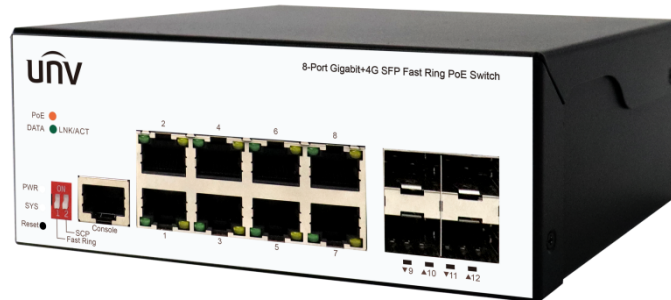# Harsh Fast Ring Managed PoE Switch

ISW5000-8GT4GP-POE-IN

Overview

ISW5000-8GT4GP-PoE-IN is a managed Ring-network harsh PoE switch independently developed by Uniview. It has 8*10/100/1000Mbps adaptive RJ45 ports and 4*1000Mbps SFP fiber module expansion slots. 1-8 RJ45 ports all support PoE power supply, a single 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 -30◦C to 65◦C, stable performance, safety and reliability, can be widely used in intelligent transportation, telecommunications, security, financial securities, customs and other broadband data transmission fields.

Features

- 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;

- Supports one-click ring network and one-click storm suppression, featuring redundancy and high reliability;

- Highly reliable design, supporting traditional STP/MSTP/RSTP Layer 2 link protection technology;

- Support static convergence and dynamic convergence (LACP) 2 convergence modes, effectively increase the link bandwidth, improve the reliability of the link, and at the same time can achieve load balancing, 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;

Specifications

Model	KIT/1*ISW5000-8GT4GP-POE-IN/1*PWR-DC5428-A-NB
Hardware Specification	
Standards	IEEE802.3、IEEE802.3u、IEEE802.3z、IEEE802.3ab、IEEE802.3x、IEEE802.3af、IEEE802.3at
Ports Type	8*10/100/1000Mbps RJ45 Ports 4*1000Mbps SFP Slots
Switching capacity	24Gbps
Jumbo Frame	9KBytes
Forwarding performance	17.86Mpps
Packet Buffer	4.1M bit
MAC	8K
Transfer Mode	Store-and-forward
Max.PoE Power	Max capacity: 120W Max capacity for single port: 30W Mode A　1/2(-)，3/6(+)
Dimensions (W×D×H)	145*109*58mm
Operating Temperature	-30℃ to 65 ℃
Operating Humidity	5% ~ 95% non-condensing
Storage Humidity	0% ~ 95% non-condensing
Power Supply	DC:48-57V, Max.Power 135W (Powered by adapter) Adapter: AC100-240V, 50/60Hz

Indicator	PWR, LNK/ACT
Electrostatic Standard	Contact ±6KV, Air ±8KV
Surge Protection	Differential mode ±2KV Common mode ±4KV
Software Specification	
MAC Address	MAC Aging Time MAC Filter MAC Notification
Basic Management	Console/Telnet/SSH Http/Https、SSL/TLS FTP/TFTP Syslog SNMP(v1/v2c/v3)、SNMP Trap SNTP/NTP CPU protect Software/Hardware watchdog Firmware Upgrade/Backup Ping/Traceroute
Port Config	Bandwidth Control Flow Control EEE MTU CFM(802.1ag) EFM OAM(802.3ah) DDM Storm Control Port Isolation Port Security Virtual Cable Test ULDP
Discovery	LLDP(802.1ab) LLDP-MED
Link Aggregation	Static LACP(802.3ad) Load Balance(src-mac/dst-mac/src-ip/dst-ip) Max groups and ports per group

VLAN	VLAN(802.1Q 4K)
	Access/Trunk/Hybrid
	Private 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
Spanning Tree	STP/RSTP/MSTP
	MSTP Support 64 instance
	BPDU Guard/Root Guard/BPDU Tunnel
ARP	Static ARP
	ARP Scanning Prevention
	ARP Spoofing Prevention
	ARP Guard
	Gratuitous ARP
	Dynamic ARP Inspection
	ARP Quantity Control
ICMP	Anti ICMP Attack
	ICMP Rate Limit
	ICMP Unreachable Drop
IP Forward	Static Route
	Route Aggregation
Multicast VALN	Multicast VALN
IGMP	IGMP SNOOPING V1/V2/V3
	Fast Leave
	IGMP Proxy
DHCP	DHCP Server
	DHCPv4 Client/BOOTP
	DHCPv4 Relay
	DHCPv4 Snooping
	DHCPv4 Option 82/43/60/61/67

IPv6 Basic	IPv6 ND Snooping
DHCPv6	DHCPv6 Relay
	DHCPv6 Snooping
	IPv6 SAVI
	Security RA
	DHCPv6 Server
IPv6 Unicast Routing	Static Route
IPv6 Multicast Routing	MLD v1/V2 Snooping
IPv6 Features	SNMP over IPv6 Support
	HTTP over IPv6 Support
	SSH over IPv6 Support
	DNS over IPv6 Support
	IPv6 ping/traceroute Support
	IPv6 Telnet Support
	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
Scheduling	SP
	WRR
	WDRR
PolicyMap Stream	Based on VLAN
	Based on COS/DSCP
	Aggregate PolicyMap
	Ingress PolicyMap
Policing	CAR Stream Shaping(leak algorithm)
	Ingress Policing
Rewrite	COS/802.1p Priority
	IP Precedence
	IPv4 DSCP/IPv6 DSCP
	drop-precedence
	internal-priority
	Ingress/Egress Rewrite

Queuing	DSCP to DSCP mapping
	DSCP to DP mapping
	DSCP to Queue mapping
	COS to DP mapping
	COS to Queue mapping
IP-ACL	SIP/DIP
	IP Protocol
	IP Priority(DSCP,TOS, Precedence)
	TCP,UDP src,dst Port
MAC-ACL	SRC/DST MAC
	VLAN
	COS
	Tag/Untag
IP-MAC ACL	MAC-ACL and IP-ACL
User-defined ACL	Base on user defined profile
ACL Features	Based on time period ACL
	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
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
Deny DoS Attack	TCP Flag
	TCP Flagment
	IP Segment
	ICMP
TACACS+	Standard Support
Radius	Standard Support
	Client, Support MD5

SSL	Openssl 1.1.0
MRPP	Compatiable ERRP
ULPP	Uplink Protection Protocol Smart Link/Monitor Link
ULSM	Uplink State Monitor
Mirror	Support one to one, multi to one Port based mirror, support ingress, egress, and both CPU based mirror Flow based mirror RSPAN
PoE Management	ON/OFF Config Alive Checking for PD 7/24 On/Off Scheduling

Adapter Introduce

Ordering Info

Product Model	Description
KIT/1*ISW5000-8GT4GP-POE-IN/1*PWR-DC5428-A-NB	Harsh POE Switch Package