

### Managed 2-Port Fast Ethernet Media Converter:

**Model: MC102M-SFP**



### Overview

This device is an Ethernet IEEE802.3 media converter, which can realize media conversion between 2-port 10/100base-T twisted pair and optical media or extend the network transmission distance. It is mainly used for long-distance optical fiber networks (20 /40/60/80/100km) transmission and supports 10/100M transmission rate.

The device is based on the Ethernet switch chip and FPGA solution, with a remote OAM frame management function, it supports Console network management, WEB network management, and independent SNMP network management. It can also be interconnected with 2U plug-in card type 1\*optical+1\*electrical media converter card with SNMP network management in SNMP software, which can manage this device.

### Features

- The 2 ports ethernet automatically adapt to the 10/100Mbps.
- The device has the functions of crash monitoring and self-resetting, etc. It can work for a long time without crashing in a large-flow video transmission environment, greatly reducing the workload of device maintenance.

- It has a built-in large-capacity and high-speed cache, which can avoid the phenomenon of frame bursts caused by the rapid change of the monitoring picture of the IP camera in the environment of the rapid change of the monitoring picture such as the reflection of the car lights on the road at night and rain;
- It supports the transmission of VLAN ultra-long data packets, supports Ethernet packets with a maximum of 10K bytes or more, and it is suitable for some giant frame network image transmission protocols.
- The 2 Ethernet interfaces are switch ports, which can also be divided into VLANs, and can be set as 2 channels logically isolated.
- The device adopts Ethernet switching chip + FPGA solution, with remote OAM management frame function and can be interconnected with a 2U plug-in card 1\*optical+1\*electrical media converter card with SNMP network management. The device can be managed by SNMP software; it can also support Console (CLI) network management/WEB network management/independent SNMP network management;
- It supports LFP (Link Fault Pass Through) function, when either the fiber or twisted pair connecting the two ends of the transceiver fails, the device will notify the other end to display the fault information.
- The Ethernet interface with 3-level lightning protection, anti-radar to GB/T17626.5 (IEC61000-4-5) short-circuit current wave 8/20μs, open-circuit peak output voltage 6KV standard.
- The built-in power supply has multiple power options: AC220V, DC-48V/DC24V, etc., supporting AC+DC dual power backup mode.

### Parameters

- Fiber

Optical port: 1

Optical fiber: single fiber/dual fiber

Fiber Interface: FC/SC/ST/LC (SFP)



Wavelength: 850nm/1310nm multimode; 1310nm/1550nm single mode

No relay transmission distance: 20~120Km

Typical transmit power:

Single-mode 1310/1550nm:  $\geq -9\text{dBm}$

Multi-mode 850nm:  $-18\text{dBm}$

Multi-mode 1310nm:  $-25\text{dBm}$

Receiving sensitivity range:  $-28\text{dBm} \sim -40\text{dBm}$

### ● 10/100M Ethernet Interface

Protocol: IEEE 802.3, IEEE 802.3z compliant

Rate: 10/100M adaptive, full/half duplex Fully Adaptive MAC

MAC Address Table: can learn 4K MAC address

Physical interface: RJ45, supporting auto mdix (Cross/through line adaptation)

### ● Working Environment

Working temperature:  $-10^{\circ}\text{C} - +60^{\circ}\text{C}$

Storage temperature:  $-40^{\circ}\text{C} - +85^{\circ}\text{C}$

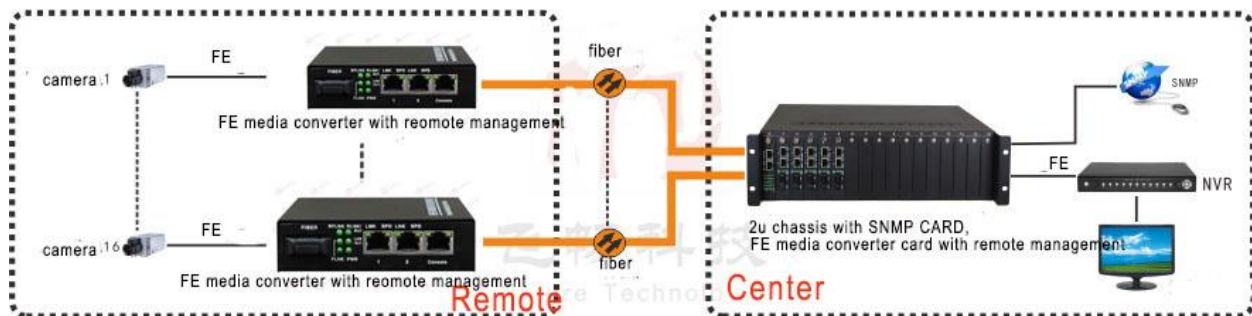
Working humidity: 0% – 95% (no condensation)

MTBF: >100,000 hours

Specification

Function Description	2 FE ethernet port fiber media converter, console/SNMP/remote management for optional
Port Description	2 FE Ethernet interfaces; 1 optical Ethernet interface, 1 console/SNMP port
Power	AC or DC power
Dimension	Dimensions:140mm (length) x 110mm (width) x 30.0mm (height)
Weight	0.5kg/set

## Application



## Packing List

EthernetMedia Converter\*1

DC5Vpower supply \*1

User manual\*1

Certificate of quality\*1

Warranty card\*1