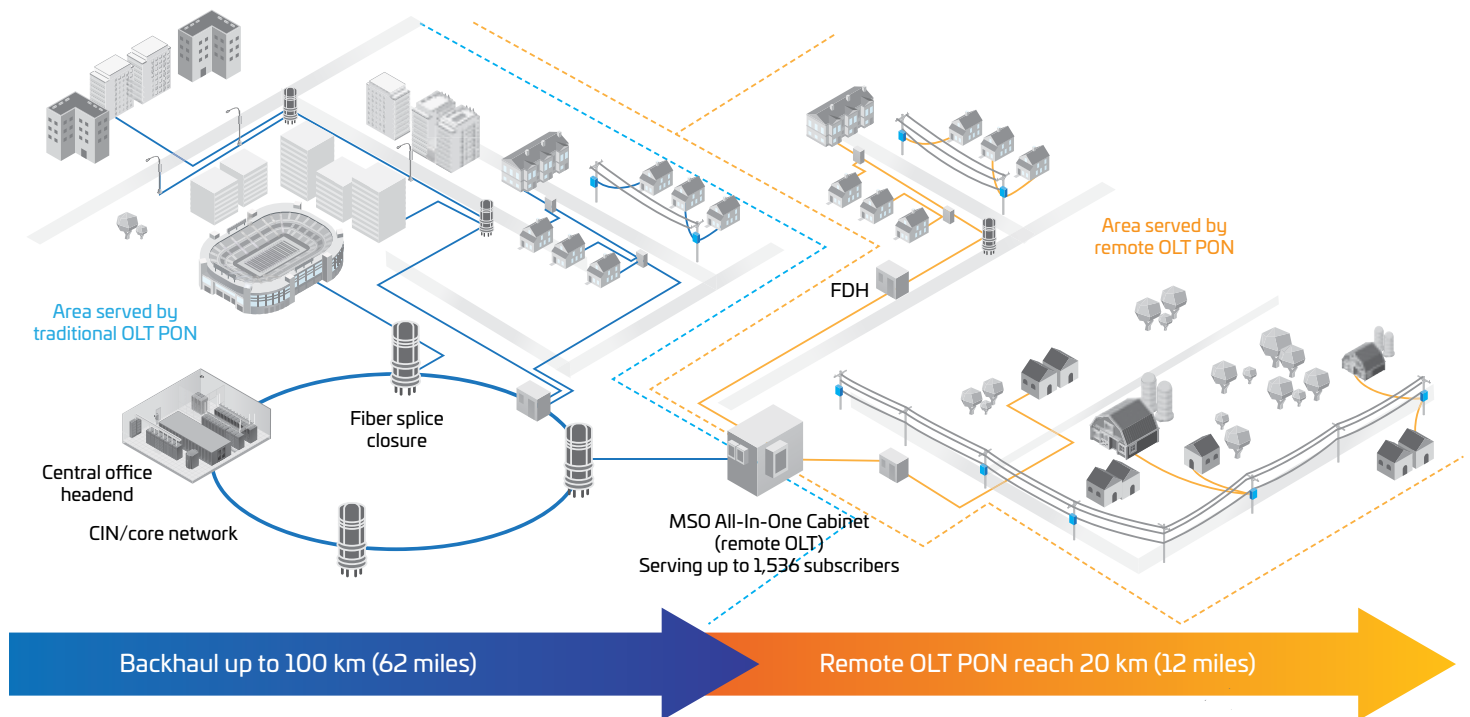


MSO All-in-One Cabinets



Multiple system operators (MSOs) across the board are having to modernize their network infrastructure to enhance the subscriber experience, improve operational efficiencies and deliver new services. All the while, the network's footprint continues to expand farther from the headend. Supporting subscribers at the edge requires more active and passive distribution cabinets, and that's a challenge.

R-OLT active cabinets are often large and visibly obtrusive. While some can be integrated into larger utility structures such as cell tower base stations or power sub-stations, most must be deployed as standalone units, subject to local land use requirements and approval processes. For operators needing to accelerate the turnup of new subscribers, any delay is costly.

That's why CommScope developed the MSO All-in-One (AIO) family of cabinets.

Extend your R-OLT reach and deployment options

MSO AIO Cabinets combine elements from our industry-leading active cabinets and our well-known FDH3000 passive cabinets. The result is a single, compact active/passive cabinet that immediately extends the reach and capacity of your R-OLT layer and expands your cabinet site and location options.

The unique design of the MSO AIO Cabinet provides the density to support most edge-of-network needs. One cabinet gives you an additional 20 kilometers of R-OLT reach and 100 km of backhaul, while enabling you to connect an additional 1,500+ subscribers without constructing a new headend or hut.

Measuring just 48 in H x 48 in W x 28 in D, the cabinet's compact footprint and low profile expand your available deployment options to include right-of-way locations such as intersections and easy-to-access roadsides.

The MSO AIO Cabinet: A closer look

The key to the MSO AIO solution is an innovative design that packs an amazing amount of functionality and capabilities into a surprisingly small footprint. Its approximately 48-in height meets most local requirements while the compact footprint (≈48 in H x 48 in W x 28 in D) enables right-of-way deployments per municipal standards.

One MSO AIO Cabinet supports up to 1,536 subscribers (10G EPON) via multi-stage splits and two hardened nodes. So, you can support more subscribers with fewer cabinets. Cabinets can be installed on risers, vaults or poured pads and are delivered with a 3-in riser. 12-in and 24-in risers, compatible vault and pad-mounted base can be purchased separately. MSO AIO Cabinets are designed and tested to comply with GR-487-CORE and GR-3125 specifications.

Active compartment features:

- 1,500-watt thermosiphon temperature control complies with GR-487-CORE
- Exterior 60-amp, 12POS alternating current (AC) load center for 120-volt AC single-phase power cable feed
- Optional PEM studs for mounting structural power meter (height extender and power meter sold separately)
- Cabling supports customer-provided direct current (DC) battery backup, typically one string of three 12 V cable system batteries (170-190 AH)
- Includes a 15-amp GFCI outlet and interior LED lighting (20-60 VDC)
- 20-pair alarm block supports intrusion, thermosiphon and SPD “normally open” alarms
- Interior grounding busbar available and connected to exterior grounding stud
- Manual transfer switch engages 50-amp, 125/250 V Generac generator power inlet box

All-in-One support

Perhaps most importantly, every MSO AIO Cabinet is designed, engineered and fully supported by CommScope. As a global leader of OSP connectivity solutions, CommScope has played a key role in many of the industry's breakthroughs, including R-OLT technologies. Our international network of research, manufacturing, distribution and customer support facilities ensures you will have the solutions and on-hand technical services you need, when and where you need them.

For more information on CommScope's MSO AIO Cabinets, [explore the AIO family of solutions.](#)



Passive compartment features:

- LC/APC to LC/APC (1.8 mm) jumpers support up to six PON modules
- 144-fiber, 288-fiber, or 576-fiber LC/APC F2 cables terminate on a custom swing frame with rear access
- Feeder field terminates 24/48 fibers on LC/APC connectors on 24f/48f cable stub
- Mounts up to two MSO-hardened nodes like CommScope NH4000/NH4600 VHUB
- Preloaded 1:64 LC/APC LGX-mounted PNP pigtailed splitter options (additional 1:2, 2:2, 1:4, 1:8, 1:16, 1:32, and 1:64 options sold separately)
- Supports 12 to 24 standard LGX passive optical devices (3-in depth recommended)
- 100-ft standard cable stub uses dry armored loose tube cable
- Interior grounding busbar installed for use with armored cable tone wire