



Nebraska Broadband Bridge Program

Company: Skywave Wireless, Inc.

Project: Cottonwood Chimes-Hidden Meadows

Document: Attachment E

Skywave has built and maintained its broadband network since 2003. In 2012 Skywave started designing, building, and maintaining an all FTTP (fiber to the premise) network. It currently offers speeds up to 1000/1000 Mbps for residential customers, and speeds greater than 1000/1000 Mbps for business customers. The on-going maintenance of the fiber optic network is handled by the Outside Plant department. Skywave has several crews of experienced fiber optic installers. Everything that is needed to maintain and service the network Skywave has in-house. As the network grows, additional staff will be added to maintain the network. This allows Skywave to keep its costs down and response times up without having to rely on outside contractors.

The technical staff handles all of the provisioning and maintenance of the fiber optic electronics and CPE equipment to provide services to its customers. IT staff also handles interconnection equipment and devices. Internal ticketing systems and procedures are used to provision all services from start to finish. All departments communicate using this system. This allows Skywave to provide quick response and excellent customer service.

This project specifically will be resilient and sustainable in the long term. The project location is near current service areas and will be able to be managed and maintained with Skywave's current staff and equipment. No new staff will be needed to be dedicated exclusively to the project area once it is completed, it will be handled by existing staff or additional staff added in the future as needed.

The new service area will be maintained along with existing service areas. This includes physical maintenance of outside plant, such as fixing broken handholes, post-construction settling, additional splicing and service drops as new customers are added, and scheduled inspections of plant components for damage. Electronics maintenance includes migration to new components as the original equipment reaches end of life and interim firmware updates to maintain devices. Monitoring and adapting interconnection routes and capacities is also part of ongoing maintenance.

Craig Schmaderer is a co-founder of Skywave. He has been the lead engineer for Skywave for 19 years. He has experience designing, building, and maintaining carrier grade FTTP networks. A short resume is included below:

2003 – Present Skywave Wireless, Inc. West Point, NE

**President/CEO**

- Outside plant engineering and design
- Core equipment management: name servers, routers, switches, circuits, access points, fiber Access
- Edge equipment management: fiber ONTs, wireless CPE's, integrated access devices
- Radio Frequency coordination/planning



- Business customer support: server administration, data backup, software deployment, VPN
- Customer support
- Employee evaluations
- Facility management

2001 – 2008 Air Force National Guard Lincoln, NE

#### **Combat Crew Communications**

- Aircraft radio security, maintenance, and support.
- Top Secret Clearance
- Air Force Achievement Medal

#### **Education**

2001 – 2008 University of Nebraska Lincoln Lincoln, NE

- Bachelors of Computer Engineering
- Bachelors of Electrical Engineering

#### **Professional Organizations**

- NETWAR.org Board Member
- Knights of Columbus
- American Legion
- Cuming County Telecommunications Foundation