



## Client: ECFiber

*Project: East Central Vermont Community Fiber-Optic Network*

*Location: Vermont*

## Background

Having been continually overlooked in their quest for adequate broadband service by the incumbent service providers, 23 towns in east central Vermont banded together in 2008 to explore building a community owned fiber optic network. As the traditional carriers did not find it cost effective or profitable enough to provide high speed bandwidth in their towns, this group of communities decided to take control of the situation. Their cause has resonated throughout rural communities all over the country.

East central Vermont is made up of some of the most rural communities in the United States. These communities recognize that reliable broadband is more than just a matter of profitability; in some cases it's about the very survival of their communities and the rural way of life. The collection of towns formed an organization, known as ECFiber, and through grass roots action in their respective communities, they sought out and received overwhelming community support to build and run their own Fiber To The Home Network (FTTH). When they needed the expertise to help them carry out the plan, they found it in Matrix Design Group.

## Solution

Matrix Design Group began working with the ECFiber Governing Board, helping to identify the right network design to suit the needs of the community today and tomorrow. Matrix designed a robust network that would connect all 23 towns and all of the homes and businesses within the towns to the outside world. Additionally, Matrix provided capital budgeting oversight for the network plan, including preparation of the financial documents necessary to go to the public markets and managerial support at multiple meetings, both internally and externally.

When the public bond market collapsed, Matrix, without missing a step, redesigned the network to match the much more limited resources available to the project; resources that relied on local grass roots funding by the very people that would use the network. Matrix used its years of experience in designing, building, and operating complex fiber based networks to totally redesign the network to suit the very limited budgets. Although just as viable as the original design, the new design captured the essence of what Matrix is all about; designing and building to meet our client needs, within their budget. This new network, which is operational today, combines innovative thinking, solid engineering and cost effective construction techniques, to deliver world class FTTH service to rural communities in Vermont.

“Matrix has provided an invaluable service to the citizens of East Central Vermont. Our ambitious plan to take control of our future broadband needs was met by a company that stepped right up and made themselves an integral part of our team. We’re grateful for their guidance and contribution to our project. Without their truly innovative design, we may not be where we are today, delivering real broadband to areas of our State that may have never gotten it otherwise”

**Loredo Sola,**  
*Chairman, ECFiber*

