

CONNECT YOUR COMMUNITY TO THE WORLD

AND BUILD LOCAL CAPACITY



Achieve Autonomy and Control over Internet Access

In a rural community, how do you **connect everybody**? And if you do, how to keep them connected despite challenging weather, terrain, and a vast, sparsely-populated geography?

The technology exists today to overcome these issues. Now, you can build **local capacity** in your community through community control, affordable access, and inclusive coverage.

COMMUNITY CONTROL

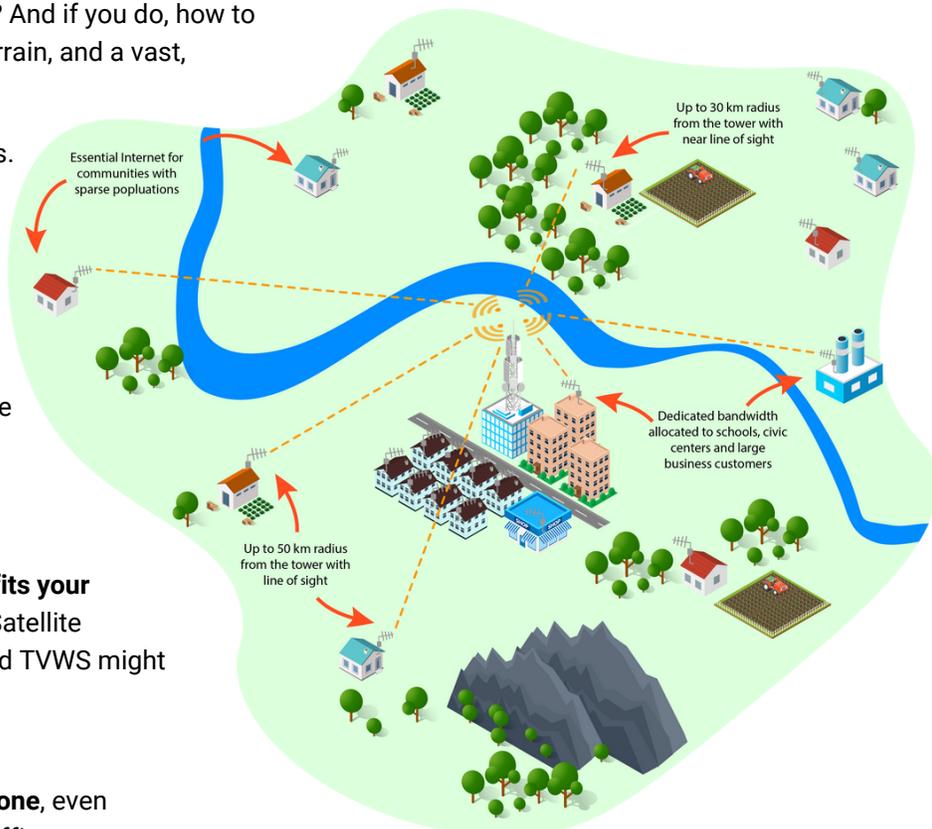
When you run your own community ISP, local control translates into community-focused solutions that drive long term **sustainable development**. Think jobs, skills development, and distance education.

AFFORDABLE ACCESS

With local control you also decide on the pricing that **fits your community** best. Fiber is expensive and years away. Satellite is owned and operated by an outside provider. LTE and TVWS might not extend to all your residents.

INCLUSIVE COVERAGE

Now, imagine what will change when you **reach everyone**, even households outside the town center, village, or band office.



HOW IT WORKS

Connect Gen3 by First Broadband provides fixed wireless Internet connections to multiple end-users located as far as 30 to 50 km away from the transmission tower. Our use of UHF radio frequencies and DOCSIS 3.0 protocol (a worldwide standard) delivers a unique combination of wide-area coverage, reliability and performance.

UHF + DOCSIS 3.0

The long range capability of UHF enables Connect Gen3 to deliver both the second-mile distribution network and last-mile connections from one tower.

And DOCSIS, unlike protocols used by LTE and TVWS, allows end-users to connect at the maximum data rate right to the edge of the coverage area.

SIMPLE INFRASTRUCTURE

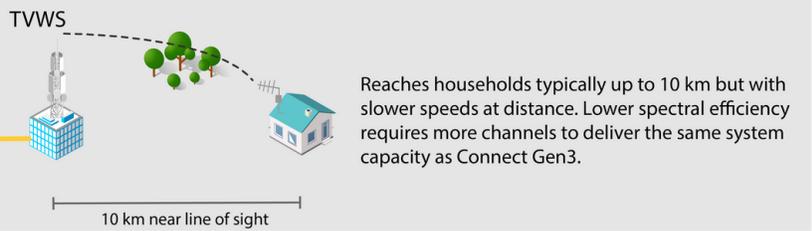
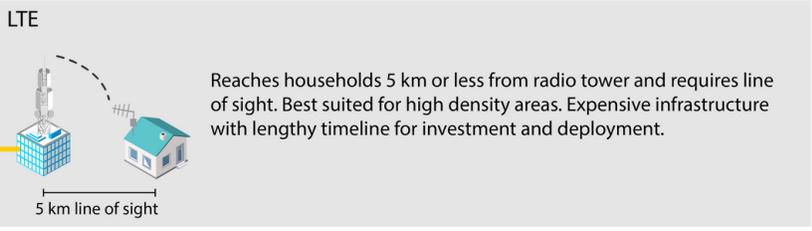
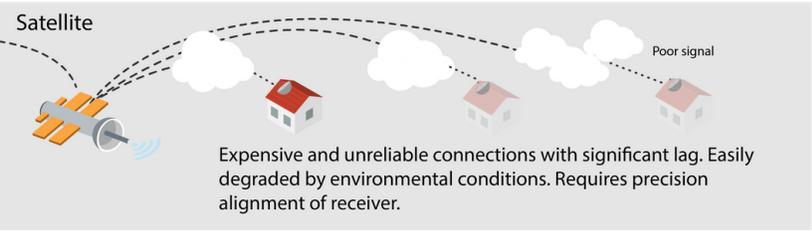
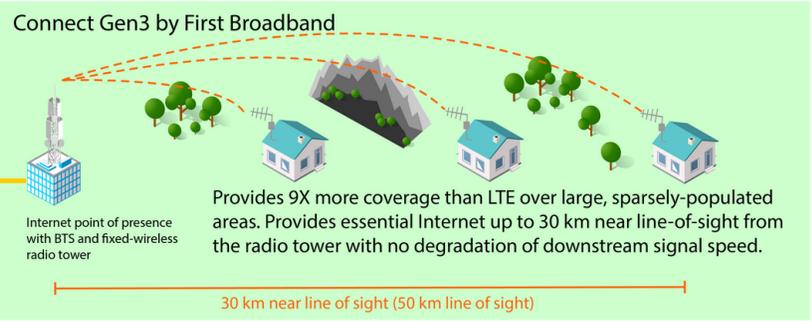
A base transceiver station (BTS) connects to the Internet backhaul. The signal is transmitted to a near line of sight antenna and transceiver mounted on the home or business. A modem/Wi-Fi gateway delivers Internet access to laptops, phones, and other devices.

CONNECT ON YOUR OWN TERMS

We specifically designed Connect Gen3 for you to own your communication infrastructure and enable community autonomy and control. We are your partner throughout the life of the system and offer as much ongoing training and support as desired.

QUICK FACTS

Coverage area:	30 km near line of sight subject to terrain 50 km line of sight
Total system bandwidth:	50 Mbps downstream (2 channels)
System capacity:	Up to 500 households
Licensed channels required:	2 downstream and upstream channel pairs
Frequencies:	470–698 MHz (UHF bands CH.14 - CH.51)
Communications protocol:	DOCSIS 3.0
Network management portal:	Web-based application for control over system and customer equipment
Link speed capacity:	Individual links are capable of downstream speeds up to 50 Mbps



ABOUT FIRST BROADBAND

We believe that affordable and reliable Internet is an essential service that profoundly impacts the health and well-being of all communities.

Our primary focus is addressing the needs of under-served and under-connected communities where geography and topography are barriers to entry. We enable community networks because community-based ownership and operation builds local capacity.

We are a Canadian, Vancouver-based subsidiary of M.I.K. industries. We own and have been operating a wireless ISP in rural Alberta since 2007.