Qualfiber

Qualfiber EDFA Installation Guide

April 28th,2022

22-ED12428, Rev. 8

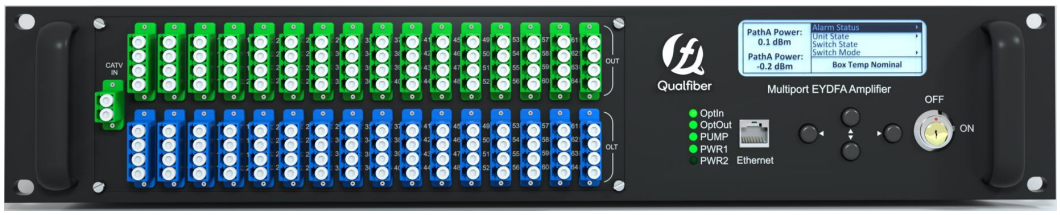
Contents

Chapter 1

EDFA Hardware and Accessories

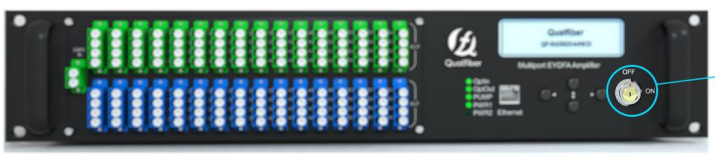
Qualfiber EDFA products including

1. Main Chassis(**LC/APC** input&output ports, **LC/UPC** ports for OLT, connectors of EDFA can be customized to be SC/APC, SC/UPC...,etc.)



2. Power Supply Module (Dual/Single power supply module is optional)with Power Cable(Standard can be customized as EU/US/UK/AU...,etc.)

3. Key for EDFA front panel(to turn ON or OFF the EDFA physically)



Chapter 2

Power Supply Introduce and Installation

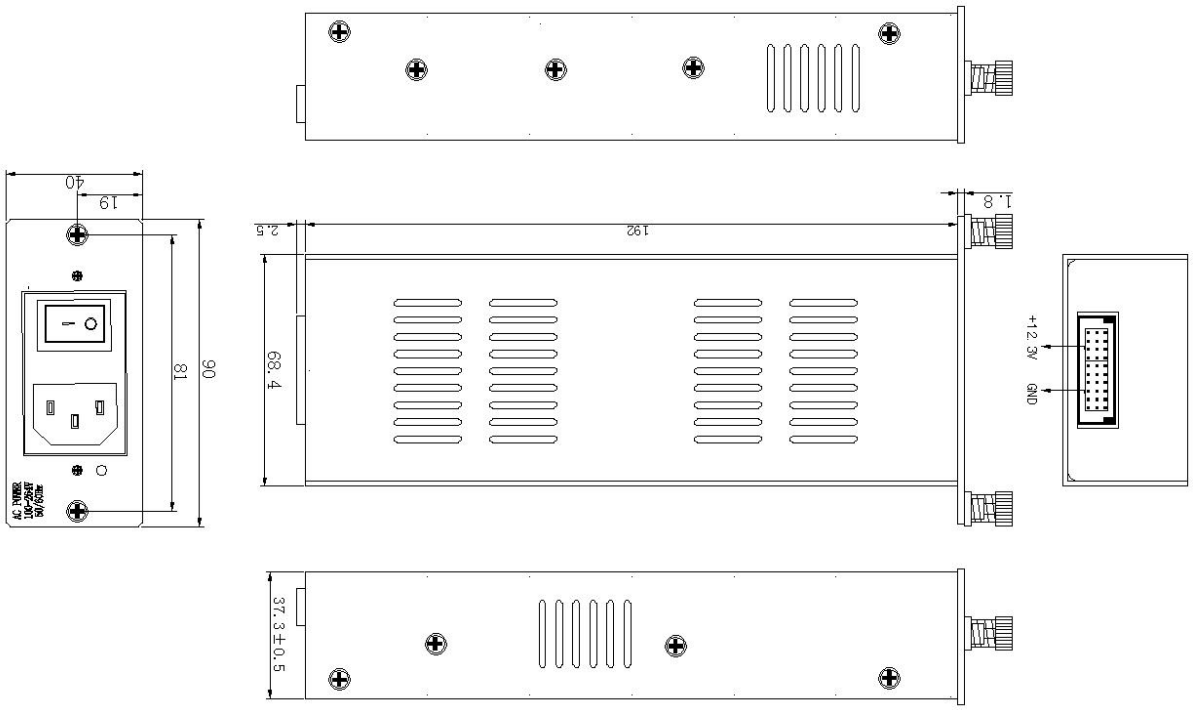
Power Supply Introduce

1. Input Specification

No.	Item	Specification	Remark
1	Phase	Single	
2	Input Voltage Range	100-264	VAC
3	Rated Input Voltage	220	VAC
4	Input Frequency(Hz)	50/60	Hz
5	Input Current（MAX）	<2.0	A
6	Inrush Current	<50A@220VAC	Cold conditions
7	Efficiency (%)	≥85%	Rated voltage; Full load

2. Output Specification

No.	Item	Specification	Remark
1	Output Voltage Range	+12.3	VDC
2	Load Current(MIN)	0.5	A
3	Load Current	8	A
4	Voltage Accuracy	±2%	VDC
5	Line Regulation	≤±1	%
6	Load Regulation	≤±2	%
7	Ripple （mV）	≤50	mV
8	Noise （mV）	≤100	mV
9	Temp. coefficient	±0.03%	℃
10	Start-up Time	/	
11	Hold-up Time	/	
12	Output Power	98.4	W



3. Working Environment

No.	Item		Specification	Remark
1	Temperature	Operating ambient	-25℃~65℃	
		No-operating ambient	-40℃~85℃	
2	Humidity	Operating	20%-90% RH	
		No-operating	10%-95% RH	
3	Heat-dissipating method		self cooling	
4	Altitude		2000m	

Power Supply Installation

1. Power supply module slots are on the left side of the EDFA's rear. If installed both dual power supply modules, the power supply 1 will be the default one for daily operation, while the other one power supply 2 will be the backup in case of power supply 1 been shut down.

2. Install Power Supply with side Screws. Keep pressing the screws and then tighten it by hand or screwdriver.

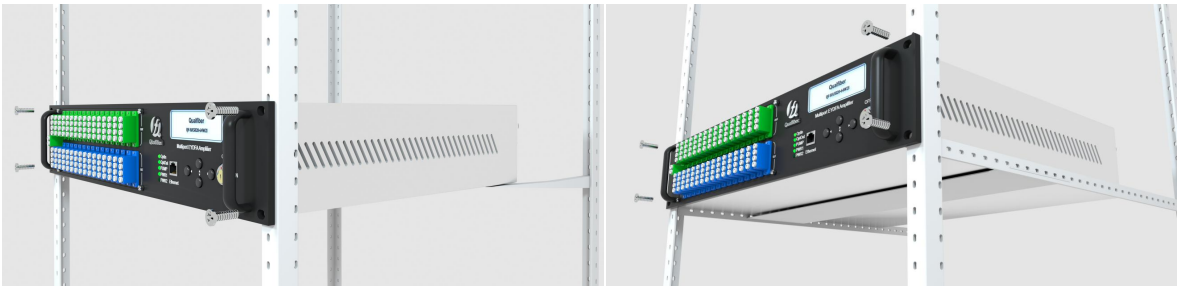
Chapter 3

EDFA Chassis Installation

1. Please use the tray in priority to place the EDFA in the network cabinet.

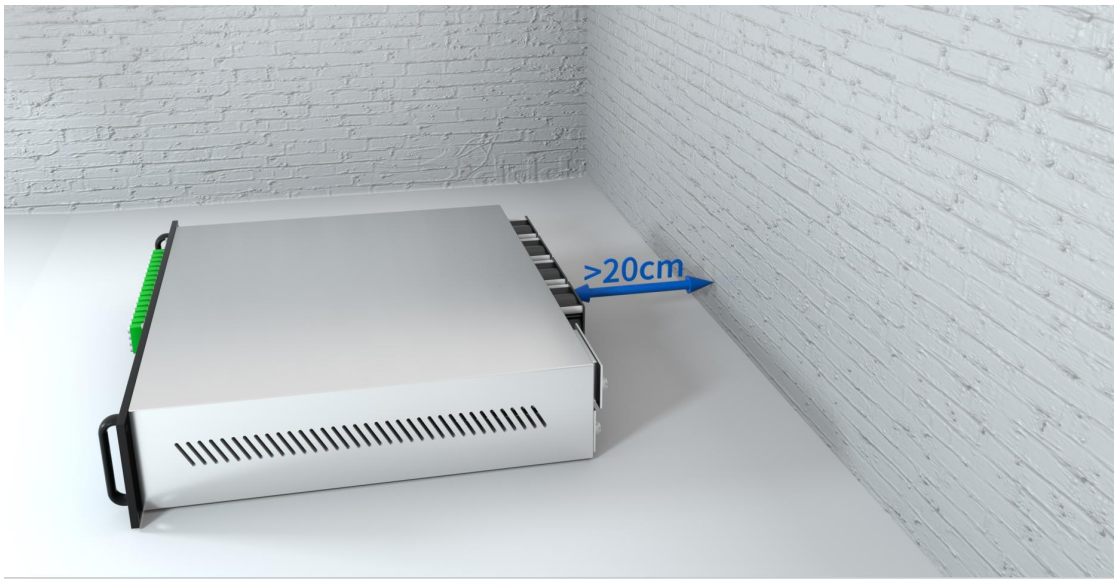
Because of the EDFA heavier than passive device, for example, PLC splitter patch panel .

2. If you insist to install the EDFA via screws, please use 4 screws on front side, and at least 2 underlay pole or 1 underlay bar on the rear or bottom.

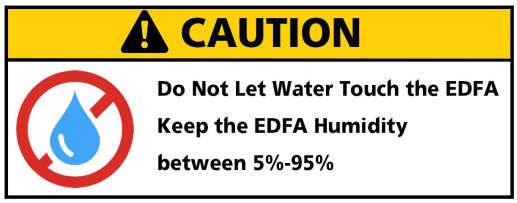


Attentions of Installing EDFA any place else

1. For good heat dissipation, please keep the EDFA rear at least 20cm to wall or other shelter, especially when the environment temperature above 35℃.



2. Avoid excessive humidity near and above the EDFA to cause water condensation to affect the use of the equipment. Relative humidity between 5%~95%.

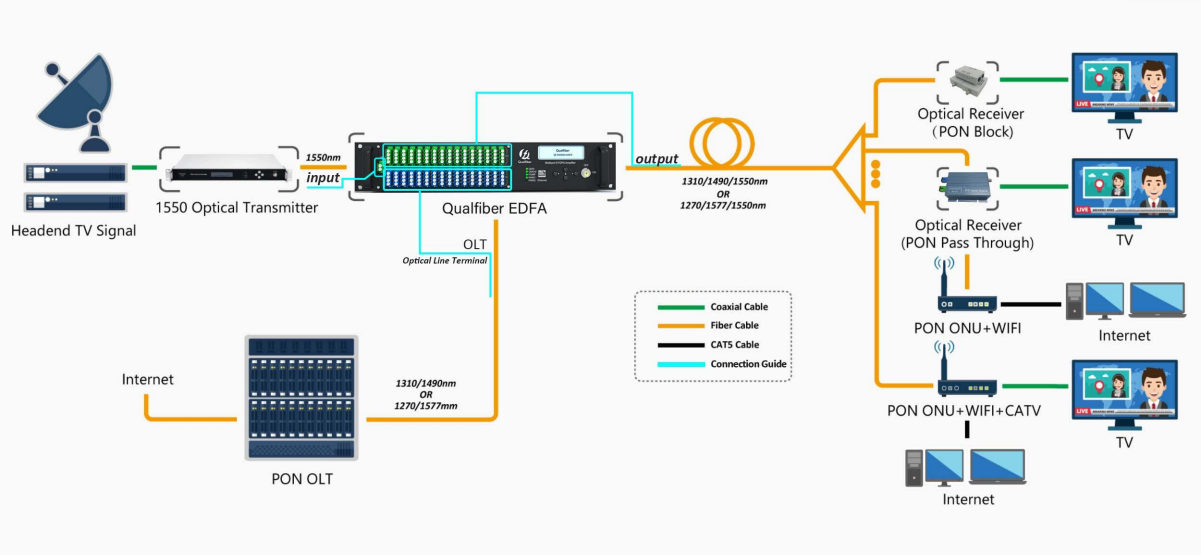


3. When the weather is dry and it is easy to cause touch static reaction, please use an anti-static wristband or other equipment to eliminate static electricity before operating

Chapter 5

Cable Laying of EDFA

Optic Cable Laying

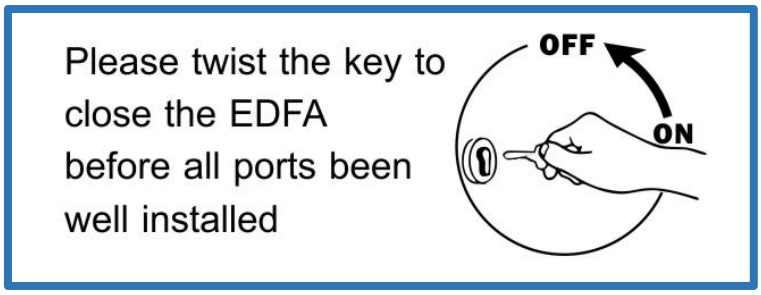


Network Cable Laying for Management

Plug and Pull out of the Optic Cable

Plug and Pull out of the Optic Cable

Before turning on the EDFA, please do plug or pull optic cable with connectors, please make sure that the connector is inserted firmly or has been pulled out smoothly.



Eye Protection when Operating

Qualfiber EDFA fiber optic port adhere to the standard Laser Class 1M. IEC 60825-1.(Eyesafe for normal viewing). However, please DO NOT stare at the ports of EDFA for long time.

A laser can be classified as Class 1M if the power that can pass through the pupil of the naked eye is less than the AEL for Class 1, but the power that can be collected into the eye by typical magnifying optics (as defined in the standard) is higher than the AEL for Class 3B.