



A Koniag temporary bridge nearing completion. Image courtesy of Peter C. Olsen.

Temporary Bridges Bring Lasting Benefits to Forest Ecosystems and Rural Communities

Trucks and logging equipment can impact water quality when crossing streams. Using temporary bridges to cross streams rather than a ford, culvert, or log-stringer crossing avoids damage to the streambed and prevents soil erosion, sedimentation, and barriers to natural streamflow—water quality is protected, along with fish and aquatic life downstream.

With funds from the Bipartisan Infrastructure Law, the U.S. Department of Agriculture (USDA), Forest Service has funded multiple temporary crossings across America through the Temporary Bridge Funding Opportunity Program—22 projects with State governments and 17 projects with federally recognized Indian Tribes. Up to \$17.6 million in funding is available to State governments and Indian Tribes in fiscal year 2024, with another \$8 million available annually through 2026.

TEMPORARY CROSSINGS HAVE POSITIVE IMPACT BEYOND FORESTRY

Koniag, Inc., which represents the Alutiiq people of the Kodiak Island Archipelago in Alaska, is a program partner. The overall goal of the Koniag temporary bridge project is to install 24 bridges across its forest road network on Afognak Island.

“In the first phase, we plan to install 8 to 10 temporary bridge structures in 2024. They will increase safety and retain access to over 20,000 acres of our forested land for timber harvest and access to important cultural and subsistence



Preparing the site for a Koniag temporary bridge. Image courtesy of Peter C. Olsen.

The environmental protection, economic efficiencies, and social benefits offered by temporary bridges underscore their significance as integral components of responsible forest management. By safeguarding fragile ecosystems, optimizing resource usage, and fostering community engagement, these bridges integrate economic prosperity, environmental stewardship, and social equity.

“We care about our forests, so it’s critical that we recognize and prioritize the pivotal role that temporary bridges play in ensuring the long-term sustainability of our forest resources,” Olsen says.

More Information

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activities like deer hunting and berry picking,” says Peter J. Olsen, Koniag’s director of lands and natural resources.

Koniag is using as many local resources and workers as possible to construct, install, and maintain its temporary bridges. This project has created six jobs and increased workforce training and capacity in this remote community of about 5,500 people.

Temporary bridges are an essential part of what makes sustainable forestry economically viable across the country. By streamlining logistics and reducing transportation costs, these bridges enhance profitability. Their modular construction and efficient deployment ensure swift installation and removal, optimizing how resources are used while minimizing downtime. Temporary bridges also enable access to remote or difficult-to-reach areas, facilitating timber extraction while minimizing damage to surrounding terrain.

TEMPORARY BRIDGES PROTECT RIPARIAN ECOSYSTEMS AND PROMOTE WATER QUALITY

Crossing streams on Afognak Island usually involves culverts and log-stringer bridges with a gravel running surface. Both culverts and failing log-stringer bridges can disturb aquatic ecosystems, prevent fish passage, and impair water quality. Culverts especially affect the flow of water by creating a bottleneck.

FAST FACTS

- Up to \$8 million in funding annually available to State governments and Indian Tribes
- The Forest Service Temporary Bridge Funding Opportunity Program has funded 22 projects with State governments and 17 projects with federally recognized Indian Tribes
- Temporary bridges provide safe and efficient stream crossing while protecting water quality and providing unimpeded streamflow and fish passage



Installing a Koniag temporary bridge. Image courtesy of Peter C. Olsen.