

Product Information

HES12GM-8E Series

12G-port full Gigabit Managed Ethernet switches with
8 IEEE 802.3af/at PoE+ ports



Features

- ❖ 8 10/100/1000BaseTX RJ-45 Ports (All ports support IEEE 802.3af/at PoE+)
- ❖ -40°C to +75°C Operating Temperature
- ❖ PoE+ Reset function: hardware or software control of power recycling of PoE+ ports (this function is optional for a DIP Switch)
- ❖ Smart PoE+ over current, over temperature and short circuit protection
- ❖ Redundant Power Input (44~57VDC)

Introduction

The HES12GM-8E Series are full gigabit managed PoE+ Ethernet switches that come standard with 8 10/100/1000BaseT(X), 802.3af (PoE), and 802.3at (PoE+)-compliant Ethernet ports, and up to 4 Gigabit SFP fiber ports. Each POE+ port is able to offer up to 30 watts power for PD device. The power input ranges from 44~57VDC. The switch is installed with Din-rail or panel mount.

The HES12GM-8E Ethernet switches are highly versatile, and the SFP fiber ports can transmit data up to 120 km from the device to the control center with high EMI immunity. The Ethernet switches support a variety of management functions, including RSTP, RingOpen, RingOn, PoE power management, PoE device auto-checking, PoE power scheduling, IGMP, VLAN, QoS, bandwidth management.

Specifications

Technology	
Standard :	IEEE802.3af/at, 802.3, 802.3u, 802.3x, 802.3ab, 802.3z, 802.1w, 802.1Q, 802.1p
Processing Type :	Store and forward
Broadcast Storm :	Automatic Broadcast Storm Control
Flow Control :	Full Duplex Flow Control, Half Duplex Back Pressure Control
Protocols :	SNMP V1/V2c/V3, RingOn/RingOpen, HTTP/HTTPS, LLDP, DHCP Client, IGMP Snooping/GMRP, Telnet, Syslog
Software Functions :	• RingOn Redundant Ring Technology: Recovery time less than15ms • VLAN: Port Based VLAN, IEEE 802.1Q Tag VLAN • Port Trunking • Built-in Web Server, remote management and configuration through browser • Quality of Service : Determined by port, tag(CoS), and IPv4 different service(DSCP) • IGMP Snooping /GMRP • Static MAC Address Forwarding • SNMP V1/V2c/V3 • RSTP • LLDP • On-line Software Upgrading • Automatic warning by exception through e-mail or relay output • System Log • DHCP Client • Port Mirror: Supports TX, RX, and both packet • Broadcast storm control and Port-Based traffic control • IP Security: 10 IP address entries for permission to access management functions
Switch Properties	
MAC Table Size :	8K
Packet Buffer Size :	512K
Jumbo Frame Size :	Supports up to 16KB

Interface	
RJ45 Port :	Auto-negotiation 10/100/1000Base-T, Full/Half Duplex, Auto-MDI/MDIX
Fiber Ports :	100/1000Base-X SFP interface. SFP module is MSA-compliant.
PoE+ Pin out :	V+, V+, V-, V-, for pin 4, 5, 7, 8 (Midspan)
Console port :	RJ45
DIP Switch :	Dial switch
LED Indicators :	P1, P2, Link, State, MAX, POE+ (1~8)
Alarm :	Relay, Email
Relay output :	Standard 2-pin terminal blocks
Power Requirements	
Input Voltage :	44~57VDC
Power budget :	325W MAX
Input Connection :	Standard four terminal power input
Physical Characteristics	
Case :	Slim Metal Case, IP30 Design
Dimensions :	45×173×120mm (W*H*D)
Installation :	DIN Rail or Panel Mounting
Optical Fiber	
Mode	Single Mode
Transmission Distance	20km
Centre Wavelength	1310nm
Cable Size	9/125um
TX Power(dBm)	-8~-2dBm
RX Power(dBm)	< -24dBm
Transmission Rate	1000Mbps
Environment Limits	
Operating Temp. :	Standard Models: -10 to 60℃ Wide Temp. Models: -40 to 75℃
Storage Temp. :	-40 to 85℃
Ambient Relative Humidity :	5 to 95%(Non-condensing)

Standards and Certifications	
Safety :	EN60950, UL60950, IEC60950
EMI :	FCC Part15, CISPR(EN55022) Class A
EMS :	EN61000-4-2(ESD) Level 3, EN61000-4-3(RS) Level 3, EN61000-4-4(EFT) Level 3, EN61000-4-5(Surge) Level 3, EN61000-4-6(CS) Level 3, EN61000-6-2
Shock :	IEC 60068-2-27
Freefall :	IEC 60068-2-32
Vibration :	IEC 60068-2-6

Warranty	
Warranty Period :	3 years

Ordering Information

HES12GM-8E

HES12GM-8E-4SFP-2VL	Din-rail Managed, 8 x 1000Mbps POE+ Copper Port, 4 x 1000Mbps SFP Fiber Port, Industrial Temperature -10 to +60 °C, Power Input 44~57VDC
HES12GM-8E-4SFP-2VLW	Din-rail Managed, 8 x 1000Mbps POE+ Copper Port, 4 x 1000Mbps SFP Fiber Port, Industrial Wide Temperature -40 to +75 °C, Power Input 44~57VDC