

## Low River Downs CVEA Structure



A crossarm dangles above the Lowe River in the area where Structure 38-7 stood prior to being destroyed by the Lowe River

At approximately 11:45 p.m. on Friday, September 6, a power outage ensued affecting all CVEA members from Heiden View, just outside of Valdez, to the Copper Basin. Copper Basin members were without power for roughly 80 minutes, while Heiden View remained out for over five hours.

After investigation it was determined the transmission line had been knocked out of service when Structure 38-7, west of Heiden View, was destroyed. Flooding changed the path of the Lowe River, eroded the land surrounding the structure, and caused the structure to collapse, leaving the crossarm dangling above the river.

In this case, the structure was washed out by the river and was pulled downstream with the wires still connected to the cross-arm by the insulators and hardware.

When the structure collapsed, CVEA's automatic protection systems opened the circuit breaker between Glennallen and Valdez to isolate the fault, as intended, resulting in a loss of power to members in the affected area.

Once power was restored to the majority of members, the CVEA team began to evaluate permanent and temporary solutions, carefully considering incremental fuel costs associated with running the Glennallen Diesel Plant, safety of the construction crews, and costs of construction and materials. It was ultimately decided that a temporary structure was the most efficient way to restore the line.

Immediately, CVEA engineered solutions and began moving forward; working closely with contractors, Alyeska, and the State of Alaska. The temporary structure was in place and the transmission line back in service within six days.

CVEA is currently working on a permanent solution and taking prudent steps to keep the power transmission system reliable against future Lowe River erosion.

For additional information on this or any other CVEA issue, please contact Sharon Crisp, CVEA Manager of Member Services at 822-5506, 835-7005, or email [crisp@cvea.org](mailto:crisp@cvea.org). ■



Top Left, satellite imagery of area surrounding Structure 38-7 from May 2004

Middle Left, satellite imagery from September 2013 demonstrating the change in the Lowe River

Source: Google Earth

Bottom Left, a temporary structure was put in place to restore the T-line while developing a permanent solution

Bottom Right, heavy equipment was used to recover the crossarm from the Lowe River

