



Floresville Electric Light & Power System

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A comprehensive network design provides the foundation for an ARRA grant application to expand broadband service to an under-served rural community while enabling future Smart Grid communication efforts.

Floresville Electric Light & Power System.

Floresville Electric Light & Power System (FELPS) is a municipally owned electric distribution utility in rural Texas, serving approximately 13,000 customers spread over 600 square miles. In response to the lack of Internet choice in the area, the utility opted to own and operate a small Internet Service Provider (ISP). Currently, it can offer broadband service to just a small portion of its overall customer base.

An opportunity to expand broadband coverage.

Within FELPS's service territory, both the incumbent local exchange carrier and the cable TV operator have announced that they have no plans to build out broadband Internet services in the area within the next 10 years. The utility's customers are clamoring for broadband connectivity. Currently, FELPS offers wireless access to customers who reside within a small area around its main office building and would like to expand coverage to its entire 600-square-mile service territory to meet customer requests. Furthermore, the American Recovery and Reinvestment Act (ARRA) provided a unique opportunity to assist the utility—potentially providing the funds to expand its ISP services to match its electric service area.

Grant application experience, and more.

For assistance in applying for an ARRA Broadband USA grant and developing a plan to expand its broadband Internet services, FELPS turned to West Monroe Partners. West Monroe Partners had extensive experience helping electric utilities with their Smart Grid communications efforts and, more recently, applying for ARRA grants—experience and knowledge that it could transfer to this grant application scenario. In addition, West Monroe Partners' specific telecommunications expertise in designing, building, provisioning, operating, and marketing carrier-grade wired and wireless commercial IP networks and broadband services would complement FELPS's effort.

Network design and a solid business case.

West Monroe Partners first sought to understand FELPS's overall project goals, as well as its current ISP operations. From there, the project team designed an initial network utilizing wireless technologies to expand the ISP's footprint from its current coverage area to the entire electric service area. The design called for:

- ◆ Radio towers
- ◆ High-speed wireless point to point links
- ◆ Point to multi-point wireless access points
- ◆ Routing and switching hardware to connect the network in a ring configuration
- ◆ IP network design, network management systems, and a cyber-security strategy

After completing the network design and developing a business case, the project team began working with FELPS to incorporate these into the grant application—responding to a combination of narrative, financial, and network architecture questions. West Monroe Partners helped the utility create a compelling case that forecasted subscriber growth, revenue growth, changes in cash flow, and income growth.

The road map to achieving a broadband vision.

By drawing on the resources of its full-service consultancy—including industry, IT, finance, and project management expertise—West Monroe Partners was able to perform a comprehensive assessment and analysis of FELPS's entire business. Together, this project team created a vision and broadband road map that enabled the utility to apply for funds through the Broadband USA Stimulus Initiative run jointly by the Rural Utility Service's (RUS) and National Telecommunications Infrastructure Association's (NTIA) Broadband Infrastructure and Broadband Technology Opportunity Programs. Just as important, this effort equipped FELPS to act—with a comprehensive, "shovel-ready" implementation plan for moving ahead to achieve its broadband service vision.

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