



Cooperative Profile

Established in 1937 and headquartered in Norman, Oklahoma, Oklahoma Electric Cooperative (OEC) serves 63,000 meters in seven counties in central Oklahoma. OEC's service area is mainly suburban and rural, with some members living in extremely rural areas. The system includes 5,000 miles of line and its average density is 10.8 meters/mile.

Business Drivers of Broadband Investment

Discussions with members revealed that broadband was the most desired service OEC could provide. "Many of our members, especially in our most rural areas, were paying hundreds of dollars a month for slow, spotty internet while others didn't have it at all," said Jenni Smith, OEC's Manager of Enterprise Applications.

OEC had an advantage over other companies looking to offer broadband to rural areas because while many had to start from scratch, OEC already had a great deal of the historical mapping and member data needed to begin the process. And, according to David Godspeed, President of OEC Fiber, they had a similar goal. "The mission of providing broadband aligns perfectly with the mission we've had for 85-plus years – to provide a reliable, affordable and accessible service to the members of our community."

Project Overview

That same year, the cooperative conducted a feasibility study and after positive results, it began construction in February 2018. OEC connected its substations first, to increase the electric system's reliability, then started building out in rings, then by feeder.

By February 2019, OEC connected the first home to its broadband service. Just one year later, nearly 8,000 customers had been connected. When COVID and the subsequent quarantine hit in early 2020, the demand for broadband became even greater. "Students had to bring home laptops for remote learning and parents had to work from home, so unreliable service just wouldn't do," Godspeed said.

Smith likens what happened next to "flooring the gas" in a car, installing 13,000 customers in seven months during COVID. What OEC thought would take eight years ended up taking only four. Since that fast and furious buildout, OEC has been making small modifications to its system, including increasing its speed and efficiency and continuing to expand



its service to those asking for it. Today, the system has 3,600 miles of fiber, has gone from a 10-Gbps system to a 100-Gbps system and has nearly 38,000 active fiber accounts...and is still growing by 30-40 accounts every day. The project's cash flow has been positive since the middle of 2022.

OEC was one of the first organizations to beta test and ultimately utilize iVUE Connect, an NISC cloud-based solution with a contemporary interface that allows utilities to utilize a single system to bill for broadband, manage customer requests and seamlessly provision services in one application.

"Simply put, iVUE Connect allowed us to connect nearly 40,000 customers in under five years," Smith said, adding that the solution's auto provisioning was a "lifesaver" because installers could see everything in real time, greatly increasing efficiency. NISC's iVUE AppSuite mobile application allowed employees and contractors in the field to access data on site, which saved countless hours. "There is not much in NISC's enterprise that hasn't helped make our jobs easier and more efficient, and that ultimately benefits our current and future broadband customers," Smith said.

Challenges and Surprises

Building a broadband system from the ground up doesn't come without its challenges, and while the project went unbelievably well given how quickly it was built, OEC learned a lot in the process.

One of the biggest surprises was how much the growth impacted its employee base. Goodspeed said OEC's staff doubled almost overnight, and at the heart of construction, there were thousands of contractors working nearly around the clock to get people connected. So many employees were added that it was necessary to add on to its office building, and the steady growth has the building nearly bursting at the seams once again.

Why This Case Study is Important

Providing broadband to OEC members and others in its community helps keep the rural Oklahoma experience alive and well. "Our customers want to be able to look at stars without seeing the lights of the city, but they still want to be able to have internet in their barns," Goodspeed said. "Providing affordable and reliable internet to rural America today is what bringing electricity meant to rural America in the 1940s."

Company Description

National Information Solutions Cooperative (NISC) is an IT organization that delivers advanced solutions, services and support to over 950 electric cooperatives, broadband companies and public power entities in all 50 states as well as American Samoa, Palau and Canada. NISC and its subsidiaries employ more than 1,350 professionals between four office locations and remotely throughout the U.S.

