

8-Port Gigabit +12G SFP Industrial Fast Ring Managed PoE Switch

Product Overview

A Management ring-network industrial PoE. It has 8*10/100/1000Mbps adaptive RJ45 ports and 12 independent Gigabit SFP fiber module expansion slots. Ports 1-8 RJ45 all support PoE power supply, each port up to 30W. Support static routing functions, provide perfect security, QoS, and plenty of VLAN function has ring network function, can form a ring network, Switch between by hand in hand form a ring network topology, the redundancy, high reliability characteristics can make in a ring online link disconnected all the way, will not affect the forwarding of data on the network. The device adopts no fan, low power consumption design, has the advantages of easy to use, compact and beautiful, simple installation. The product is designed to meet Ethernet standards, with lightning protection, static protection mechanism, operating temperature range of -40°C to 75°C, stable performance, safety and reliability, can be widely used in intelligent transportation, telecommunications, security, financial securities, customs and other broadband data transmission fields.

Product Features

- Supports IEEE802.3u, IEEE802.3ab, IEEE802.3z, and IEEE802.3x standards;
- PoE supports IEEE 802.3af/at standards and provides a maximum output of 30W for each port;
- Data transmission and power supply distance up to 100 meters;
- Supports IEEE802.3x full-duplex flow control and Backpressure half-duplex flow control;
- Panel indicators monitor working status and assist in fault analysis;
- High energy aluminum alloy roof heat conduction groove design;
- Supports one-click ring network and one-click storm suppression, featuring redundancy and high reliability;
- High reliability design, supporting traditional STP/RSTP layer 2 link protection technology;
- Supports manual aggregation and dynamic aggregation, which increases link bandwidth, improves link reliability, and implements load balancing and link backup;
- Flexible and convenient management and maintenance. Supports various management modes, such as Console, Telnet, and SSH;
- Supports WEB management, which is simple and efficient, and facilitates installation and debugging by engineering and maintenance personnel;
- Supports file upload and download management through TFTP.

Product Specifications

Hardware Specification

Model	20119184
Standard	IEEE 802.3, IEEE 802.3u, IEEE 802.3ab, IEEE 802.3z, IEEE 802.3x, IEEE 802.1X, IEEE 802.1q, IEEE 802.1p, IEEE 802.1d, IEEE 802.1w, IEEE 802.3ad, IEEE802.3af, IEEE802.3at
Interface	8*10/100/1000Mbps RJ45 Ports 12*1000Mbps SFP Slots 1 Console Port
Indicator	PWR, LNK/ACT, PoE, SYS
Network Media	10BASE-T: UTP category 3,4,5 cable (≤100m) 100BASE-TX: UTP category 5, 5e cable (≤100m) 1000BASE-T: UTP category 5e, 5 cable (≤100m) 1000BASE-X: MMF, SMF
MAC Address Table	8K, Auto-learning, Auto-aging
Jumbo Frame	9216Byte
Packet Buffer	4.1M bit
Transfer Mode	Store-and-forward
Packet Forward Speed	29.76Mpps
Switching Capacity	40Gbps
Dimensions (L*W*H)	145*109*62mm
Fan Quantity	Fanless
Power Supply	200W
PoE Power Budget	180W
PoE Port	Port1~8
PoE Power on RJ45	Mode A 1/2 (-) , 3/6 (+)
PoE Power Output	30W (MAX)
<u>Green Energy Saving</u>	IEEE 802.3az
Input Power Supply	DC:48-57V
Operating Temperature	-40°C ~ 75 °C
Storage Temperature	-40 °C ~ 80 °C
Operating Humidity	10% ~ 90% non-condensing
Storage Humidity	5% ~ 90% non-condensing
Surge Protection	Differential mode ±2KV Common mode ±6KV
MTBF	>100000 hour
Electrostatic Standard	Contact ±6KV, Air ±8KV

Software Specification

		MAC Address Size
	MAC Address Table	MAC Aging Time
		MAC Filter
		MAC Notification
		Console/Telnet/SSH
		Http/Https、SSL/TLS
		FTP/TFTP
		Syslog
	Basic Management	SNMP(v1/v2c/v3)、SNMP Trap
		SNTP/NTP
		CPU protect
		Software/Hardware watchdog
		Firmware Upgrade/Backup
		Ping/Traceroute
		Bandwidth Control
		Flow Control
		EEE
		MTU
	Port Config	CFM(802.1ag)
		EFM OAM(802.3ah)
		DDM
L2 Features		Storm Control
		Port Isolation
		Port Security
		Virtual Cable Test
		ULDP/Cisco UDLD
	Discovery	LLDP(802.1ab)
		LLDP-MED
		Static
	(Link Aggregation)	LACP(802.3ad)
		Load Balance(src-mac/dst-mac/src-ip/dst-ip)
		Max groups and ports per group
		VLAN(802.1Q 4K)
		Access/Trunk/Hybrid
		Private VLAN
	VLAN	VLAN Filter
		MAC-based VLAN
		Protocol-based VLAN
		IP Subnet-based VLAN
		Voice VLAN
		GVRP/GMRP
		QinQ/Selective-QinQ/Flexible QinQ

		VLAN Translation/N:1	VLAN Translation
		Guest VLAN	
	Network Loop Detection	Loopback Detection	
		ERPS	
		STP/RSTP/MSTP	
	Spanning Tree	MSTP Support 64 instance	
		BPDU Guard/Root Guard/BPDU Tunnel	
		Static ARP	
		ARP Scanning Prevention	
		ARP Spoofing Prevention	
	ARP	ARP Guard	
		Gratuitous ARP	
		Dynamic ARP Inspection	
		ARP Quantity Control	
		Anti ICMP Attack	
	ICMP	ICMP Rate Limit	
		ICMP Unreachable Drop	
		Static Route	
	IP Forward	Route Aggregation	
		DCSCM	
	Control Multicast		
	Multicast VALN	Multicast VALN	
		IGMP SNOOPING V1/V2/V3	
	IGMP	Fast Leave	
		IGMP Proxy	
		DHCP Server	
		DHCP Client/BOOTP	
	DHCP	DHCP Relay	
		DHCP Snooping	
		DHCP Option 82/43/60/61/67	
		DHCPv6 Server	
		DHCPv6 Relay	
	DHCPv6	DHCPv6 Snooping	
		IPv6 SAVI	
		Security RA	
	IPv6 Unicast Routing	Static Route	
	IPv6 Multicast Routing	MLD v1/V2 Snooping	
		SNMP over IPv6 Support	
		HTTP over IPv6 Support	
		SSH over IPv6 Support	
	IPv6 Features	DNS over IPv6 Support	
		IPv6 ping/traceroute Support	
		IPv6 Telnet Support	
IPv4 Related Function			
IPv6 Related Function			

		IPv6 Radius+ Support
		IPv6 Tacacs+ Support
		IPv6 SNTP/NTP Support
		IPv6 FTP/TFTP Support
		IPv6 IPsec Support
		IPv6 ACL
	Basic	Trust COS/DSCP
		Trust Port
		SP
	Scheduling	WRR
		WDRR
		Based on VLAN
	PolicyMap Stream	Based on COS/DSCP
		Aggregate PolicyMap
		Ingress PolicyMap
QoS(Quality Of Service)	Policing	CAR Stream Shaping(leak algorithm)
		Ingress Policing
		COS/802.1p Priority
		IP Precedence
	Rewrite	IPv4 DSCP/IPv6 DSCP
		drop-precedence
		internal-priority
		Ingress/Egress Rewrite
		DSCP to DSCP mapping
		DSCP to DP mapping
	Queuing	DSCP to Queue mapping
		COS to DP mapping
		COS to Queue mapping
		SIP/DIP
	IP-ACL	IP Protocol
		IP Priority(DSCP,TOS, Precedence)
		TCP,UDP src,dst Port
		SRC/DST MAC
ACL	MAC-ACL	VLAN
		COS
		Tag/Untag
	IP-MAC ACL	MAC-ACL and IP-ACL
	User-defined ACL	Based on user-defined profile
		Based on time period ACL
	ACL Features	ACL on VLAN
		Based on ACL Stream
	802.1x	Port Based Authentication
		Support EAPoR

		MAC based Authentication
		Guest VLAN
	MAB	Based on Port Authentication
		Based on MAC Authentication
Security	MAC Address Count Limit	Based on Port
		Based on VLAN
	IP Address Count Limit	Based on Port
		Based on VLAN
	Access Management	Based on source mac and IP address
		TCP Flag
	Deny DoS Attack	TCP Fragment
		IP Segment
		ICMP
	TACACS+	Standard Support
	Radius	Standard Support
		Client, Support MD5
	SSL	Openssl 1.1.0
Redundancy Related Function	MRPP	Compatiable ERRP
	ULPP	Uplink Protection Protocol
		Smart Link/Monitor Link
	ULSM	Uplink State Monitor
		Support one-to-one, multi to one
Mirror	Mirror	Port based mirror, support ingress, egress, and both
		CPU based mirror
		Flow based mirror
		RSPAN
PoE	PoE Management	ON/OFF Config
		Alive Checking for PD
		7/24 On/Off Scheduling