2*10/100/1000Base-T to 2*100/1000Base-X

Compact Industrial Media Converter

DK-MC10G-2T2S-E

Features

- 2*10/100/1000Base-T RJ45 ports, 2*100/1000Base-X SFP ports
- DC 12~58V input, redundant power supply with polarity reverse/over-voltage protection
- Powerful Dip switch function:

  1. Fiber redundant; 2. Flow control;

  3.Broadcast storm restrain; 4. Fiber ports 100/1000M selection
- Support 10K Bytes Jumbo frame and 1M large buffer
- Support 4KV surge protection and ESD: Air-15kV, Contact-8kV Protection
- IP40 fan-less and Din-rail hardware design with compact size (30*85*85mm)
- Operation temperature: -40℃ ~+75℃

Overview

The DPTEK DK-MC10G-2T2S-E is the unmanaged industrial grade media converter with 2-port 10/100/1000-T RJ45 and 2-port 100/1000Base-X fiber optical interfaces. It is featuring with fiber redundant, flow control, broadcast storm restrain and fiber ports 100/1000M selection function, which all can be configured by the Dip switch on the top panel.

DK-MC10G-2T2S-E is also a high cost-effective easy-to-use device, which provides essential industrial Ethernet

networking function, such as wide range power input 12-58VDC, redundant power design with polarity reverse/over-voltage protection, robust IP40 fan-less compact housing with Din-rail installation, wide operation temperature from -40°C to 75°C as well as high-level EMI/EMC capability and so on. It is the best choice for heavy industrial factory, transportation, oil & gas, chemical, IP Surveillance and processing automation area where environmental conditions exceed commercial product specifications.

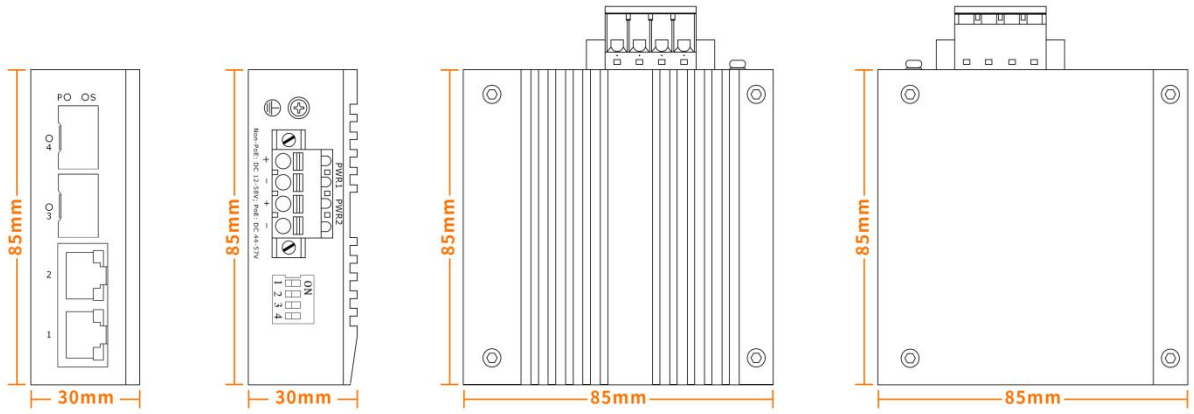
Technical specification

<table>
<tr><th>Model No.</th><th colspan="4">DK-MC10G-2T2S-E</th></tr>
<tr><td rowspan="2">Interface</td><td colspan="2">Fiber ports</td><td colspan="2">Copper RJ45 ports</td></tr>
<tr><td colspan="2">2</td><td colspan="2">2</td></tr>
<tr><td>Ethernet</td><td colspan="4">2*10/100/1000Base-T RJ45
2*100/1000Base-X SFP</td></tr>
<tr><td>Standard</td><td colspan="4">IEEE 802.3 10Base-T Ethernet
IEEE 802.3u Fast Ethernet
IEEE 802.3ab Gigabit Ethernet
IEEE 802.3x Full-Duplex Flow Control
IEEE 802.3az Energy Efficient Ethernet</td></tr>
<tr><td>Dip Switch</td><td colspan="4">1. Fiber redundant
2. Flow control
3. Broadcast storm restrain
4. Fiber ports 100/1000M selection</td></tr>
<tr><td rowspan="8">LED Indicators</td><td rowspan="2">P(Power indicator) Green</td><td colspan="3">Off: the device is power off or failed</td></tr>
<tr><td colspan="3">On: the device power on is normal</td></tr>
<tr><td rowspan="2">S(System indicator) Red</td><td colspan="3">Off: the chip is normal</td></tr>
<tr><td colspan="3">On: the chip read/write is unnormal</td></tr>
<tr><td rowspan="4">1-2 (Copper ports)</td><td>Green indicators</td><td colspan="2">Yellow indicators</td></tr>
<tr><td>Off: ports link down</td><td colspan="2">Off: port speed is 10/100M</td></tr>
<tr><td>On: ports link up</td><td colspan="2" rowspan="2">On: port speed is 1000M</td></tr>
<tr><td>Blinking: data on TX/RX</td></tr>
<tr><td rowspan="3">3-4 (Fiber ports) Green</td><td colspan="3">Off: ports link down</td></tr>
<tr><td colspan="3">On: ports link up</td></tr>
<tr><td colspan="3">Blinking: data on TX/RX</td></tr>
<tr><td colspan="5">Power parameters</td></tr>
<tr><td>Input voltage</td><td colspan="4">12-58VDC, redundant power input</td></tr>
<tr><td>Input current</td><td colspan="4">0.3A Max</td></tr>
</table>

Total power consumption	Full loading ≤3W
Connector	Removable 4-pin terminal block
Reverse polarity protection	Support
Over-voltage protection	Support
Switching features	
Switching capacity	8G
Packet forwarding rate	11.9Mpps
MAC address table	8K
VLAN	4K
Buffer	1M
Forwarding delay	<5us
Jumbo Frame	Support 10Kbytes
MDX/MIDX	Support
Watchdog	Support
Network Topology	
Star topology	Support
Bus topology	Support
Tree Topology	Support
Mechanical structure	
Case protection	IP40
Installation method	Din-rail
Dimension(W*D*H)mm	30*85*85mm
Weight	0.22 kg
Operating environment	
Operating temperature	-40℃~+75℃
Storage/transportation temperature	-40℃~+85℃
Relative humidity	5%~95% （non-condensing）
Industrial Standard	Surge protection of power: IEC 61000-4-5 Level 3 (4KV/2KV) (8/20us)
	Surge protection of Ethernet ports: IEC 61000-4-5 Level 3 (4KV/2KV) (10/700us)

	DIP: IEC 61000-4-11　Level 3（10V）
	ESD: IEC 61000-4-2　Level 4（8K/15K）
	Shock：IEC 60068-2-27
	Free fall：IEC 60068-2-32
	Vibration：IEC 60068-2-6
Certification	CE/FCC/RoHS
Warranty	5 years

Structure diagram



Order information

Model	Description
DK-MC10G-2T2S-E	10/100/1000Base-T to 1000Base-X unmanaged compact industrial media converter with 2*10/100/1000Base-T RJ45 ports and 2*100/1000Base-X SFP slots, DC12-58V input, redundant dual power supply, Din-rail installation. Fiber port transmission distance depending on the SFP module; Operation temperature: -40°C～+75°C