

FC610F Single/Multi-Mode Converters

Overview

HiOSO Ficom FC610F series single/multi-mode converters are applied to 100Mbps fast Ethernets with hybrid wiring of single-mode and multi-mode fibers. Ficom FC610F series single/multi-mode converters can implement mutual conversion between single-mode and multi-mode 1310nm wavelength as well as mutual conversion among 850nm, 1310nm and 1550nm wavelength, and implement signal trunking, so that transmission distance of signal in multi-mode fiber can be extended longer. FC610F supports transmission in dual-fiber multi-mode, dual-fiber single-mode and single-fiber single-mode fibers.

Features

- Protocol supported: IEEE802.3u 100BASE-FX
- Supporting full-duplex and half-duplex network communications, with auto-negotiation capability;
- Capable of mutual conversion between 850nm/1310 multi-mode fibers and 1310nm/1550nm single-mode fibers, and supporting direct and transparent transmission of packets in different lengths;
- Supporting the transmission of extra-long packets over VLAN;
- Supporting Quality of Service (QoS) and ensuring transmission of VoIP packets;
- Supporting Spanning Tree Protocol (STP) to form a redundant network;
- Low power consumption, low heat and capable of stable operation for a long period time;
- Supporting multiple types of fiber ports, such as dual-fiber multi-mode、dual-fiber single-mode and single-fiber single-mode, to satisfy the extended requirements of users.

Application

100Mbps optical Ethernet network with long-distance transmission

Pictures



Technical Specifications

Parameters	Specifications
Access mode	100Mbps
Standard	Ethernet, IEEE802.3u, 100Base-TX/FX Fast Ethernet, IEEE802.1q VLAN, IEEE802.1p QoS, IEEE802.1d Spanning Tree
Wavelength	850nm/1310nm/1550nm
Transmission distance	Dual-fiber multi-mode: 2Km; Dual-fiber single-mode: 25/40/60/80/100/120Km; Single-fiber single-mode: 25/40/60/80/100Km
Port	One multi-mode fiber port: Multi-mode – SC or ST (fiber size: 50,62.5/125μm) One single-mode fiber port: Single-mode SC/FC fiber port (fiber size: 9/125μm) Single-fiber single-mode – SC/FC fiber port (fiber size: 9/125μm)
Conversion mode	Medium conversion
Delay	< 0.9μs
Bit error rate	<1/1000000000
MTBF	100,000 hours
LED	POWER (power)

	SM LINK (single-mode fiber link) SM ACT (single-mode fiber link action) MM LINK (multi-mode fiber link) MM ACT (multi-mode fiber link action)
Power	DC5V 1A
Power consumption	3.5W
Operating temperature	-10~55°C
Operating humidity	5%~90%
Storage temperature	-40~70°C
Storage humidity	5%~90% (non-condensing)
Dimensions	24mm(H)*59mm(W)*98mm(D) / (height * width * depth)

Order

Model	Rate (Mbps)	Conversion Mode	Working Wavelength (nm)	Mode A Transmission Distance	Mode B Transmission Distance	Fiber Interface	Power
FC610F-M13SC2-S13S C25/40/60	100	Multi-mode to single-mode	1310-1310	2km	25/40/60km	SC	External DC5V/1A
FC610F-M13SC2-S15S C80/100/120	100	Multi-mode to single-mode	1310-1550	2km	80/100/120km	SC	External DC5V/1A
FC610F-S13SC25-S15 SC80/100/120	100	Single-mode to single-mode	1310-1550	25km	80/100/120km	SC	External DC5V/1A
FC610F-S13SC40-S15 SC80/100/120	100	Single-mode to single-mode	1310-1550	40km	80/100/120km	SC	External DC5V/1A
FC610F-S13SC60-S15 SC80/100/120	100	Single-mode to single-mode	1310-1550	60km	80/100/120km	SC	External DC5V/1A