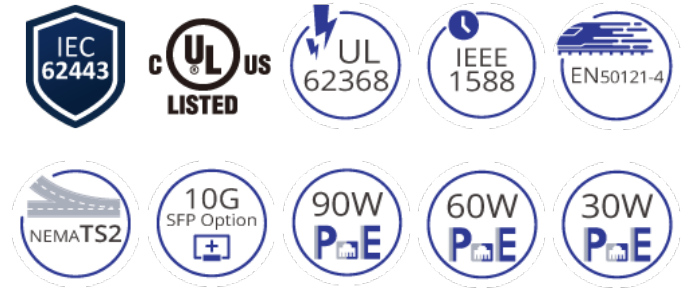


EX75900 Series

Hardened Managed 28-Port Gigabit PoE Ethernet Switch



Overview

The EtherWAN EX75900 Series is a hardened, rackmount managed PoE Ethernet switch platform designed for mission-critical industrial and infrastructure networks. Featuring 24 10/100/1000BASE-T(X) PoE ports, **the series offers a choice of up to 60W or 90W per port**, allowing customers to select the appropriate power level for different connected devices.

For high-power PoE applications, the **EX75964-0VTH provides up to 90W per port with IEEE 802.3bt Type 4 support**, making it ideal for devices such as PTZ cameras, high-performance wireless access points, digital signage, and other power-intensive edge equipment. The series delivers a total PoE power budget of up to 720W and provides either 4 1G/10G SFP+ or 4 Gigabit SFP uplink ports, depending on the selected model.

Engineered for harsh environments and continuous operation, the EX75900 Series is ideal for urban infrastructure, intelligent transportation systems, public safety and security deployments, and other applications requiring reliable, high-power PoE connectivity.

IEC 62443-4-2 Certified – Strengthening cyber resilience for critical industrial and infrastructure applications.

Highlights

+ High Bandwidth and Flexible Uplinks

24 × 10/100/1000BASE-T(X) ports
4 × 1G SFP or tri-speed 1G/2.5G/10G SFP+ uplinks
Full wire-speed switching with full-duplex operation

+ High-Power PoE

IEEE 802.3af/at/bt support
Up to 90W per port with a 720W PoE budget
PoE Watchdog with monitoring and scheduling

+ Hardened for Harsh Environments

Wide operating temperature range -40 to 75°C (-40 to 167°F)
Fanless design for reliable operation
High resistance to impact, thermal shock, and electrical noise

+ Management and Security

Secure management with Multi-user Privilege
IEEE 802.1X with RADIUS and TACACS+ authentication
Centralized monitoring with eVue™ and eLite™

+ Lite Layer 3 Functionality

Static routing, RIP v1/v2, and OSPF
VRRP for gateway redundancy
Reduces amount of broadcast traffic

+ Support

Complimentary Technical Support
Free Firmware Upgrades and notifications
Limited Lifetime Warranty

Features

+ Interface

CLI, Telnet, Web GUI

+ Management

Firmware upgrade
Configuration backup
DHCP Server/Client
RMON (Remote Monitoring)
Port Mirroring
NTP (Network Time Protocol) synchronization
LLDP (Link Layer Discovery Protocol)
IPv4/IPv6
SNMP v1/v2c/v3
Modbus TCP
SFlow

+ Security

MAC Address filtering
Enable/Disable port
Storm control
System logging
IEEE 802.1x LAN Access control
Remote authentication through RADIUS and TACACS+
Complex password support
Multi-user login and privileged access management
SSH for CLI and Telnet security
SSL and HTTPS for web security
ACL (Access Control List, up to 4096 entries)
IPSG (IP Source guard)
DAI (Dynamic ARP Inspection)
DHCP Snooping

+ Layer 2 Features

Auto-negotiation for port speed and duplex
Flow Control
IEEE 802.3x full duplex mode
Back-pressure half duplex mode

Redundant Protocols

IEEE 802.1D STP
IEEE 802.1w RSTP
IEEE 802.1s MSTP
EtherWAN's Alpha-Ring network fault recovery

VLANs

IEEE 802.1Q Tag VLANs
GVRP
GMRP

Link Aggregation

Static Trunk (4 groups)
IEEE 802.3ad LACP

IGMP Snooping v1/v2/v3

+ Layer 3 Features

IP Packet Routing

Maximum number of routes in hardware: 64 entries
Static Routing
RIP v1/v2
OSPF v2

Routing Redundancy

VRRP

+ Quality of Service (QoS)

Priority Queues: 8 queues per port

Traffic classification based on IEEE 802.1p CoS (Cost of Service), DSCP (Differentiated Services Code Point), WRR (Weighted Round Robin), and strict mode

Rate Limiting (Ingress/Egress)

+ Software Properties and Performance

Switching Fabric

EX75960: 56Gbps

EX75964: 128Gbps

Forwarding Rate

95.23Mpps

Max VLANs

256 (4096 VID)

Jumbo Frame Size

9KB

MAC Table Size

16K

Packet Buffer Memory

12M bits

Specifications

+ Interface

Ethernet

24 x 10/100/1000BASE-T(X)

4 x 1G/2.5G/10G SFP+ or 4 x 1G SFP

Console

1 x RJ45

Config Backup

1 x USB (Type A Connector)

Digital Input

2 x Digital Input

Wet Contact: 0-3V for State 0; 13-30V for State 1;

Max Input Current: 8mA

Dry Contact: Logic Level 1–Close to GND; Logic Level 0–Open

Alarm Contact

1 x Relay output, current capacity 0.5A/48VDC

LED Indicators

Per Unit: Power 1, Power 2, Alarm

Per Port: Link/Activity (Green)

Per PoE Port: PoE Status (Orange)

+ Physical

Casing Material

Metal

IP Rating

IP30

Dimensions

442 x 270 x 44.2mm (W x D x H)

17.4" x 10.6" x 1.74"

Weight

5.1Kg (11.2lbs)

Installation Type

Rack mounting

+ Environmental

Operating Temp.

-40 to 75°C (-40 to 167°F)

Storage Temp.

-45 to 85°C (-49 to 185°F)

Relative Humidity

5% to 95% (non-condensing)

MTBF

1,444,959 hours

+ Technology

Standards

IEEE 802.3 10BASE-T
IEEE 802.3u 100BASE-TX/100BASE-FX
IEEE 802.3ab 1000BASE-T
IEEE 802.3ae 10Gigabit Ethernet
IEEE 802.3ad link aggregation control
IEEE 802.3z 1000BASE-SX/1000BASE-LX
IEEE 802.3x full duplex and flow control
IEEE 802.1D STP
IEEE 802.1p QoS
IEEE 802.1Q Tag VLANs
IEEE 802.1s MSTP
IEEE 802.1w RSTP
IEEE 802.1x PNAC
IEEE 802.1ab LLDP
IEEE 802.3af/at/bt Power over Ethernet
IEEE 1588v2 PTP

Forward/Filtering Rate

14,880pps for 10Mbps
148,810pps for 100Mbps
1,488,100pps for 1000Mbps
14,881,000pps for 10Gbps

Processing Type

Store-and-forward
Auto-negotiation
Half-duplex back-pressure and full-duplex flow control
Auto MDI/MDIX

System Memory

2Gb DDR3 SDRAM

Flash Storage

1Gb

+ Regulatory

ISO

Manufactured in ISO-9001 facility

EMI

FCC Part 15B Class A
VCCI Class A
EN 61000-6-4
BSMI

EMS

EN 61000-6-2
EN 61000-4-2 (ESD)
EN 61000-4-3 (Radiated RFI)
EN 61000-4-4 (Burst)
EN 61000-4-5 (Surge)
PoE Ports: line to earth 6kV Surge
EN 61000-4-6 (Induced RFI)
EN 61000-4-8 (Magnetic field)

Safety

UL 62368

Cybersecurity

IEC 62443-4-1
IEC 62443-4-2

Vibration

IEC 60068-2-6

Shock

IEC 60068-2-27

Free Fall

FED STD 101C Method 5007.1

Traffic

NEMA TS2

Railway

EN 50121-4

+ Power

Input

46-57VDC Redundant (Terminal block)**

** 46-57VDC for IEEE 802.3af type 1, ≤15.4W PD devices.

52-57VDC for IEEE 802.3at/bt type 2/3/4, 30W, 60W, 90W (54-57VDC) PD devices.

Power Consumption

26W Max (without PoE)

PoE Modes

802.3af/at Mode A: Pins 1/2(-), 3/6(+)

802.3bt (60W/90W): Mode A & B, Pins 1/2(-), 3/6(+), 4/5(+), 7/8(-)

PoE Power Output

Port: Up to 60W/port

Up to 90W/port (EX75964-0VTH)

Power Budget: 720W

Protection

Reverse Polarity Protection

+ Warranty

Length

Limited Lifetime

Details

www.etherwan.com/support/warranty-policy

+ What's Included

Device

Ethernet Switch

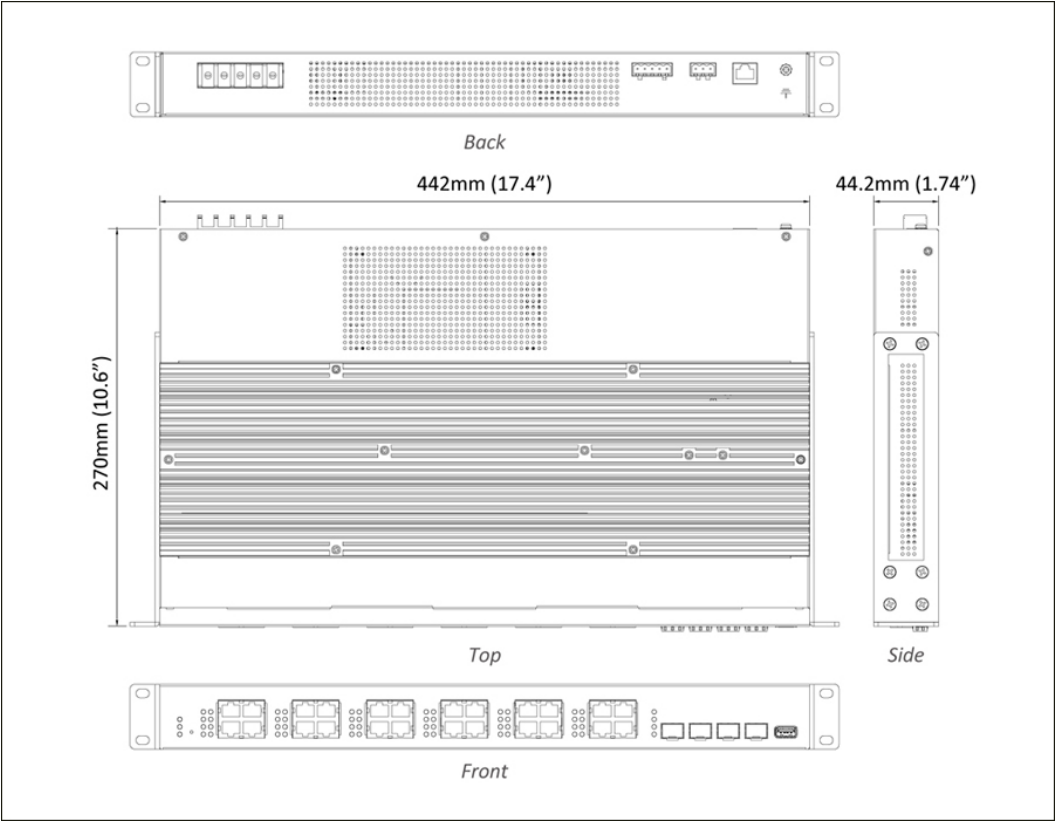
Cables

1 Console Cable

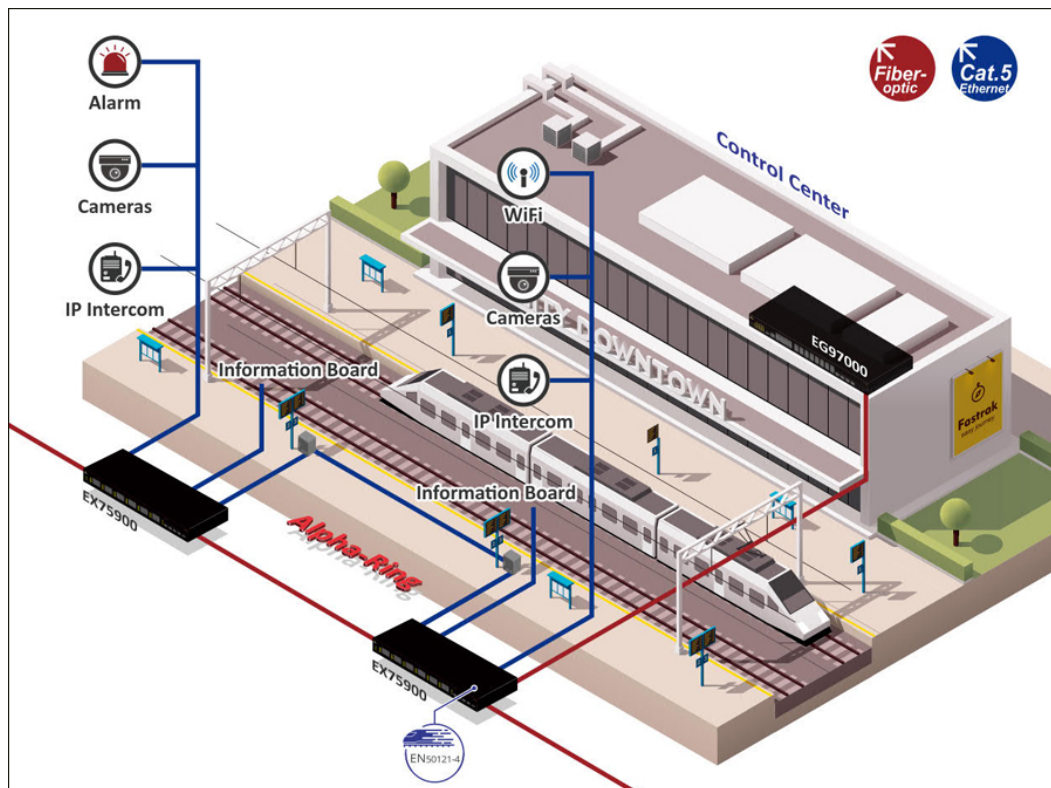
Installation

Mounting brackets, screws

Dimensions



Application



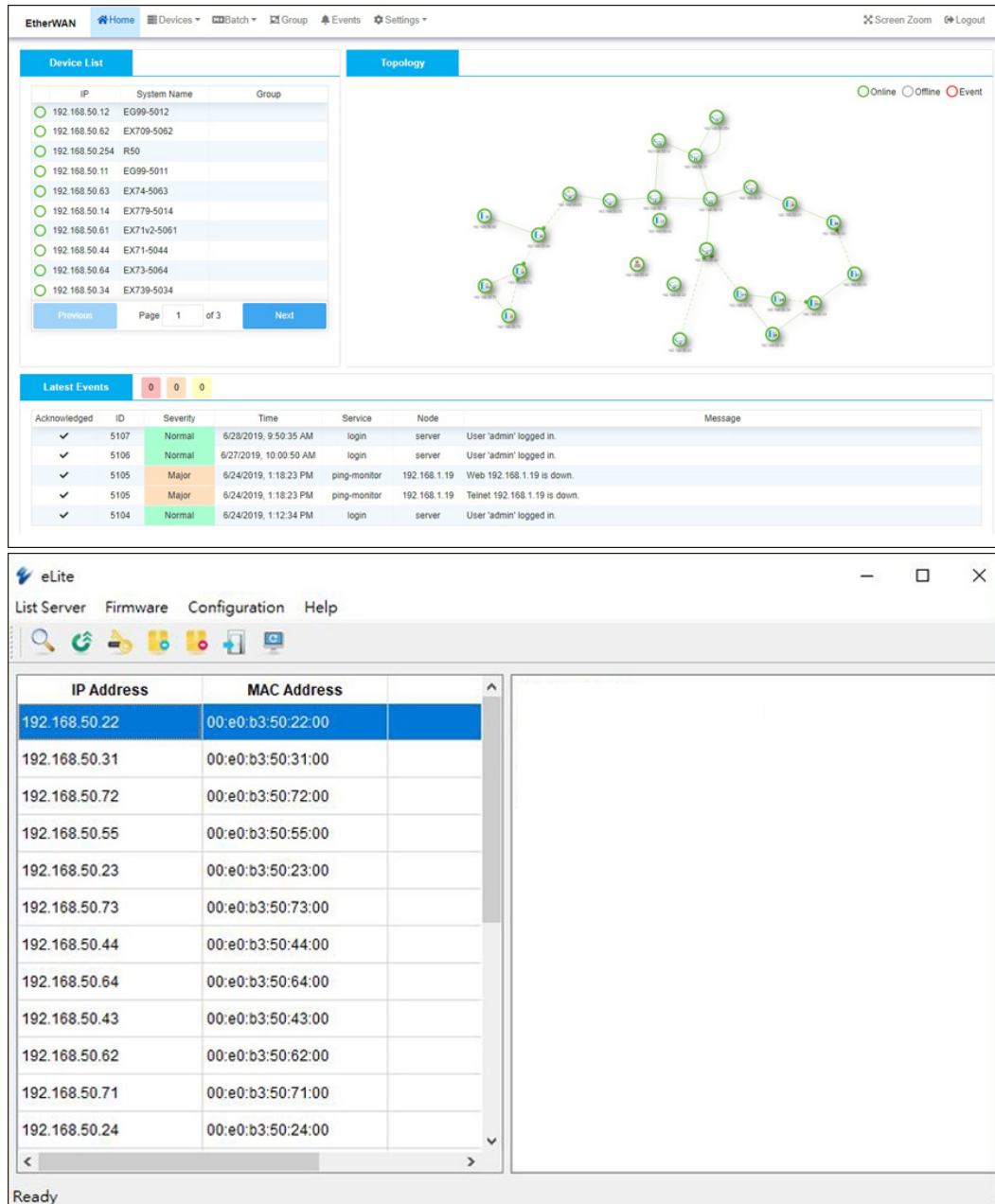
Software

Network Management

[eVue™ Network Configuration and Monitoring Tool](#)

Network Discovery

[eLite™ Network Discovery and IP Configuration Tool](#)



The image displays two screenshots of network management software. The top screenshot shows the EtherWAN eVue interface, which includes a 'Device List' table, a 'Topology' diagram, and a 'Latest Events' log. The bottom screenshot shows the eLite interface, which features a table of IP and MAC addresses.

Device List

IP	System Name	Group
192.168.50.12	EG99-5012	
192.168.50.62	EX709-5062	
192.168.50.254	R50	
192.168.50.11	EG99-5011	
192.168.50.63	EX74-5063	
192.168.50.14	EX779-5014	
192.168.50.61	EX71v2-5061	
192.168.50.44	EX71-5044	
192.168.50.64	EX73-5064	
192.168.50.34	EX739-5034	

Latest Events

Acknowledged	ID	Severity	Time	Service	Node	Message
✓	5107	Normal	6/29/2019, 9:50:35 AM	login	server	User 'admin' logged in.
✓	5106	Normal	6/27/2019, 10:00:50 AM	login	server	User 'admin' logged in.
✓	5105	Major	6/24/2019, 1:18:23 PM	ping-monitor	192.168.1.19	Web 192.168.1.19 is down.
✓	5105	Major	6/24/2019, 1:18:23 PM	ping-monitor	192.168.1.19	Telnet 192.168.1.19 is down.
✓	5104	Normal	6/24/2019, 1:12:34 PM	login	server	User 'admin' logged in.

eLite

List Server Firmware Configuration Help

IP Address	MAC Address
192.168.50.22	00:e0:b3:50:22:00
192.168.50.31	00:e0:b3:50:31:00
192.168.50.72	00:e0:b3:50:72:00
192.168.50.55	00:e0:b3:50:55:00
192.168.50.23	00:e0:b3:50:23:00
192.168.50.73	00:e0:b3:50:73:00
192.168.50.44	00:e0:b3:50:44:00
192.168.50.64	00:e0:b3:50:64:00
192.168.50.43	00:e0:b3:50:43:00
192.168.50.62	00:e0:b3:50:62:00
192.168.50.71	00:e0:b3:50:71:00
192.168.50.24	00:e0:b3:50:24:00

Ordering Info

+ Model



	EX75964-0VTH New!	EX75964-0VTU	EX75960-0VTU
10/100/1000BASE-T(X)	24	24	24
1G/2.5G/10G SFP+	4	4	-
1000BASE SFP	-	-	4
PoE per port	90W	60W	60W
	Quote	Quote	Quote

+ Accessories

Hardened 100BASE SFP Modules	www.etherwan.com/products/sfp-fiber-transceiver
Hardened Gigabit SFP Modules	www.etherwan.com/products/sfp-fiber-transceiver
DIN-Rail Power Supplies	www.etherwan.com/products/din-rail-power-supply

