

PL-1000R DWDM Raman Amplification Solutions

Counter-propagating Raman amplifier and hybrid Raman-EDFA

Features Overview

- Counter-propagating Raman amplifier with optionally embedded booster and preamp EDFAs in 1RU
- Detection of open connectors and/or broken fiber up to few tens of kilometers from the pump module
- High power connector safety switch cover
- Supports the following Raman configurations:
 - Counter-propagating Raman
 - Hybrid Raman-EDFA
- Up to 12dB average gain for G.652 fiber (2-pump)
- Gain flattening optimization based on fiber type and pump power
- Effective noise figure (NF) of -1dB
- 1U footprint with low power consumption
- Dual AC or DC pluggable power supply and pluggable fan unit
- Web-based GUI and SNMP EMS management

Distributed Raman Amplification

The PL-1000R is designed for distributed Raman amplification applications, cost-effectively extending the optical link power budget and significantly improving OSNR for building long distance DWDM solutions. It provides amplification for a range of optical solutions and incorporates several configurations of Raman amplifier, including counter-propagating and hybrid Raman-EDFA.



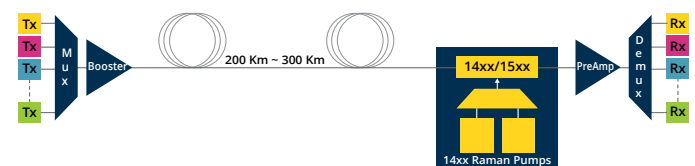
Main Benefits

- Acts as terminal Raman amplifier and as inline hybrid Raman-EDFA
- Full remote monitoring
- Eye safety feature - automatically shuts down the Raman in case of fiber interruption
- Detects fiber disruption or cut tens of kilometers from the pump
- Integrates with PacketLight management platforms and transponder/muxponder products

Laser Safety

The PL-1000R is fully managed, configured and monitored remotely as part of the network via optical supervisory channel (OSC). The Raman is controlled, adjusted and monitored by the user.

The Raman includes three eye safety mechanisms that shut down the unit in case of fiber link disruption, such as open connectors or broken fiber, even at a distance of a few tens of kilometers from the unit.



PL-1000R Raman Amplification Solution

Recommended applications:

- Long repeaterless links
- Low latency links (less FEC and O-E-O conversion)
- Storage area networks (SANs), remote locations, disaster recovery
- Security-sensitive applications
- Improving OSNR in long-haul and ultra-long haul links
- 400G, 200G and 100G transmission and/or increasing channel count to 96 WDM channels