

# FRM220-OAP17

## Optical Amplifiers Preamp

### Single Channel EDFA Preamp



The FRM220-OAP17 is a single channel optical amplifier/preamp module that provides multi-function, low noise, Erbium-Doped Fiber Amplifier (EDFA) solutions for metro Dense Wavelength Division Multiplexing (DWDM) applications. The FRM220-OAP17 operates at the receiving end of an optical link. It features medium to low input power sensitivity, medium output power, and medium gain and is designed for optical amplification to compensate for losses in a De-multiplexer located near the optical receiver. The FRM220-OAP17 provides Automatic Gain Control (AGC) via rack management or RS-232 console interface. Its fast-transient suppression feature allowing the output power to be kept at a constant level when there are fast changes in input power.

### Features

- Automatic Gain Control (AGC)
- Advanced performance monitoring
- Input and output power levels
- Up to 17 dBm output power
- Gain flattening filters (GFF) assure flat gain (<1dB variance) over the entire amplified C-band
- LC/UPC connector
- Hot-swap support
- Single channel EDFA with FRM220 chassis rack management

### Applications

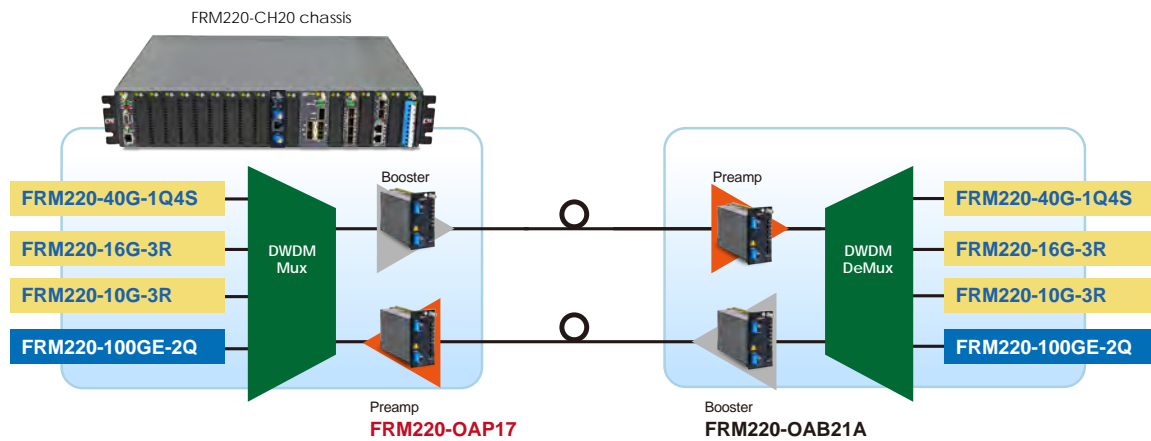
- Metropolitan WAN network system
- C-Band DWDM network system Input and output power levels
- CATV transmission system

### Specifications

Operating wavelength	1528 ~ 1563nm
Input power	-35 ~ -10dBm
Signal gain	25 ~ 35dB
Total saturated output power	+17dBm
Gain flatness (Max.)	≤ ±1.0dB
Noise figure	5.5dB (Typ)
Polarization dependent gain (Max.)	0.5dB
Polarization mode dispersion (Max.)	0.5ps
Output power stability (Max.)	±0.1dB
Return loss (Min.)	45dB
Connector	LC/UPC
Control mode	AGC
Operation case temperature	0 ~ 65°C
Relative humidity (non-condensing)	5 ~ 85%
Laser Class	Class 1M
Power consumption	10W
Dimension	159.5 × 42.1 × 88mm (D×W×H)

## Application

### EDFA booster/Preamp DWDM P to P application



## Ordering Information

Model Name	Description
FRM220-OAP17	DWDM C-band EDFA preamp card 17dBm with automatic gain control (AGC)

### ■ Chassis Option

Model Name	Description
FRM220-CH20(HS)	2U 19", 20 slots rack mount chassis with high speed cooling fan and rack mounting kit
FRM220-AC(HP)	Chassis power module 90 ~ 264 VAC, IEC connector, 300W
FRM220-DC48(HP)	Chassis power module 36 ~ 60 VDC, 3 pin terminal block, 300W
FRM220-CH02M-AC/DC/AD	2-slot chassis with console port and AC, DC or AD power, with fan
FRM220-CH04A-AC/DC/AD	4-slot chassis with built-in AC, DC or AD power