Partnership
Case Study

Introduction



In the race to bridge the digital divide across the United States, traditional fiber-to-the-home (FTTH) deployments frequently hit the same roadblocks like high labor costs, a shortage of skilled fusion splicers, and slow deployment velocities.

When Uniti (formerly Windstream Communications, operating its consumer broadband division as Kinetic) faced the monumental task of expanding its multi-Gigabit internet network to pass approximately 3.5 million homes by 2029, they didn't just look for a vendor—they looked for a co-creation partner.

By collaborating directly with STL (Sterlite Technologies Ltd.), the two companies moved from a standard transactional vendor relationship to a deep, strategic co-development alliance.

The flagship result of this partnership is STL CONCAT: a next-generation, Spliceless Concatenated Fiber Cable Assembly System that reduces field labor costs by up to 71% and dramatically accelerates network rollouts.

The Challenge : Overcoming the Splicing Bottleneck

Slow roll-out of Fiber-to-the-Home (FTTH) networks

As Kinetic scaled its network across the Southeast, Southwest, Northeast and Midwest, traditional deployment methods proved too slow and too expensive.

Need for the skilled labour

Field fusion splicing, where optical fibers are welded together on site, needs specialist labor, costly equipment and a lot of time.

Withstanding diverse geographical terrains

Kinetic approached STL with a clear challenge to find a way to build a completely spliceless FTTH architecture that would speed up "homes passed" and "homes connected" through diverse terrains, ranging from rural aerial networks to dense, urban below-grade environments.

STL solution and differentiators

STL CONCAT is a system of factory-assembled, pre-connectorized fiber segments that brings true plug-and-play installation to the field. Its connectorized design combines cable assemblies, enclosures and cassettes into one system, supporting faster and more reliable aerial and buried fiber builds.







The Strategic Advantages of Collaborating with STL

Spliceless Architecture: Minimizes the need for fusion splicing in the field by utilizing a concatenated, pre-connectorized MPO-to-LC cable assembly.

Versatile Form Factor: Integrated with a highly adaptable enclosure and cassette arrangement optimized for both aerial and buried/below-grade applications.

Ultra-Dense Ribbon: Complemented by STL's 864-fiber, 200-micron Intermittent Bonded Ribbon (IBR) cables for maximum fiber density in minimal duct space.

Domestic Compliance: Manufactured at STL's North American headquarters in Lugoff, South Carolina, ensuring full compliance with BABA (Build America, Buy America) infrastructure requirements.

For additional information please contact your sales representative.

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You can also visit our website at **www.stl.tech**

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Users of STL products should make their own evaluation to determine the suitability of each product for the specific application.

Business Impact & Results

The collaboration between STL and Kinetic has delivered real efficiencies in the field and strengthened a long-term partnership:

- Lower labor cost: up to 71% reduction in deployment labor expenses through plug-and-play installation.
- Faster, simpler builds: Kinetic says QuickConnect helps crews work faster, makes fiber builds easier and helps crews make fewer mistakes. This can shorten deployment timelines and speed up service activations for customers.
- Proven in the field: Kinetic tested the solution in multiple North Carolina neighborhoods across both aerial and underground deployments, which helped refine installation methods to match its preferred way of building.
- More flexibility for business customers: according to Kinetic, QuickConnect also makes it easier to route dedicated fibers to commercial locations when needed.
- Over $150 million of cable supplied contractually (~8 million fiber kilometers) with zero quality concerns.
- Secured a landmark $30 million network win for CY 2027, validating STL as Uniti's premier end-to-end fiber and connectivity solutions provider.

This collaboration has grown from supplying standard cables to co-developing next-generation infrastructure. STL has moved from a general vendor to an end-to-end fiber and connectivity solutions provider for Uniti.

*"Kinetic is focused on building a fiber network that creates a better experience for our customers from day one," said **Manny Sampedro**, Chief Network Officer, Kinetic. "By working with STL and leveraging its global supply chain strength and pre-connectorized fiber technology, we can build faster, reduce deployment cost, improve installation quality, and connect more customers sooner. That is good for our customers and good for our long-term growth."*

*"We think of our customers' customers first. Our goal is to partner and co-develop advanced solutions with our key customers so that they can contribute to America's broadband ambitions," said **Rahul Puri**, CEO, Optical Networking Business, STL. "The successful deployment of CONCAT fiber build technology marks a significant milestone, showcasing how our next-generation connectivity solutions can empower providers to rapidly expand high-quality bandwidth for FTTx networks. Together, we're enabling the digital infrastructure that drives tomorrow's innovation."*

Looking Forward

As Kinetic keeps expanding fiber across its growing footprint, the co-development work continues, with field trials now extending into hardened, IP68 below-grade formats. The STL and Kinetic partnership shows how operators and technology providers can work together to solve one of the industry's toughest deployment bottlenecks.