lot. With an anticipated operations workforce of 16 people, plus occasional guests, delivery vehicles, etc. no more than 20 vehicles are expected to be parked at the facility at any one time. The permanent parking area at the O&M facility will be graveled to reduce dust and soil erosion.

5.2.2.2.3 Hazardous Materials

No substantial quantities of industrial materials will be brought onto or removed from the Project site during Project operations. The only materials that will be brought onto the site will be those related to maintenance and/or replacement of Project facilities (e.g., nacelle or turbine components, electrical equipment). The only materials that will be removed from Project facilities will be those parts or facilities replaced during maintenance activities. Those materials removed or replaced will not constitute a significant amount.

Hazardous materials that will be transported to the site only include minimal amounts of lubricating oils, cleaners, and herbicides in quantities below state and federal regulatory thresholds. Transportation of these materials will be conducted in a manner that is protective of human health and the environment and in accordance with applicable federal and WDOT requirements.

5.2.2.2.4 Accidents

The accident rates during Project operation are not anticipated to exceed the existing accident rates.

**Table 5.2.2-3
Existing, Future Daily, and Peak-Hour Roadway Segment Traffic Volumes and LOS with and without Project Impacts**

	2001 Existing PM Peak		2004 PM Peak without Project		2004 PM Peak with Project		2030 PM Peak without Project (Horizon Year)		2030 PM Peak with Project (Horizon Year)	
	Traffic	LOS	Traffic	LOS	Traffic	LOS	Traffic	LOS	Traffic	LOS
I-90 (W. of US 97)	2,200	C	2,266	C	2,284	C	2,855	D	2,878	D
US 97 (N. of I-90)	280	C	288	C	306	C	363	C	386	C
US 97 (S. Bettas Rd.)	220	C	227	C	245	C	286	C	309	C
Bettas Road	3	B	3	B	21	B	4	B	26	B
Hayward Road	3	B	3	B	21	B	4	B	26	B

LOS = Level of service.

5.2.2.2.5 Future Intersection Operations

The LOS of the unsignalized intersections in the area would continue to operate at acceptable levels in the future. The LOS during the operational phase of the Project will also include traffic from the Project site.

5.2.3 Movement/Circulation of People or Goods

Sections 5.2.2.1.1, ‘Operations and Maintenance -Traffic’ and Section 5.2.2.2.1 ‘Construction-Traffic’ above describe impacts on traffic from the Project. Measures to restore and rehabilitate disturbed areas are described in Section 2.14, ‘Construction Methodology’ and Section 3.4.7.4, ‘Post-Construction Restoration of Temporarily Disturbed Areas’. All temporarily disturbed areas will be reseeded with an appropriate mix of native plant species as soon as possible after construction is completed to accelerate the revegetation of these areas and to the prevent spread of noxious weeds. The Applicant will consult with Washington Department of Fish and Wildlife regarding the appropriate seed mixes for the Project area. There will be no public access to Project facilities on privately owned land during construction, operation or decommissioning of the Project. Any access provisions for Project facilities located on land owned by Washington DNR will be arranged in coordination with DNR, in conjunction with the Applicant’s land lease and according to agency guidelines. Appropriate measures to protect public safety will be incorporated in any access provisions for DNR lands upon which Project facilities are located. After decommissioning of the Project, public use and access of DNR lands would be unaffected, as no Project infrastructure would remain which might pose a hazard to the public.

The only multipurpose utilization of rights of way envisioned for the Project involves a less than one mile section of the existing BPA right of way (ROW) between Hayward Road and the location of the proposed

BPA substation and turbine string E (see Exhibit 1, 'Project Site Layout'). This ROW is currently a dirt road and is not heavily used by BPA. The Applicant plans to submit an Application for Proposed Use of ROW to the BPA for joint use of this section of ROW. The Applicant will propose to BPA to upgrade this section of ROW from dirt to gravel surface (see Section 2.3.2, 'Roads and Civil Construction Work' for a description of Project road specifications) and to assume responsibility for maintenance of this section of ROW.

5.2.4 Mitigation Measures

No significant unavoidable adverse impacts on traffic and transportation are associated with construction or operation and maintenance of the Project. However, the Applicant has proposed specific mitigation measures for Project construction.

5.2.4.1 Construction

During construction, roadways and intersections in the vicinity of the Project site will provide an acceptable level of passage for traffic, even during the evening peak periods. However, the following mitigation measures are proposed to further reduce the impact of Project construction on roadway traffic in the region:

- The Applicant will prepare a Traffic Management Plan with the contractor outlining steps for minimizing construction traffic impacts;
- The Applicant will provide notice to landowners when construction takes place to help minimize access disruptions;
- The Applicant will provide proper road signage and warnings of "Equipment on Road," "Truck Access," or "Road Crossings;"
- When slow or oversized wide loads are being hauled, advance signage and traffic diversion equipment will be used to improve traffic safety. Pilot cars will be used as DOT codes dictate depending on load size and weight;
- The Applicant will construct necessary site access roads and entrance driveways that will be able to service truck movements of legal weight;
- The Applicant will encourage carpooling for the construction workforce to reduce traffic volume;
- In consultation with Kittitas County, the Applicant will provide detour plans and warning signs in advance of any traffic disturbances;
- Applicant will employ flaggers as necessary to direct traffic when large equipment is exiting or entering public roads to minimize risk of accidents;
- One travel lane will be maintained at all times.

5.2.4.2 Operation and Maintenance

Because Project operation and maintenance will not significantly affect traffic and transportation, no mitigation is proposed.