

# MP-2404X-HS

## 24+4 Port Industrial Managed PoE+ Ethernet Switch with 10G Uplink



- 24x Gigabit Ethernet ports with IEEE 802.3at PoE+
- 4x 1/10 Gigabit Ethernet SFP+ Slot
- RSTP, MSTP, ERPS, LACP for Network Redundancy
- QoS CoS/DSCP to increase determinism
- Supports IGMP Snooping v1/v2/v3, up to 512 groups
- DHCP Relay Option 82 for policies IP address assignment
- SNMP v1/v2c/v3 for network management
- Supports Storm Protection
- USB storage for configuration-free replacement
- Supports industrial automation protocols Ethernet/IP and Modbus TCP
- Supports PoE PD Alive Check Function for PoE Device Power Recycle



## Specifications

### Technology

IEEE 802.3 10BaseT  
IEEE 802.3u 100BaseTX  
IEEE 802.3ab 1000BaseT  
IEEE 802.3an 10GBase over copper  
IEEE 802.3ae 10GBase over Fiber  
IEEE 802.3x Flow Control  
IEEE 802.3af Power over Ethernet  
IEEE 802.3at PoE+  
IEEE 802.3az Energy-Efficient Ethernet  
IEEE 802.3ad/802.1AX LACP  
IEEE 802.1D Spanning Tree Protocol  
IEEE 802.1w Rapid STP  
IEEE 802.1s Multiple STP  
ITU-T G.8032 / Y.1344 ERPS  
IEEE 802.1Q VLAN Tagging  
IEEE 802.1ad Stacked VLANs  
IEEE 802.1p Class of Service  
IEEE 802.1X Network Authentication  
IEEE 802.1AB LLDP  
IEEE 1588 PTP

### Standards

**Processing Type** Store and Forward

### Switch Properties

**Switch Fabric** 208Gbps

**Priority Queues** 8 Queues

**Jumbo Frame** 9216bytes

**MAC Table Size** 16K

**Packet Buffer** 12Mbits

**VLAN Table Size** 4094

**IGMP Group** 512

**ACL Group** 512

### Software Feature

**Network Redundancy** RSTP, MSTP, G.8032 ERPSv2, Port Trunking with LACP

**Security** 802.1X, RADIUS, TACACS+, SSL, SSH

**Management** IPv4, IPv6, Web, Telnet, Serial Console, CLI, SNMP v1/v2c/v3, uPnP

**Diagnostics** RMON, SNMP Inform/Trap, Syslog, SMTP, Port Mirroring, LLDP, RSPAN

**Configuration** DHCP Server/Client, Relay Option 82, TFTP, USB

**Filter** 802.1Q VLAN, Q-in-Q, IGMP Snooping v1/v2/v3, IGMP Querier, Independent Vlan Learning

**Time Sync.** NTP, IEEE1588v2 OC (Software Timestamp), TC (Hardware Timestamp)

**QoS** CoS, DSCP, WRR/SPQ Queuing, Storm Protection

**Industrial Profiles** Ethernet/IP, Modbus TCP, Profinet

### Interface

**RJ45 Port** 24x 10/100/1000T(x) with PoE+, auto

negotiation speed duplex mode, auto MDI/MDI-X

<b>Fiber Port</b>	4x 1/10 Gigabit Ethernet SFP+ Slot
<b>PoE Pin Out</b>	V+, V+, V-, V-, for pin 1, 2, 3, 6, Endspan, MDI Mode A
<b>LED Indicators</b>	<b>Per unit:</b> PWR1, PWR2(AC2/DC2), Fault, Ring Master, Ring State <b>Ports:</b> Link/Active with highest speed(Green), low speed(Amber) <b>PoE:</b> Output Power
<b>Alarm Contact</b>	1x relay output with current carrying capacity of 1A @ 24 VDC
<b>Digital Inputs</b>	1x isolated input from the electronics. +13 to +30V for state "1" -30 to +3V for state "0" Max. input current: 8mA
<b>Button</b>	Multiple functions reset button
<b>Serial Console</b>	1x RS232 in RJ45 connector with console cable, 115.2Kbps, 8N1
<b>Storage</b>	1x USB 2.0 storage for firmware update, configuration backup, restore, boot up and syslog

## Power Requirements

<b>Operation Voltage</b>	90~264VAC, 48VDC, redundant dual inputs, >50VDC for PoE+ output recommended
<b>Connection</b>	AC socket, DC 4-pin terminal block
<b>Power Consumption</b>	25W
<b>PoE Power Budget</b>	350W
<b>Protection</b>	Overload Current Protected, Reverse Polarity Protected

Features with star(\*) implies those are under development. In a continuing effort of improvement and updated technology, product specifications are subject to change without notice.

## Mechanical Construction

<b>Enclosure</b>	Aluminum / Steel metal
<b>Protection Class</b>	IP30
<b>Dimensions</b>	440x44x461 mm (WxHxD)
<b>Weight</b>	5.8 kg
<b>Mounting</b>	Rack Mounting

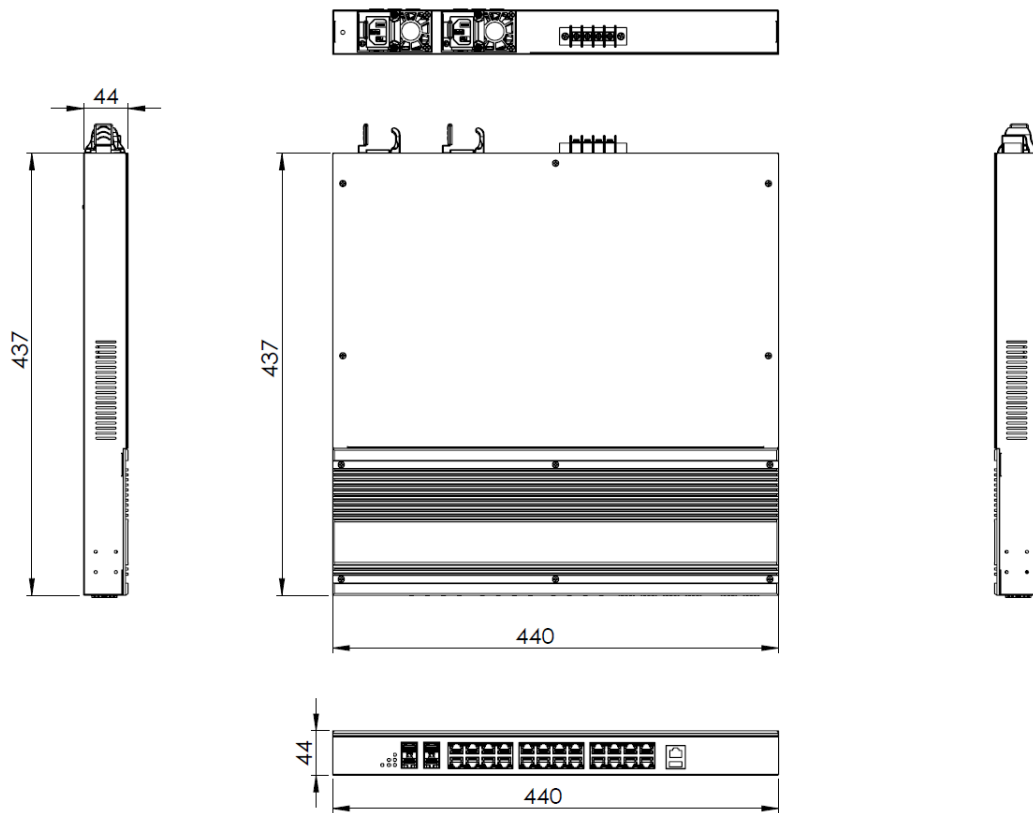
## Environmental Limits

<b>Operating Temperature</b>	Standard: -5°C ~ 55°C (23°F ~ 131°F)
<b>Storage Temperature</b>	-40°C ~ 85°C (-40°F ~ 185°F)
<b>Ambient Relative Humidity</b>	5 to 95%, (Non-Condensing)

## Regulatory Approvals

<b>EMI</b>	FCC Part 15 Subpart B Class A CE EN 55032 Class A
<b>EMS</b>	IEC61000-4-2 (ESD) IEC61000-4-3 (RS) IEC61000-4-4 (EFT) IEC61000-4-5 (Surge) IEC61000-4-6 (CS) IEC61000-4-8 (Magnetic Field)
<b>Free Fall</b>	IEC60068-2-32
<b>Shock</b>	IEC60068-2-27
<b>Vibration</b>	IEC60068-2-6
<b>Green</b>	RoHS Compliant
<b>MTBF</b>	>100,000 hours
<b>Warranty</b>	5 Years

## Dimensions (unit = mm)



## Ordering Information

<b>MP-2404X-HS-1AC</b>	28+4 Port Industrial Managed PoE+ Ethernet Switch with 10G Uplink - 24x 10/100/1000T(x) with 30W PSE + 4x 1G/10GT(x) + 4x 1/10 Gigabit Ethernet SFP+ Slot - Operating Temperature: -5°C ~ 55°C (23°F ~ 131°F) - 1x 90~264VAC Power Input
<b>MP-2404X-HS-1AC-T</b>	28+4 Port Industrial Managed PoE+ Ethernet Switch with 10G Uplink - 24x 10/100/1000T(x) with 30W PSE + 4x 1G/10GT(x) + 4x 1/10 Gigabit Ethernet SFP+ Slot - Operating Temperature: - 1x 90~264VAC Power Input
<b>MP-2404X-HS-AD</b>	28+4 Port Industrial Managed PoE+ Ethernet Switch with 10G Uplink - 24x 10/100/1000T(x) with 30W PSE + 4x 1G/10GT(x) + 4x 1/10 Gigabit Ethernet SFP+ Slot - Operating Temperature: -5°C ~ 55°C (23°F ~ 131°F) - 1x 90~264VAC Power and 1x 48~57VDC Power Input
<b>MP-2404X-HS-AD-T</b>	28+4 Port Industrial Managed PoE+ Ethernet Switch with 10G Uplink - 24x 10/100/1000T(x) with 30W PSE + 4x 1G/10GT(x) + 4x 1/10 Gigabit Ethernet SFP+ Slot - Operating Temperature: - 1x 90~264VAC Power and 1x 48~57VDC Power Input
<b>MP-2404X-HS-DC-T</b>	28+4 Port Industrial Managed PoE+ Ethernet Switch with 10G Uplink - 24x 10/100/1000T(x) with 30W PSE + 4x 1G/10GT(x) + 4x 1/10 Gigabit Ethernet SFP+ Slot - Operating Temperature: - 2x 48~57VDC Robust Isolation Power Input

## Optional Accessories

<b>NDR-240-48</b>	240W Industrial DIN-Rail Power Supply, 48VDC (metal case)
<b>NDR-480-48</b>	480W Industrial DIN-Rail Power Supply, 48VDC (metal case)