

10G Uplink Industrial L2 Managed PoE Switch

SP5012FM-L2



Overview

Wi-Tek Superic industrial L2 managed PoE switch provides 8 Gigabit Ethernet RJ-45 ports and 410 Gigabit SFP+ uplink ports. All RJ-45 ports comply with 802.3af/at PoE (PoE+) standard and output up to 30W PoE power per port.

This series switch supports Layer 2 management functions, such as VLAN, VLAN classification, QinQ, port mirroring, STP, RSTP, MSTP, IGMP, QoS, DHCP, multicast, ACL, dying gasp, LLDP, 802.1X, fiber transceiver DDM, PoE management, G.8032 ERPS protocol, IPv6 management, Web, SNMP, Telnet, TFTP, etc. Professional design provides a flexible, easy-to-use, and reliable industrial network solution.

Redundant power design with polarity reverse/over-voltage/over-current protection guarantees a safe power supply. Solid shell, wide operation temperature from -40°C to 75°C , and high-level EMI/EMC capability design ensure its stable and reliable operation even in harsh environments. It is the best choice for outdoor CCTV projects, wireless coverage projects, and the project of industrial application scenarios such as factories and transportation.

Features

Full Gigabit Interfaces Design

8x10/100/1000 Base-T PoE+ ports and 4x1000/2500/10000 Base-X SFP ports

-40~75°C Operating Temperature

-40~75°C working temperature design, makes it meet the requirement of harsh application environment.

High Level Protection Design

6kV surge immunity for Ethernet ports, 15kV air discharge and 8kV contact discharge ESD protection, makes it an ideal choice for outdoor application scenario.

Robust L2 Managed Functions

Support robust Layer 2 management functions, such as VLAN, VLAN classification, QinQ, port mirroring, STP, RSTP, MSTP, IGMP, QoS, DHCP, multicast, ACL, dying gasp, LLDP, 802.1X, fiber transceiver DDM, PoE management, G.8032 ERPS protocol, IPV6 management can meet the requirement of simple

Redundant DC Power Input Design

Support redundant 44-57V DC power input, provide reliable alternative power access solutions.

Specifications



Model	SP5012FM-L2
Hardware Features	
Interfaces	
Downlink Ports	8*10/100/1000 Base-T PoE+ RJ-45 (Auto-MDI/MDI-X)
Uplink Ports	4* 1000/ 2500/10000 Base-X SFP
Management port	1* RJ45 Console
PoE	
PoE Standard	IEEE 802 .3af/at (PSE)
PoE Power Supply Type	End-span
PoE Pin Assignment	1/2 (+) , 3/6 (-)
PoE Power	30W max for each port, 240W Max
Switch Property	
Forwarding Modes	Store and Forward
Packet Buffer	12Mbit
MAC Table	16k
Switching Capacity	96 Gbps
Packet Forwarding Rate	71.4 Mpps
Jumbo Frame	10kB
Power Supply	
Input Voltage	Power 1 (Main) : 44~57V DC , Power 2 (Backup) : 44~57V DC
Power Consumption	Full loading without PoE ≤ 18W PoE power budget ≤ 240W
Connector	Removable 6-pin terminal block
Reverse polarity protection	Support
Over-voltage protection	Support
Over-current protection	Support

Environmental Reliability	
Industrial Standard	Surge protection of power: IEC 61000-4-5 6KV/4KV (8/20us)
	Surge protection of Ethernet ports: IEC 61000-4-5 6KV/2KV (10/700us)
	RS: IEC 61000-4-3 80 MHz- 1 Ghz: 10 V/ m
	EFT: IEC 61000-4-4 4K/2K
	CS: IEC 61000-4-6 10V
	ESD: IEC 61000-4-2 Contact: 8K; Air: 15K
	EMI: FCC Part 15B Class A
	Shock: IEC 60068-2-27
	Free Fall: IEC 60068-2-32
Vibration: IEC 60068-2-6	
Operating Temperature	-40°C ~ 75°C
Storage Temperature	-40°C ~ 85°C
Operating Humidity	5% ~ 95% (Non-condensation)
LED Indicators	
P (Power indicator)	Off: the device is power off or failed Green On: the device power on is normal
S (System status indicator)	Blinking: device initialization On: device on and normal operation
Copper ports	1-8 Green indicators Off: ports link down On: ports link up Blinking: data on TX/ RX 1-8 Yellow indicators Off: PoE is not working On: PoE is working
Fiber ports	9-12 Fiber ports indicators Off: ports link down Green On: ports link up Green Blinking: data on TX/ RX
Dimensions (W* D* H)	54* 115* 158mm
Net Weight	1.43kg
Installation	Desktop/ DIN- rail
Certifications	
Certifications	CE, FCC, RoHS

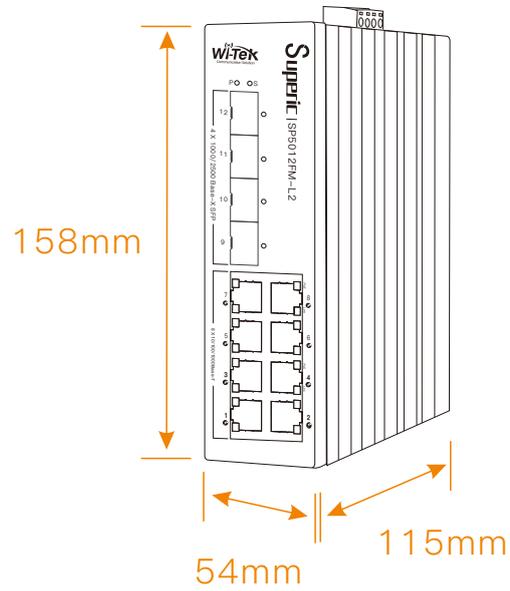
Software Feature

Port aggregation	Support 1GE port aggregation
	Support 2.5GE aggregation
	Support static aggregation
	Support LACP dynamic aggregation
	Up to 64 aggregation groups and up to 8 ports per group
Port features	Support IEEE802.3x flow control
	Support port traffic statistics
	Support Broadcast Storm (Broadcast; Unknown Multicast; Unknown Unicast)
	Support Loop Detection (Port Based; VLAN Based)
	Support Port mirroring (One-to-One; Many-to-One; Tx/Rx/Both)
VLAN	Support Mac Based VLAN
	Support IP Based VLAN
	Support Protocol Based VLAN
	Support GVRP (normal mode; fixed mode; forbidden mode)
	Support QinQ (Port-based QinQ; VLAN-based QinQ; VLAN-based QinQ)
Ring network protocol	Support IEEE 802.1D-STP
	Support IEEE 802.1W -RSTP
	Support IEEE 802.1S -MSTP
	Support BPDU Guard
	Support G.8032 ERPS protocol
DHCP	Support option-82
	Support DHCP Client
	Support DHCP Snooping
L2 Multicast	Support Group Address
	Support IGMP V1, V2, V3
	Support IGMP snooping
ACL	Support IP Standard ACL
	Support IP extend ACL
	Support MAC extend ACL
	Support L2, L3

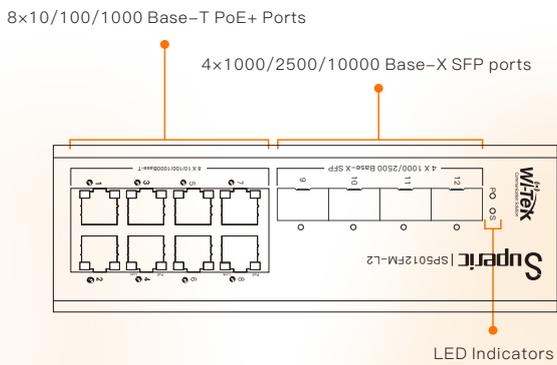
QoS	8 priority queues
	802.1p CoS/DSCP priority
	Queue scheduling (SP (Strict Priority); WRR(Weighted Round Robin)SP+WRR)
	Rate Limit (Ingress /Egress Port; Egress Queue)
mac-address	Static mac-address management
	Dynamic mac-address management)
	Filtering mac-address
Security	Support RADIUS/TACACS+
	Support Dot1x (port authentication, MAC authentication)
	Support RADIUS authentication access switch (Console; Telnet; SSH; HTTP; HTTPS)
	Detect arp Message Filtering
	Support IP Source Guard (Port-based IP/mac binding access)
	Support port isolation
IPV6	DHCP IPv6 Client
	Ping IPV6
	Tracert IPV6
	Telnet IPv6
	SNMP IPv6
	SSH IPv6
	Http IPv6
	TFTP IPv6
	Dual IPv4/IPv6
Management and maintenance	Support Syslog
	Support RMON(1,2,3 &9)
	Support NTP/SNTP(RFC2030)
	Support Ping; TRACERT
	Support optical transceiver DDM function
	Support TFTP Client
	Support TFTP, web upgrading
	Configuration Export/import
	Support IPv6 Management
	Support PoE management

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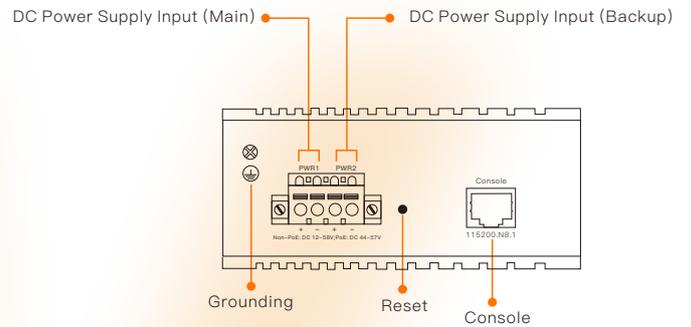
Dimensions (mm)



Front Panel



Side Panel



Package Contents

Welcome to order our products. After purchasing, you will receive:

Items	Quantity
Industrial Switch	1 pcs
Quick Installation Guide	1 pcs



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Technical Support



Cloud Management



Company Website