



## ◆ 24-port 10/100M Ethernet + 4-port Gigabit SFP Managed

### ➤ Features

- Support 24-port 10/100Base-TX+4-port Gigabit SFP
- Support status display with front and back sides indicator lights;
- Support static multicast filtering , IGMP Snooping;;
- Supports broadcast storm suppression and port rate control;
- Support MW-Ring patent redundance technique (failure recovery time <20ms);
- Support isolated power supply, optional dual redundant power supply;
- Support power off, fiber off, storm and other status relay alarm output;
- Support managed function such as VLAN, QoS, Trunking and port mirroring;
- Wide temperature range design ,fanless thermal design;
- Satisfy harsh industrial environment.
- Conform to IEC61850 and IEEE1613 industrial standards



### ➤ Introduction

IES1028-4GS is an industrial grade, managed and redundancy Ethernet switch which supports 24-port 10/100M Ethernet + 4-port Gigabit SFP. It provided some kinds of advanced network managed function, like as: MW-Ring redundancy ring network, VLAN, Trunking, Quality of Service, Speed control, port mirroring, fault alarm and firmware upgrade online. MW-Ring can bring your Ethernet to intelligent redundancy. Standard Industry design, can satisfied every requirement of the industry scene. All components used industry grade, it takes products high reliability. It provided wide voltage power supply input.

Product complies with FCC and CE standards, in line with the industrial design requirements, for intelligent substation construction provides high-performance, high-quality products guaranteed. Support 1 channel power inputs and 1 relay alarm output, wide temperature range of -40~75°C to be able to meet the requirements of all kinds of industrial field, can be widely used in electric power, water conservancy, transportation, and other fields.

### ➤ Application Industries

- HD monitor transmission and power supply
- Wireless AP layout transmission and power supply
- Network telephone transmission , intelligent house and home system
- Intelligent transportation supervisory system (ITS)
- High-speed Way supervisory/Tele-Communication System
- Security protection system, TV medical treatment
- Long-distance Multi-media Schooling, Campus monitoring
- Long-distance broadcast television transmission system
- High-building Security Protection, Military Tele-Com project

## ➤ Specification

### Technology

|                      |   |
|----------------------|---|
| Standard             | Support IEEE802.3, IEEE802.3u, IEEE802.3x, IEEE802.1Q, IEEE802.1p, IEEE802.1D, IEEE802.1W,                  |
| Redundancy Protocols | ARP, ICMP, TCP, DHCP, DNS, HTTP, Telnet, MW-Ring, RSTP, SNMP  |
| Flow control         | IEEE802.3x flow control, back press flow control  |
| Multicast            | Support IGMP v1/v2, IGMP snooping, GMRP, Static Multicast   |
| Switch function      | Support VLAN, GVRP, Trunking, Flow control, Rate limitation   |
| MW-Ring              | Support Single, Couple, Chain, Dual homing  |
| Management           | Support the Console, the WEB management.<br>Support SNMP v1/v2<br>Support unified upper computer management |
| Switch Delay         | <5 $\mu$ s  |
| Switch Bandwidth     | 12.8Gbps  |
| MAC Table Size       | 32K   |
| Priority Queues      | 8   |
| VLAN Numbe           | 4096  |
| IGMP Groups          | 1K  |

### Interface

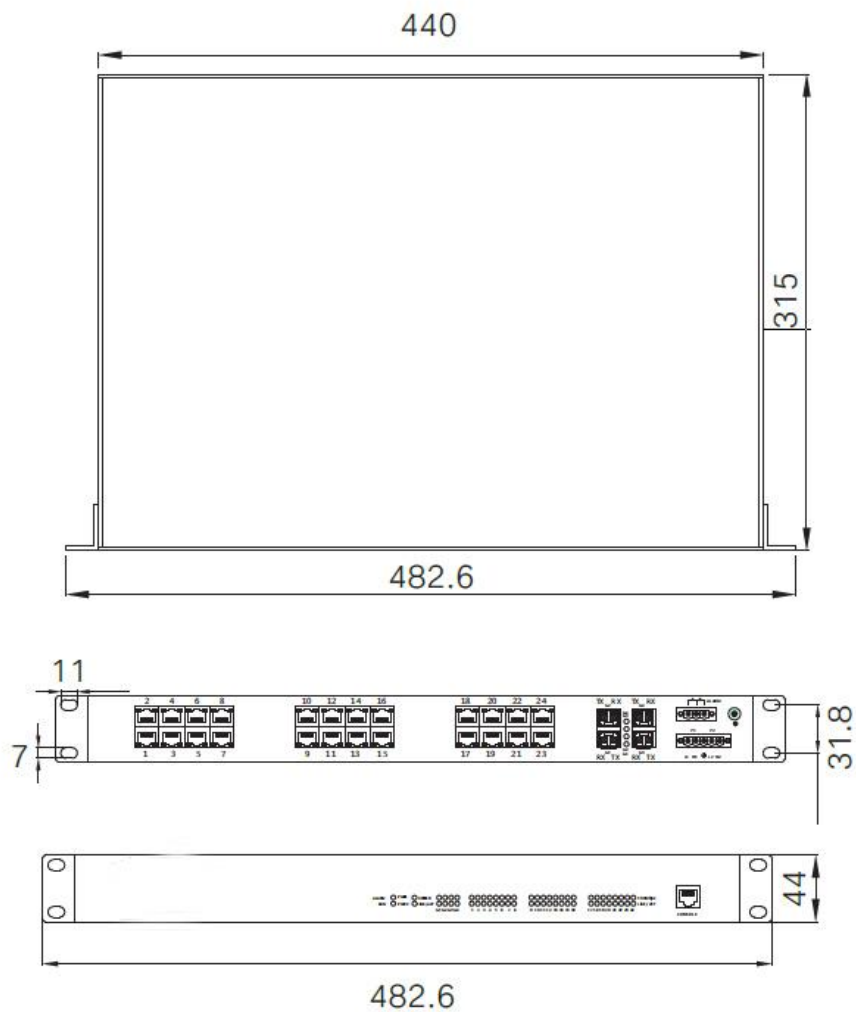
|                        |  |
|------------------------|--|
| Electric port:         | 10Base-T/100Base-TX auto speed control, Half/full duplex and MDI/MDI-X auto detect |
| 1000M optic fiber port | 1000Base-FX, LC connector  |
| Console port           | debug serial port carry out CLI command  |
| Alarm port             | 2 bit terminal block, 1 channel relay alarm output                                 |
| Transfer distance      |  |
| Twisted cable          | 100M (standard CAT5/CAT5e cable)   |
| Multi-mode             | 1310nm, 2/5Km  |
| Single-mode            | 1310nm, 20/40/60Km, 1550nm, 80/100/120Km   |

### Power supply

|                      |   |
|----------------------|---|
| Input Voltage        | AC/DC220V (85-264VAC/110-370VDC)                        |
| Type of input        | 3 bits terminal block                                   |
| Power Consumption    | <25w (MAX)  |
| Working environment  |   |
| Working temperature  | -40~75°C  |
| Storage temperature  | -40~85°C  |
| Relative Humidity    | 5%~95 % (no condensation)                               |
| Mechanical Structure |   |
| Shell                | IP40 protection, aluminium alloy shell                  |
| Installation         | 19" 1U rack   |
| Size (W×H×D)         | 482mm×315mm×44mm  |
| Weight               | 3kg   |
| Industry Standard    |   |
| EMI                  | FCC Part 15, CISPR (EN55022) class A                    |
| EMS                  | EN61000-4-2 (ESD), Level 4<br>EN61000-4-3 (RS), Level 3 |

|               |   |
|---------------|---|
|               | EN61000-4-4 (EFT), Level 4<br>EN61000-4-5 (Surge), Level 4<br>EN61000-4-6 (CS), Level 3<br>EN61000-4-8, Level 5 |
| Shock         | IEC 60068-2-27  |
| Free fall     | IEC 60068-2-32  |
| Vibration     | IEC 60068-2-6   |
| Certification | CE, FCC, RoHS, IEC61850, IEEE1613, UL508 (Pending)  |
| Warranty      | 3 years   |

## ➤ Dimension



## ➤ Ordering Information

| Model NO.       | Description   |
|-----------------|---|
| IES1028-4GS     | 24-port 10/100Base-T(X) + 4-port gigabit (SFP slot), AC/DC220V                      |
| IES1028-4F-4GS  | 20-port 10/100Base-T(X) + 4-port 100Base-FX + 4-port gigabit (SFP slot), AC/DC220V  |
| IES1028-8F-4GS  | 16-port 10/100Base-T(X) + 8-port 100Base-FX + 4-port gigabit (SFP slot), AC/DC220V  |
| IES1028-12F-4GS | 12-port 10/100Base-T(X) + 12-port 100Base-FX + 4-port gigabit (SFP slot), AC/DC220V |
| IES1028-16F-4GS | 8-port 10/100Base-T(X) + 16-port 100Base-FX + 4-port gigabit (SFP slot), AC/DC220V  |
| IES1028-24F-4GS | 24-port 100Base-FX + 4-port gigabit (SFP slot), AC/DC220V                           |

## ➤ Packing List

- Industrial Ethernet Switch × 1
- User manual x 1
- Certificate of quality x 1
- Warranty card x 1