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CHAPTER 4 – ENVIRONMENTAL IMPACT ASSESSMENT

4.16 UTILITIES AND SERVICES SYSTEMS

Would the project:	Potentially Significant Impact	Less-Than-Significant Impact with Mitigation	Less-Than-Significant Impact	No Impact
a) Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities (the construction of which could cause significant environmental effects)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Require or result in the construction of new storm water drainage facilities or expansion of existing facilities (the construction of which could cause significant environmental effects)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d) Have sufficient water supplies available from existing entitlements and resources to serve the project from existing entitlements and resources?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e) Result in a determination by the wastewater treatment provider that serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
f) Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
g) Comply with federal, state, and local statutes and regulations related to solid waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

4.16.0 Introduction

This section describes utility services and infrastructure in the vicinity of the proposed Sierra Pacific Power Company (SPPCo) 625 and 650 Line Upgrade Project (project), including cable television, telephone, electricity, gas, water, and sewer services. Within this section, potential impacts to these utilities and service systems are assessed. All impacts to utilities and service systems will be less than significant. The project will have a positive impact on electric utility services serving the area by providing more reliable transmission to existing customers, while at the same time accommodating the electricity needs of future development in the area.

4.16.1 Methodology

Information regarding local electricity, gas, water, and sewer services was obtained from local government websites and through personal communication with public-service providers, including the North Tahoe Public Utility District (NTPUD), the Tahoe City Public Utility District (TCPUD), the Truckee Donner Public Utility District (TDPUD), and various utility providers in the north Lake Tahoe area. Internet searches were also conducted to gather information regarding the telephone and cable providers in the project area.

4.16.2 Existing Conditions

Cable Television and Telephone

Charter Communications, Comcast, and Suddenlink provide cable television service to the north Lake Tahoe area and Town of Truckee. Suddenlink and AT&T provide telephone service to north Lake Tahoe and Truckee residents.

Electricity and Gas

SPPCo provides electricity to the project area and Southwest Gas Corporation (SWG) provides natural gas service.

Water and Sewer

Truckee Donner Public Utility District

The TDPUD provides drinking water to approximately 44 square miles of homes and businesses in the Town of Truckee and the surrounding area. The TDPUD draws its water from wells in Martis Valley and pumps it into the Truckee area where there are over 12,000 connection points. TDPUD water is used mainly for residential, commercial, recreational, and fire-suppression purposes. In 2008, over 2 billion gallons of water were provided by the TDPUD.

North Tahoe Public Utility District

The NTPUD Public Works Department provides water to residents living along the north shore of Lake Tahoe, including the communities of Kings Beach, Tahoe Vista, and Carnelian Bay. Lake Tahoe serves as the NTPUD's primary water source, from which they draw water in multiple locations. Groundwater wells serve as a secondary water source. In 2008, the NTPUD's combined sources supplied approximately 535 million gallons of water to local residents.

Sewer services are also provided by the NTPUD. Because of strict water quality standards for discharging effluent into Lake Tahoe, all sewage collected by the NTPUD is piped out of the Lake Tahoe Basin and treated in Truckee at the Tahoe-Truckee Sanitation Agency (TTSA) water reclamation plant. Septic systems have not been allowed in the Tahoe area since 1972, except in very small, remote pockets of development where sewer pipelines are not accessible.

Tahoe City Public Utility District

The TCPUD provides water service to Tahoe City, as well as other communities along Lake Tahoe's west shore from Dollar Hill to Emerald Bay, and along the Truckee River north to the Nevada-Placer county line. Water service is provided from three separate systems to approximately 3,800 customers. Potable water sources are either treated surface water or groundwater from wells and springs. TCPUD provides approximately 1 billion gallons of water yearly to the Tahoe City area.

Sewer service is also provided by the TCPUD. Sewer service is provided to approximately 7,300 customers in the north Lake Tahoe area. As discussed previously, strict water quality standards for discharging effluent into Lake Tahoe require that all sewage collected by the TCPUD be piped out of the Lake Tahoe Basin and treated in Truckee at the TTSA water reclamation plant.

Truckee Sanitary District

The Truckee Sanitary District (TSD) is the public agency that provides wastewater collection service to the greater Truckee area, including areas of Nevada and Placer counties. Currently, there are approximately 9,764 dwelling units contributing approximately 100 gallons of wastewater per individual per day to the collection system. TSD wastewater is treated at the TTSA water reclamation plant. According to the Water Quality Control Plan for the Lahontan Region (Basin Plan), which became effective on March 31, 1995, septic systems are allowed in the Town of Truckee if they were utilized before October 16, 1980. Septic systems are also allowed if it is determined that they will not affect groundwater tributaries to the Truckee River or overall water quality.

Tahoe-Truckee Sanitation Agency

The TTSA is the regional water reclamation agency that serves five member districts in the north Lake Tahoe area, including the NTPUD, TCPUD, and the TSD. Sewage collected by the TCPUD and NTPUD is pumped to the TTSA water reclamation plant where it is treated. Effluent from the plant is pumped into the ground and remaining solids are used as fertilizer on agricultural fields in the vicinity.

Solid Waste Services

Tahoe-Truckee Sierra Disposal provides solid waste collection for the project area, including the communities of Kings Beach, Tahoe City, Tahoe Vista, and Carnelian Bay, as well as the Town of Truckee. Solid waste collected in the Tahoe-Truckee area is sorted at the Eastern Regional Materials Recovery Facility (ERMRF) on Cabin Creek Road adjacent to State Route 89, approximately 2.5 miles west of the project. The facility covers approximately 7 acres and is permitted to receive up to 445 tons of waste per day. The facility currently receives an average of

145 tons of waste per day. Waste materials that are not recycled are sent to the Lockwood Landfill in Nevada, which has anticipated capacity until 2035.

U.S. Ecology, the nearest hazardous materials landfill, is located approximately 350 miles from the project area in Beatty, Nevada. Poles that are treated will be disposed of at the U.S. Ecology facility along with any other hazardous waste generated during construction. A discussion of project-related hazardous materials impacts is provided in Chapter 4.7 Hazards and Hazardous Materials.

4.16.3 Impacts

Significance Criteria

Potential impacts to public utilities and service systems were determined in accordance with Appendix G of the California Environmental Quality Act (CEQA) Guidelines. Significant adverse impacts to public utilities and service systems will only occur if the project:

- exceeds wastewater treatment requirements of the Regional Water Quality Control Board (RWQCB);
- requires or results in the construction of new water or wastewater treatment facilities or expansion of existing facilities;
- requires or results in the construction of new storm water drainage facilities or expansion of existing facilities;
- results in the need for a new or expanded water supply;
- results in a determination by the wastewater treatment provider that it has inadequate capacity to serve the project's projected demand;
- results in inadequate access to a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs; or
- causes a breach of federal, state, or local statutes or regulations related to solid waste.

In addition to the guidelines specified in Appendix G, the project will have significant adverse impacts to public utilities and service systems if it results in a disruption of existing utility systems lasting more than 6 hours.

Question 4.16a – Wastewater Treatment Requirement Exceedances – *No Impact*

Water use during construction will be minimal and limited to dust-control and fire-suppression activities and crewmember consumption. Water used during construction activities will be distributed over the project area and will infiltrate the ground. The water is not expected to run off the project site and impact wastewater systems. Portable restrooms will be used and maintained during construction and removed after the completion of the project. Therefore, no new point sources of water pollution will result from construction and no wastewater treatment requirements established by the RWQCB will be exceeded. The project will also comply with construction-related Best Management Practices as required by the RWQCB and Tahoe Regional Planning Agency. Therefore, there will be no impact due to construction of the project.

Once construction has been completed, operation and maintenance activities for the transmission lines and substations will be conducted in the same manner as for the existing facilities. Current

operation and maintenance activities do not violate wastewater requirements; therefore, continued operation and maintenance of the project will not result in an exceedance of RWQCB wastewater treatment requirements. As a result, there will be no impact as a result of operation and maintenance of the project.

Question 4.16b – Water and Wastewater Treatment Facility Expansion – *No Impact*

Portable restrooms will be used and maintained during construction and removed after the completion of the project. No impact to local sewer systems will result from the project and no new water or wastewater treatment facilities will be required. Project construction will not directly or indirectly result in new or expanded development. As a result, no extension of any new sewer trunk lines to serve the project will be required, nor will new or expanded water or wastewater treatment facilities be needed. As a result, there will be no impact as a result of project construction.

Operation and maintenance activities for the transmission lines and substations will be conducted in the same manner as for the existing facilities. The project will not result in the need for any new water or wastewater treatment facilities nor will it require the expansion of any existing facilities. As a result, no impact will occur due to operation and maintenance of the project.

Question 4.16c – Storm Water Drainage Facility Expansion

Construction – Less-than-Significant Impact

Construction of the project will involve grading to improve existing unpaved access roads, establish spur roads, and create level work areas at structure sites. Although this work may result in the temporary redirection of stormwater flow (e.g., installation of water bars), existing drainage patterns will not be significantly altered. Furthermore, all temporary spur roads and work areas will be restored to their original contours once construction has been completed. No permanent alteration to drainage systems will occur; therefore, no impact will result.

Additional grading work at substation facilities will not have a significant impact on drainage patterns because the substation locations are fairly level and each site already has existing stormwater infiltration basins or swales. The majority of substation work will occur within existing outer fence lines, except at the Tahoe City Substation where temporary transformers will be placed on an adjacent USFS-owned parcel. While no modifications to existing stormwater retention basins are expected for substations undergoing minor upgrades, modifications to the drainage systems will occur at the Tahoe City Substation and Kings Beach Substation. An infiltration trench will be installed at the Tahoe City Substation. This trench will be 2 feet by 20 feet, approximately 8 feet deep, and will be backfilled with drainage rock. All stormwater, including stormwater collected by secondary containment basins, will be directed towards this trench either by grading or with pumps and PVC pipe. The Kings Beach Substation will be graded in such a manner as to capture and infiltrate stormwater within the substation property. Because these changes are upgrades to existing facilities and do not necessitate changes to or expansions of municipal stormwater facilities, the impact will be less than significant.

Operation and Maintenance – No Impact

Operation and maintenance activities for the new and upgraded transmission lines and substations will be conducted in the same manner as they are for the existing facilities. No new permanent stormwater drainage facilities or expansion of existing facilities will be required as a result of operation and maintenance of the project. On-site stormwater will be treated in a manner that is in compliance with the applicable RWQCB requirements (see Chapter 4.8 Hydrology and Water Quality for a further discussion of stormwater treatment). As a result, there will be no impact.

Question 4.16d – Water Supply Availability – No Impact

Sufficient sources of non-potable water are available for SPPCo to conduct standard dust- and fire-suppression activities. During the 3-year construction period, approximately 8,016,000 gallons¹ of water (24,000 gallons per day) will be required for dust control. SPPCo estimates that 12,000 gallons of water will be required for fire suppression for three fire seasons, assuming there are no fires. Potable drinking water sources will not be used as workers typically use bottled water for personal consumption.

Water will be obtained from existing hydrants in the public right-of-way and trucked into areas not served by public water lines. Based on recent amounts of water provided to local residents by the three local public utility districts, water requirements during construction will not exceed available supply in the area. Therefore, there will be no impact on existing water supplies or entitlements due to construction of the project.

Operation and maintenance activities for the project will be conducted in the same manner as for existing facilities; therefore, water supplies from existing entitlements and resources will be sufficient to continue accommodating these activities, and there will be no impact.

Question 4.16e – Wastewater Treatment Capacity – No Impact

During project construction, portable restrooms will be used. Therefore, no wastewater treatment will be required as part of project construction and there will be no impact to wastewater treatment providers or their capacities.

Operation and maintenance activities for the project will be conducted in the same manner as for the existing facilities. No new restrooms will be required for the operation and maintenance of the project and no additional wastewater will be generated. Therefore, no impact to wastewater treatment capacities will result.

Question 4.16f – Landfill Capacity

Construction – Less-than-Significant Impact

The project will not significantly affect landfill capacity because it will generate a limited amount of construction waste, which will be recycled to the maximum extent possible. Non-recyclable waste will be separated at the ERMRF, which has adequate capacity to accommodate

¹ This number was calculated under the assumption that 6 water trucks, each with 2,000-gallon tanks, will be used on a daily basis and will unload two times per day.

the project's daily waste needs. Leftover waste materials will be disposed of at the Lockwood Landfill, which has anticipated capacity until 2035. Poles that are treated will be disposed of at U.S. Ecology's hazardous waste treatment and disposal site located in Beatty, Nevada. As a result, the impact will be less than significant.

Operation and Maintenance – No Impact

After construction has been completed, operation and maintenance of the facilities will continue in the same manner as they did prior to this project. Only a small amount of waste is typically generated by regular operation and maintenance activities. Existing landfill capacity levels will be sufficient for the continuation of operation and maintenance activities. Therefore, there will be no additional permanent impact to local landfill capacity as a result of this project.

Question 4.16g – Solid Waste Statutes and Regulations – No Impact

During project construction, operation, and maintenance, SPPCo will dispose of all waste in accordance with federal, state, or local statutes and regulations related to solid waste. The same operation and maintenance activities conducted for the existing facilities will be conducted for the new facilities. Therefore, no impact will occur.

Disruption of Existing Utility Systems

Construction – Less-than-Significant Impact

Construction of the project will involve excavation and grading for transmission structure installation and substation modifications. Because these activities involve excavation work, they have the potential to unintentionally impact existing underground utilities, which may result in the disruption of service. To minimize the risk of impacting these lines, SPPCo or the contractor will notify Underground Service Alert in accordance with state law to ensure that existing utilities are appropriately marked in the field for avoidance.

In addition, short-term electrical service interruptions may be required during conductor stringing, installation of poles in certain locations, and tree removal activities. In most cases, SPPCo will be able to back up the existing transmission lines through switching (re-routing service to alternative circuits). During substation construction, loads not picked up with alternative circuits will be serviced by the temporary transformers located at the Tahoe City Substation. To ensure uninterrupted electrical service during construction at the Northstar Substation, the existing Northstar Tap will be used as a shoofly to supply power to the substation while the Northstar Fold is being constructed. Upon completion of the new Northstar Fold, the existing Northstar Tap will be removed. In other locations, temporary generators will be supplied. However, there may be limited, short duration outages to some customers that cannot be served otherwise. Notice of a planned outage will be provided to affected customers prior to the outage. While some outages may be unavoidable, they will be short-term and SPPCo will make every effort to restore power as quickly as possible. Therefore, the impact will be less than significant.

Operation and Maintenance – No Impact

After construction has been completed, operation and maintenance activities for the facilities will continue in the same manner as they did prior to this project. Operation and maintenance

activities do not currently impact the existing utility systems; therefore, future operation and maintenance will not impact the existing utility systems. Additionally, implementation of the project benefits the electrical service system by ensuring fewer outages and increasing system reliability to the area. As a result, there will be no impact.

4.16.4 Applicant-Proposed Measures

Because the project will not result in any significant impacts to utilities and service systems, no avoidance and minimization measures have been proposed.

4.16.5 References

California Public Utilities Commission. Memorandum. Applicants Filing Proponent's Environmental Assessment. November 24, 2008.

California Resources Agency. 2007. Title 14 California Code of Regulations, Chapter 3 Guidelines for Implementation of the CEQA. CEQA Guidelines.

Cottle, Jill. Tahoe-Truckee Sierra Disposal. Personal communication with A. Ashton, Insignia Environmental. March 12, 2008. (530) 583-0148.

ERMRF. Online.

<http://www.placer.ca.gov/Departments/Facility/FacilityServTahoe/EnvironmentalUtilities.aspx#MRF>. Site Visited September 10, 2009.

Nevada Department of Environmental Protection. Online.

<http://ndep.nv.gov/BWM/swmp/swp05.htm>. Site visited September 11, 2009.

NTPUD. Public Works. Water Quality Report. Online.

<http://www.ntpud.org/Uploaded/Documents/Water%20Quality%20and%20Conservation/2008%20Water%20Quality%20Report.pdf>. Site visited September 10, 2009.

SWG. Northern Nevada Division Headquarters. Online.

<http://www.southwestgas.com/contactus/nnvcontacts.php>. Site visited September 10, 2009.

State Water Resources Control Board, Basin Plan Program. Online.

http://www.waterboards.ca.gov/lahontan/water_issues/programs/basin_plan/. Site visited March 12, 2009.

TSD. Services Description. Online.

http://www.truckeesan.org/home/index.php?site_config_id=109&page_selection=2331&s_page=. Site Visited September 11, 2009.

TSD. Service Area Boundary. Online. <http://www.truckeesan.org/pix/11229547489.pdf>. Site visited March 11, 2009.

TCPUD. Annual Water Quality Consumer Confidence Report – 2008. Online.
<http://www.tcpud.org/utilities/water/2008-quality-report.pdf> . Site visited September 4, 2009.

TCPUD. Online. <http://www.tcpud.org/>. Site visited September 4, 2009.

TDPUD. Truckee Donner Public Utilities District. Online. <http://tdpud.org/index.php?cId=1>. Site visited on September 4, 2009.

TTSA. About Us. Online. <http://63.150.38.132/ttsa/jsp/content.jsp?menuid=53>. Site visited October 12, 2008.

Town of Truckee. Town of Truckee Blue Bag Recycling Program. Online.
<http://www.townoftruckee.com/index.aspx?page=430>. Site visited on September 4, 2009.

U.S. Geological Survey. Kings Beach, California-Nevada 7.5-minute series (topographic). 1992.

U.S. Geological Survey. Tahoe City, California 7.5-minute series (topographic). 1992.