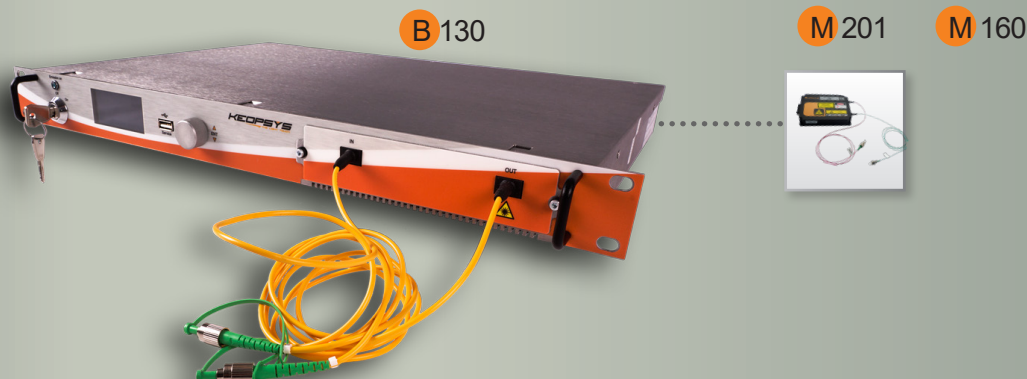


CEFA-C-WDM-LP

CW ERBIUM FIBER AMPLIFIER C-BAND GAIN
FLATTENED LOW POWER



1.5 μm



CEFA-C-WDM-LP Erbium doped fiber amplifiers provide amplification of multiple channels in the C-band, up to 23 dBm of saturated output power.

These amplifiers are optimized for use in Dense Wavelength Division Multiplexing applications. They provide dynamic gain control to operate at the point of optimum gain flatness. Composite output power varies in order to maintain a constant per-channel gain over a dynamic range of 12 dB.

A selection of 2 different bandwidths in the C-Band is available with excellent gain flatness. The series include polarization-maintaining models and mid-stage access option.

These products are proposed in turnkey benchtop instruments or in OEM modules.

Key features

- Up to 23 dBm of saturated output power
- Up to 39 nm of gain bandwidth
- Selection of 2 different bandwidths
- Gain flattened at +/-0.5 dB typical
- Low noise figure
- Mid-stage access option
- Polarization-maintaining (optional)
- Low power consumption
- Choice between turnkey benchtop or OEM module
- Wide range operating temperature (-20 °C to +65 °C for modules)

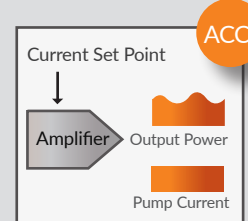
What applications

- Regional and metro DWDM networks
- FTTH/CATV networks
- Free space communication
- Test and measurement

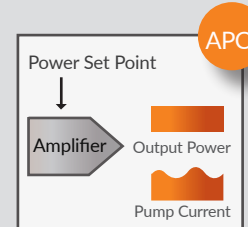


Modes of operation

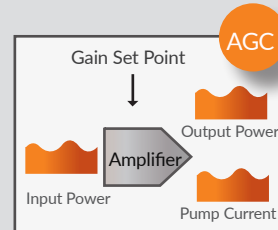
The devices offer several modes of operation :



ACC (Automatic Current Control) mode is standard for all devices. The amplifier is controlled from diodes current set point.



APC (Automatic Power Control) mode allows controlling the amplifier at a fixed output power set point. The device maintains a constant optical output power monitored with a photodiode. The current is adjusted automatically.



AGC (Automatic Gain Control) mode allows to control the amplifier at a fixed gain set point. The pump current is adjusted automatically to maintain the gain constant.

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CW ERBIUM FIBER AMPLIFIER C-BAND
GAIN FLATTENED LOW POWER



Optical Specifications

@ 25 °C

CEFA-C-WDM-LP

Mode of operation		CW					
Polarization		Random (SM) or linear (PM with PER>20 dB)					
Composite saturated output power		10 dBm	13 dBm	15 dBm	18 dBm	21 dBm	23 dBm
Wavelength range		1529-1562 nm (BW00), 1527-1566 nm (BW01)					
Composite input power range for	BW00	-25 to -13 dBm	-22 to -10 dBm	-20 to -8 dBm	-17 to -5 dBm	-14 to -2 dBm	-12 to 0 dBm
	BW01	-22 to -10 dBm	-19 to -7 dBm	-17 to -5 dBm	-14 to -2 dBm	-11 to +1 dBm	-9 to +3 dBm
Nominal signal gain		23 dB for BW00 and 20 dB for BW01					
Gain ripple		+/- 0.5 dB typ., +/-0.75 dB max					
Noise figure	@ 23 dB	< 5 dB for SM, < 6 dB for PM				< 5.5 dB for SM, < 6.5 dB for PM	
	@ 20 dB	< 5.5 dB for SM, < 6.5 dB for PM				< 6 dB for SM, < 7 dB for PM	
Input / Output monitoring		Yes					
Control mode		ACC, APC, AGC ¹					
Polarization mode dispersion (SM type)		0.4 ps					
Polarization dependent gain (SM type)		0.4 dB					
10 dB loss Mid-stage access (optional)		Yes					
Input / output fiber type		SMF28 or PANDA					
Input / Output termination		FC/APC, SC/APC, FC/SPC, SC/SPC					

1 : Not available for B130 platform

The CEFA-C-WDM-LP series amplifiers are available as benchtop or as OEM module.

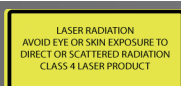
RELIABILITY

The Lumibird range of fiber lasers are manufactured with tested components and are submitted to several inspections during the manufacturing process under a rigorous quality management certified in accordance with the ISO 9001:2015 standard. Our all-in-fiber systems offer maintenance-free operation. Countless units are continuously running in demanding environments with no failure.

GUARANTEE

Our fiber systems are under 1 full year parts and labor warranty.
We offer a warranty extension of 1 or 2 years. Please contact us.

For ordering information and custom solutions, please contact us : websales@keopsys.com



Lumibird undertakes a continuous and intensive product development program to ensure that its products perform to then highest technical standards. As a result, the specifications in this document are subject to change without notice.

Lumibird has locations across the globe that are available to provide support for any product, service or inquiry. Visit www.lumibird.com to connect with any of our global sites.

