

User Manual for 10/100 Base TX to 100 Base FX Media Converter, Model SC09FED H

The 10/100M Fiber Ethernet Media Converter series is designed to meet the massive needs for network deployment and able to extend a copper based Fast network via fiber cable to a maximum distance up to 120KM

SC09FED H Media Converter is fully compliant with IEEE802.3, IEEE802.3U, 10/100Base-TX, 100Base-FX, standards. The installation & operation procedures are simple & straightforward. Operation status can be locally monitored through a set of Diagnostic LED's.

Technical Specifications

Standards	IEEE802.3,10 Base-T standard, IEEE802.3U, 100Base-TX/FX standard
Connector	One RJ-45connector & one SC/ST connector
Operation mode	Full duplex mode or Half duplex mode
Fiber Cable	Multi-Mode : 50/125,62.5/125 or 100/140um
	Single mode: 8.3/125,8.7/125,9/125 or 10/125um
Ethernet cable	Cat 5 UTP cable
Power Supply	230V AC External Adapter
Operation Temperature	0 °C to 60 °C
Relative Humidity	5% to 90% rh Non-condensation.
Dimensions	26mm x 70mm x 95mm

Connection & LED Indicator

Ethernet /RJ-45 interface: The transmission media is CAT5 twisted-pair with typical length of 100 meter supporting MDI/MDI-X

Fiber interface: SC/ST fiber interface is of duplex mode type with two interfaces, namely TX and RX. When the two sets of optical transceiver are interfaced to a switch with fiber interface, the fiber is in cross connection, namely "TX-RX", "RX-TX"

Basic Network Connection

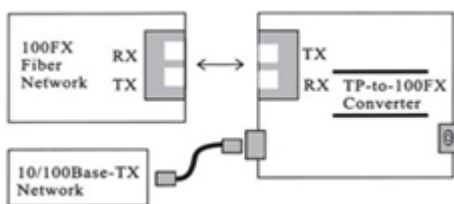


Fig.1 Basic Network Connection

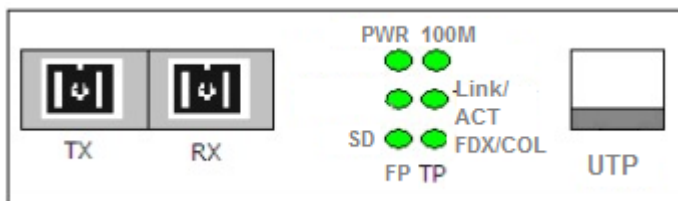


Fig.2 Front Panel


LED Functions

The following is the explanation for each LED

LED indicator lamp	Status	Explanation
FX Link/Act	On	Connection status display for fiber link "ON" indicates that Fiber link is correct
	Blink	Active status displays of fiber link "Blink" indicates packet is going through Fx end
TX Link/Act	On	Connection status display for Ethernet link "ON" indicates that Ethernet link is in correct
	Blink	Active status displays of fiber link "Blink" indicates packet is going through Tx end
FDX/COL	On	Transceiver works in the Full duplex mode
	Off	Transceiver works in the Half duplex mode
PWR	On	Power is ON and Normal.
SD	On	Fiber signal is detected
100M	On	Transfer rate of Ethernet Port is 100Mbps
	Off	Transfer rate of Ethernet Port is 10Mbps

DIP Switch Selection

SW1	ON	LFP Enable
	OFF	LFP Disable
SW2	ON	Cut-through
	OFF	Store-and-Forward
SW3,4		Blank



Note: before using LFP function, please re-power on the both converter after connecting all the copper cables and fiber patch-cords.

Fig 3. DIP switch selection

Troubleshooting

Is the power LED on the media converter ON?

Is the Power adapter of proper type (voltage and frequency) for the AC socket?

Is the power adapter properly installed in the media converter and in the socket?

Is the "Link/ACT" LED ON on the port with twisted-pair cable inserted?

Check for proper connection for Ethernet cable

Green = the media converter has selected full-duplex mode

OFF = the media converter has selected half-duplex mode

If the mode is not correct, disconnect and reconnect the twisted pair cable

Is the "LACT" LED glowing on the fiber cable port?

Check the fiber cables for proper connection

Verify that the TX and RX cables are connected to the RX and TX ports, respectively, on the 100Base-FX device.

Is the "Speed" LED glowing on a port with twisted-pair cable installed?

Check the copper cables for proper connection

Green = the media converter has selected 100Mb/s operation

OFF = the media converter has selected 10Mb/s operation

If the speed is not correct, disconnect and reconnect the twisted pair cable

If the problem still persists, pls contact us @ service@santelequip.com / +91-20-65001587