



Fact Sheet

SEPTEMBER 2023

BPA proposes South Tri-Cities Reinforcement project

The Bonneville Power Administration is proposing to build a new substation and 115-kilovolt transmission line in the Tri-Cities, Washington. The 18.5-mile line would connect the proposed new Webber Canyon Substation near County Well Road to BPA's existing Badger Canyon Substation off Leslie Road.

Background

The Tri-Cities area is growing, and the increasing demand for power is adding to the area's existing transmission system constraints. The primary goals of this project are to improve long-term electric reliability, improve short-term operational flexibility and address system maintenance needs. This project would also allow BPA to increase the amount of electricity it can deliver into the area and modernize the grid. Additionally, this project could also help BPA to incorporate future generation and line/load interconnection projects in the region.

This is one of four projects BPA is proposing in the area, collectively referred to as the Tri-Cities Reinforcement program. The program will significantly increase BPA's transmission capacity in the area. This work will also

update BPA's current Tri-Cities infrastructure by reinforcing substations and lines.

The transmission lines that bring power into the Tri-Cities are at risk of becoming overloaded during periods of high electricity use, which could lead to blackouts. Overloading could occur during summer irrigation season, during summer when air conditioning use spikes, and in winter when heating is peaking.

In addition, the possibility of an unplanned power interruption increases when BPA takes one of the lines currently serving the Tri-Cities area out of service for regular maintenance. During a planned outage, the other feeds into the area are at increased risk of becoming overloaded, which could also lead to blackouts. Unplanned outages can also be caused by such things as equipment failure, a public safety power shutoff that may be necessary to ensure safety and reliability during wildfire season, lightning, or a transmission pole struck by a vehicle.

This new transmission line would help relieve stress on the system and significantly reduce the potential for unplanned outages.

In December 2022, BPA hosted a pre-NEPA scoping meeting for the project. Because this is a proposed new transmission line, BPA wanted to introduce the project to the public as soon as possible.



Project details

BPA expects to start National Environmental Policy Act scoping in Fall 2023. The NEPA process will help BPA identify and balance any impacts the project may have on the local community and the environment. Design and feasibility considerations include technical feasibility of tower and access road placement, ease of access for ongoing maintenance, community impacts, future expansion, environmental impacts and ratepayer costs to build and maintain the new facilities.

BPA has acquired the services of Burns & McDonnell to support design and environmental review work.

Preliminary proposed activities include

- Build a new 500/115-kV Webber Canyon Substation.
- The new Webber Canyon Substation design currently includes a terminal to connect a large renewable energy project in the area that has requested interconnection to BPA's transmission system under the Open Access Transmission Tariff. The Tariff requires that BPA integrate generation requests into the system at the project developer's expense if it meets BPA's technical requirements. The Webber Canyon Substation design would allow that energy to get on the BPA grid and to the purchaser. The renewable energy project is not associated with the new 18-mile South of Tri-Cities Reinforcement Project and the new line is needed regardless of whether the developer of the renewable project proceeds with their project.
- Build a new 115-kV transmission line from the proposed Webber Canyon Substation to the existing Badger Canyon Substation.
- Add fiber optic cable to the new line, as well as other existing transmission lines in the area, for operational communication and control.
- Tie existing 500-kV transmission lines to Webber Canyon Substation.
- Add new bays and re-terminate existing transmission lines at Badger Canyon Substation.
- Replace and upgrade the controls and security systems at Badger Canyon Substation.

Proposed project schedule and process

- **Fall 2022 through summer 2023:** Conduct preliminary engineering and environmental studies.
- **Fall 2023:** Begin NEPA review, including a public comment process to help BPA identify issues that could influence design decisions.



(LEFT) Double-circuit steel pole structure (RIGHT) H-frame wood pole structure

- **Summer 2024:** BPA will make a decision on whether to move forward at the end of the NEPA process.
- **Late-2024:** If BPA decides to build these facilities, construction on some portions of the project may start as early as late-2024. Start of construction for new facilities would be dependent on acquisition of property or rights-of-way.
- **2027:** Energization.

What type of structures would the new line use?

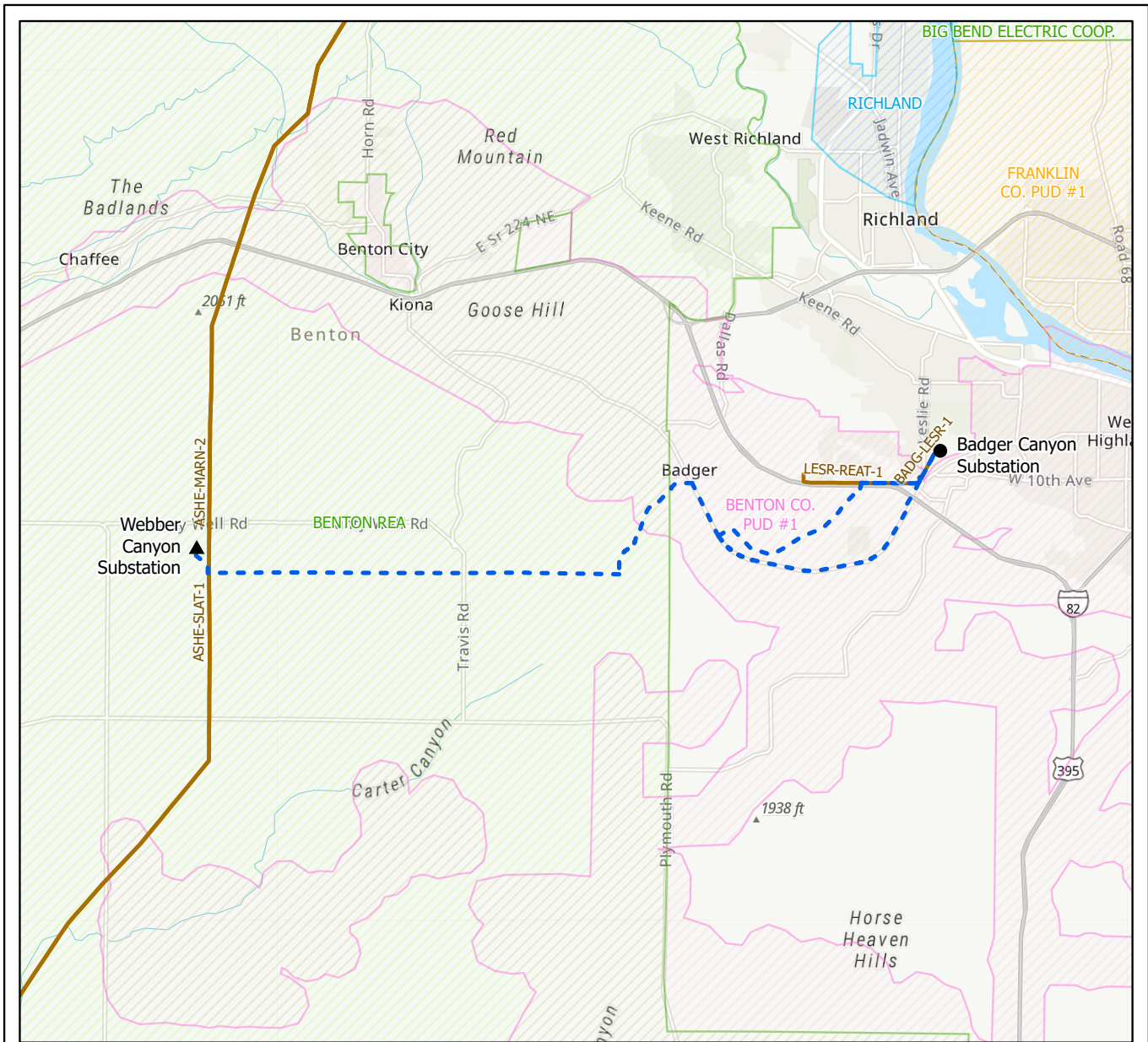
BPA is proposing a mix of double-circuit steel pole and H-frame wood pole structures for this project. Examples are shown above.

How tall would the new structures be? Generally, BPA expects structures would be anywhere from 60 feet to 120 feet tall, depending on structure type, terrain and other factors.

What type of road work would occur? BPA typically acquires or builds access roads to enable long-term maintenance of its facilities. Use of public roads, acquisition of rights to use private roads, and construction of new roads will all be considered. Where access roads need to be built, BPA uses gravel surfacing in most cases.

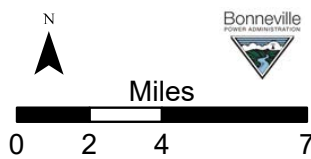
What is the fiber optic cable for? Will I be able to get faster internet? The proposed fiber optic cable would be for BPA operational use. It would allow BPA to monitor and control its transmission facilities. BPA currently has no requests for commercial use of its fiber.

Is there a website where I can learn more? Yes, you can find more information at this website: www.bpa.gov/nea/south-of-tri-cities. This new transmission line would help relieve stress on the system and significantly reduce the potential for unplanned outages.



South Tri-Cities Reinforcement

- - - Proposed Transmission Line Route Options
 - Existing Transmission Line
 - Existing Substation
 - ▲ Proposed Substation
- PUBLIC UTILITY TERRITORIES**
- Cooperative
 - Municipal
 - Benton Co. PUD #1
 - Franklin Co. PUD #1



Pre-decisional

Map Location Date: 6/12/2023