



Inverse Fiber Amplifier (AIFA)



Features and Benefits

The Intercept Inverse Fiber Amplifier (AIFA) is an innovative cost-effective solution to extend the network and/or broaden its reach by converting the multitenant's drop RF signal to an optical signal. This high performance device operates at an industry leading 9 dBm of output power.

The inverse fiber amplifier is an outdoor, line mountable, rugged device that can provide extra reach and expand the existing HFC infrastructure to add and attract additional subscribers (rural customers) otherwise not serviced by the MSO. The Intercept AIFA is designed to leverage an MSO's existing Hybrid Fiber Coaxial (HFC) network to support DOCSIS data traffic and video channels. This implementation allows for improved reliability, lower maintenance costs and significantly increased performance, all while utilizing existing headend equipment. The headend and back-office systems already supporting the HFC plant are utilized in the new fiber plant extensions. The Inverse Fiber Amplifier is interoperable regardless of manufacturer but is most frequently paired with either a dedicated High Output MDU Intercept Premise MicroNode or a shared access Intercept Mini RFoG ONU, for new sets of subscribers.

- **Extend Network Reach** - The Intercept Inverse Fiber Amplifier is a high output and low distortion fiber bridge that can extend the network reach by over 10 km. via new build fiber extension, with little reengineering of the OSP.
- **Broaden Network Reach** - Add multiple subscribers by onboarding new homes passed to existing service group.
- **Performance** - 50-1.2 GHz bandwidth high powered 1550 nm DFB transmitter and high sensitivity receiver
- **9 dBm Transmit Power**
- **Simple Installation** - The units can be installed indoors or outdoors; either pedestal or strand mounted.
- **Signal Conditioning** - Full complement of JXP pad, eq or cable sim available enabling signal level optimization for both forward and return, resulting in ability to maintain proper cpe boundaries.
- **DOCSIS Compliant Operation**
- **Low Power Consumption** - At only 13 watts the AIFA may be placed anywhere in OSP and can be powered with drop cable.
- **Powering** - Local (40-95 VAC)
- **Increase Revenue** - Add additional subscriber(s) and/or upgrade existing extensions with poor End Of Line performance.

Acquire New Subscribers	
Campgrounds	Rural Broadband
MDU	Hotels / Casinos
Hospitals	College Campuses
Stadiums / Arenas	Airports / Terminals
Data Centers	Corporate Complex