### **PDH**

## Fiber Transmission Equipment

#### Overview

Huahuan provides traditional PDH equipments from 1×E1 to 16×E1s as well as newer types with a variety of service interfaces such as V.35, Ethernet etc. Thus we can meet the continued demands of telecommunication operators and end users. H10MO series optical terminal equipments employs all-digital ASIC technology developed on our own, together with the patented jitter attenuation, digital phase locked loop, clock recovery and E1 interference immunity interface technologies. Auxiliary data channels and order wires of RS232, RS485 and V.35 are supported. Integrated management is supported. H10MO series are also featured as small size, lightweight, low power consumption, high interference resistance and high reliability.

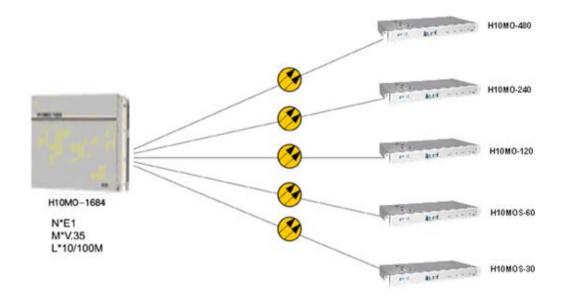
#### Features

- 1. Adopt high reliability and low consumption ASIC chip
- 2. Full testing and monitoring abilities for easy operation and maintenance
- 3. Unified network management platform
- 4. Ethernet link reaches line speed and speed limiting can be set.
- 5. Ethernet supports 10/100M, half/full duplex auto-negotiation and HP auto-MDIX.
- 6. Provide various power supply options (AC 220V, DC -48V, +24) and dual power supply.
- 7. Provide SC or FC fiber interface and various fiber power budget option for short or long haul purpose as well as 1+1 protection.



# Typical Application





## **▶** Technical Specifications

Items	Technical Specifications	
Model and Interface	H10MO-480	16×E1/G.703
	H10MO-240	8×E1/G.703
	H10MO-240B	8×E1/G.703+1×Ethernet
	H10MO-120+	4×E1/G.703
	H10MO-120B	4×E1/G.703+1×Ethernet
	H10MOS-60	2×E1/G.703
	H10MOS-60AF	1×E1/G.703+1×V35
	H10MOS-60B	2×E1/G.703+1×Ethernet
	H10MOS-30	1×E1/G.703

Items	Technical S	Specifications			
Model and	H10MOS-30AF H10MOS-30B		1×V35		
Interface			1×E1/G.703+	-1×Ethernet	
Rack type	H10MO-1684		With 14 service slots, the upper various modules above can be inserted into the H10MO-1684		
E1 interface	2.048Mbps±5	Comply with ITU-T G.703  2.048Mbps±50ppm  75Ω(coaxial)/120Ω(twisted pairs)			
Ethernet interface	optional	Comply with IEEE 802.3, 10/100Base-Tx Line Speed is available (speeding limiting can be set, step size is 1M)			
	Connector	SC or FC			
		Item			
		1310nm (standard)			
Optical Interfaces	Ontical Case	1310nm (long haul,	optional)		
	Optical Spec	1550nm (DFB, long haul, optional)			
		Bi-directional single fiber (Optional)			
		1+1 optical protection			
Data path	Interface Data rate	One RS-458 channel and one RS-232 channel ≤116K			
Monitor and alarm	Unified netwo	Unified network management platform			
Order wire	Hotline	Hotline			
	AC		220V (165V~265V)		
Power supply	DC		-48V(-36V~-72V) +24(+18V~+36V)		
	Dual Power (optional)		AC(220V) and DC(-48V)		
	Power consumption		Different model varies: 5W~10W		
	H10MO-480 H10MO-240 H10MO-240B H10MO-120+ H10MO-120B		W×H×D (mm): 440×44×138 (Different model may slight varies)		
Dimension	H10MOS-30 H10MOS-30AF H10MOS-60 H10MOS-60B H10MOS-30B		W×H×D(mm):220×4	44×138 or 440 × 44 × 138	
	H10MO-1684		W×H×D(mm):436×3	354×297	
Installation	Rack mount, desktop, wall mount				



## Ordering Information

4E1 PDH Multiplexer	H10MO-120+/ACDX	4E1 PDH Multiplexer, 220V AC/ -48V DC. E1 supports 75ohms (BNC). RS485, OW Phone socket Default is Single mode, 1310nm, 40km.
4E1 PDH Multiplexer	H10MO-120+U/ACDX	4E1 PDH Multiplexer, 220V AC/ -48V DC. E1 supports 120ohms (RJ45). Default is Single mode, 1310nm, 40km.
4E1 + FE PDH Multiplexer	H10MO-120B/ACDX	4E1 + 1FE PDH Multiplexer, 220V AC/ -48V DC. E1 supports 75ohms (BNC). RS485, OW Phone socket Default is Single mode, 1310nm, 40km.
4E1 + FE PDH Multiplexer	H10MO-120B+U/ACDX	4E1 + 1FE PDH Multiplexer, 220V AC/ -48V DC. E1 supports 120ohms (RJ45). OW Phone socket Default is Single mode, 1310nm, 40km.
4E1 + FE PDH Multiplexer	H10MO-120B/H+U/ADX	4E1 + 1FE PDH Multiplexer, 220V AC/ -48V DC. E1 supports 120ohms (RJ45). Default is Single mode, 1310nm, 40km. (other distances and single-strand options are also available)

A= Type of power supply

Default: AC220V power supply

8: DC-48V power supply

E: Dual Power Supply

C= Type of optical fiber 1+1 protection
Default: Not optical fiber 1+1 protection
P: with optical fiber 1+1 protection

D= Type of interface connector

Default: SC Duplex F: FC Duplex

X= Type of optical interface

Default: S1.1

L: 1310nm, high power B: 1550nm, high power, DFB S: Single fiber 1310nm S5: Single fiber 1550nm

H10MO-120: 4E1 H10MO-240: 8E1 H10MO-480: 16E1

2E1 PDH Multiplexer	H10MOS-60W/EDX	2E1 PDH Multiplexer, 220V AC/ -48V DC. E1 supports 75ohms and 120ohms (RJ45). Optical interface default is single mode, 1310nm, 40km.
1E1+1V.35 PDH Multiplexer	H10MOS-60AFW/EDX	1E1+1V.35 PDH Multiplexer, 220V AC/ -48V DC. E1 supports 75ohms and 120ohms (RJ45). Optical interface default is single mode, 1310nm, 40km.
2E1+FE PDH Multiplexer	H10MOS-60BW/EDX	2E1+FE PDH Multiplexer, 220V AC/ -48V DC. E1 supports 75ohms and 120ohms (RJ45). Optical interface default is single-mode, 1310nm, 40km.

E: Dual Power Supply

D= Type of interface connector Default: SC Duplex F: FC Duplex

X= Type of optical interface

Default: S1.1

L: 1310nm, high power

B: 1550nm, high power, DFB

S: Single fiber 1310nm

S5: Single fiber 1550nm



E1 Optical Modem	H10MOS-30/ADX	E1 optical modem (unframed). 220V AC or -48V DC. E1 supports 75ohms and 120ohms (RJ45). Default is single mode, 1310nm, 40km.
V.35 Optical Modem	H10MOS-30AF/ADX	V.35 optical modem (framed and unframed). 220V AC or -48V DC. Optical interface default is single mode, 1310nm, 40km.
FE1 Optical Modem	H10MOS-F30-I/ADX	E1 optical modem (framed and unframed). 220V AC or -48V DC. E1 supports 75ohms and 120ohms (RJ45). Default is single mode, 1310nm, 40km.
V.35 Optical Modem	H10MOS-30AF-I/ADX	V.35 optical modem (framed and unframed). 220V AC or -48V DC. Optical interface default is single mode, 1310nm, 40km.
FE Optical Modem	H10MOS-FE30-I/ADX	Ethernet optical modem (framed and unframed). 220V AC or -48V DC. Optical interface default is single mode, 1310nm, 40km.

A= Type of power supply
Default: AC220V power supply

8: DC-48V power supply
E: Dual Power Supply
D= Type of interface connector

Default: SC Duplex F: FC Duplex

X= Type of optical interface Default: S1.1

L: 1310nm, high power B: 1550nm, high power, DFB S: Single fiber 1310nm S5: Single fiber 1550nm