

Photoelectric Adapter XC-UPC-SC-UPC Datasheet 01

Building an Efficient Fiber Infrastructure.

Overview

A photoelectric adapter is used to connect an XC connector of a power over fiber (PoF) cable to an SC connector. It can also be used with a multimeter to check the circuit continuity and optical performance of the PoF cable.

Features & Benefits

- Excellent optical performance
- Stable environment performance
- Small size and simple structure
- Zirconia ceramic sleeve material

Structure



Specifications

Adapter type	XC/UPC-SC/UPC
Insertion loss	Maximum value ≤ 0.2 dB
Reseating times	≥ 50 times
Reseating force	SC end ≤ 19.6 N XC end ≤ 19.6 N
Tensile strength of locking mechanism	≥ 40 N
Color	White

Contact resistance	XC end $\leq 20\text{ m}\Omega$
Insulation resistance	XC end $\geq 500\text{ m}\Omega$
Flame retardant rating	UL94-V0
RoHS	Compliant

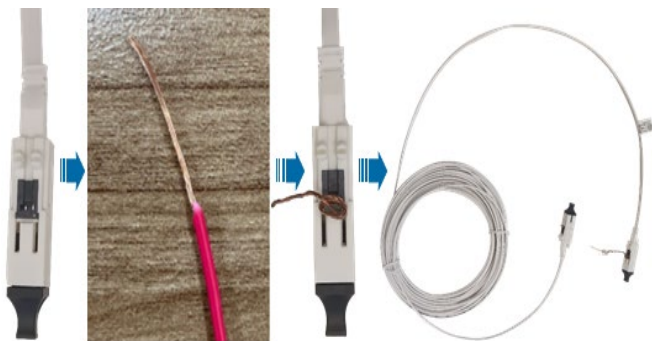
Environmental Specifications

Operating temperature	-10°C to $+65^{\circ}\text{C}$
Storage temperature	-40°C to $+70^{\circ}\text{C}$
Operating humidity	$\leq 95\%$ ($+40^{\circ}\text{C}$)

Operation Guide

PoF Cable Conductivity Test

Step 1 After PoF cable routing, connect one end of the PoF cable to an XC adapter and bind the two electrodes together using a copper wire.



Step 2 Connect the other end of the PoF cable to the XC adapter. Set the multimeter to the diode/buzzer gear and connect the two probes to the two electrodes of the XC adapter. If 0 is displayed on the multimeter and beep sounds are heard, a loop is formed between the two electrodes of the PoF cable. This indicates that no open circuit occurs, that is, the PoF cable is intact.

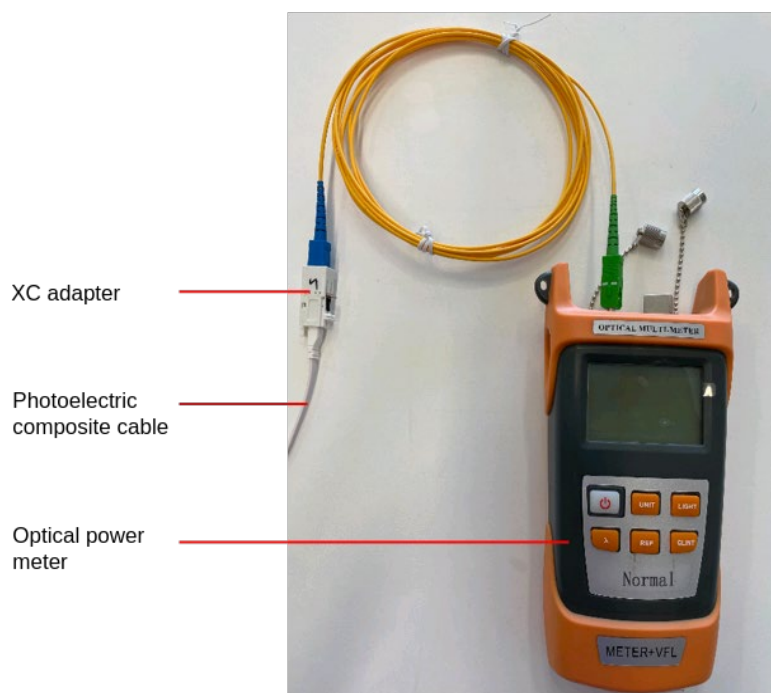


Step 3 If the preceding situation does not occur, the photoelectric composite cable is broken. In this case, take out the photoelectric composite cable for analysis and locate the fault, and replace the photoelectric composite cable with a new one.

----End

PoF Cable Optical Performance Test

Step 1 After optical cables are routed, power on the device and send optical signals. Remove the PoF cable connected to an enterprise slave FTTR unit, use the XC adapter and patch cord to connect the cable, and connect the optical power meter to measure the optical power. The optical power must be greater than or equal to -28 dBm.



NOTICE

Ensure that the end face of the optical cable connector is clean and free of contamination before inserting the optical cable.

Step 2 If the test result meets requirements, insert the PoF cable into the enterprise slave FTTR unit again. If the requirements are not met, clean the end face and perform the test again. Then, check the cable routing path (especially the bending positions). If a broken or severely bent section exists, rectify the routing. If the fault persists, replace the PoF cable with a new one.

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