DCF-EY-10/128H-G2

Erbium/Ytterbium co-doped double-clad fiber

Our new generation of Erbium/Ytterbium co-doped fiber offers high absorption and efficient energy transfer for high performance operation in the 1.5 µm region. With great optical efficiency and low noise levels, this product is an excellent choice for the design of high-power optical amplifiers (>5 W) used in various markets such as CATV in telecommunications or automotive and industrial LiDAR systems.

Features & Benefits

- High optical efficiency, minimizing pump power requirements
- High absorption – minimizes fiber length and reduces nonlinearities
- Optimized Er/Yb core composition – high OSNR at 1.5 µm and reduced 1 µm parasitic emission

Applications

- High-power telecom amplifiers
- LiDAR and sensing
- 1.5 µm fiber lasers and optical amplifiers

Specifications

Optical

Background Loss @1200 nm (dB/km)	≤ 50
Cladding Absorption @ 915 nm (dB/m)	2.4 ± 0.4
Core Absorption @ 1535 nm (dB/m)	85 ± 25
Numerical Aperture - Cladding	Min 0.45
Numerical Aperture - Core	0.2 ± 0.02

Geometrical & Mechanical

Cladding diameter (µm)	128 ± 3
Cladding geometry	Octagonal
Coating Diameter (µm)	260 ± 15
Core Diameter (µm)	10 ± 1
Core/Cladding Concentricity Error (µm)	≤ 1
Proof Test (kpsi)	<= 100

Environmental

Storage Temperature (°C)	-40 to +85