

JetNet 4508 Industrial 8-port Managed Ethernet Rail Switch



- Redundant Ethernet Super Ring
- Supports SNMP/RMON Network Management
- Supports VLAN/QoS/IGMP Snooping
- Event notification by Email, SNMP trap, and Relay Output
- Supports online Port Mirroring and IP Security
- Web-based configuration
- Redundant DC power inputs
- Rigid aluminum case design complies with IP30 standard
- DIN-Rail/Wall-mounting/Desktop installation



Overview

JetNet 4508 Industrial 8-port Managed Ethernet Rail Switch provides solid foundation for a highly fault-tolerant and easily-managed network. JetNet 4508 can be remotely configured by web browser, and managed by SNMP and RMON. Security is enhanced with advanced features such as Port/Tag-based VLAN and IP security. Performance is optimized by QoS and IGMP Snooping/querying.

Korenix Super Ring technology enables superb self-healing capability for network failure. The IP31-design aluminum case further strengthens JetNet 4500's withstandability in harsh industrial environments. The event warning is notified to the network administrator via e-mails or to field engineers by relay output. JetNet 4500 Series will be your best option for highly-managed and industrial network.

Superb Management Features

It is critical for industrial applications that network remains non-stop. Korenix Super Ring technology provides network redundancy that can self-recover in less than 300ms at full load. Moreover, JetNet 4500 provides users with many advanced management features. JetNet 4500 can be configured smartly by web browser. Network administrators can define event notification to be sent via E-mail, SNMP trap, or relay output. Online status of each port is also shown in web page. To optimize network traffic, network administrators

can segment ports into different VLANs, or filter multicast traffic by IGMP Snooping. Bandwidth can be managed by port rate control to avoid abnormal broadcast storm. To enhance security, port access can be limited to pre-defined IP address table. Network determinism is answered by QoS, Quality of Service, for traffic prioritization. JetNet 4500 is the perfect combination for intelligent network management and robust network operation.

Super Ring-Recovery Time < 300ms

One of the main topics in Industrial Automation field is to ensure your system will run non-stop. A minor failure in the communication process may cause the whole system to break down. As a result, you might suffer from substantial damage in terms of extra time and monetary losses. JetNet 4500 Series Switches are your ultimate solution. With Super Ring (Self-healing Redundant) technology, JetNet 4500 provides you with a self-recovery mechanism. If any segment of your

primary communication path is broken or disconnected, Super Ring technology allows JetNet 4500 to self-reconfigure and to provide a redundant path in the network. With its ultra fast recovery time, which is less than 300ms, your mission-critical applications are protected from any network interruptions or temporary malfunctions. With the recovery time that fast, you won't even notice a network failure.

Industrial Ethernet Rail Switch

Specifications

Technology

Standard:

IEEE 802.3 10Base-T Ethernet
IEEE 802.3u 100Base-TX Fast Ethernet
IEEE 802.3x Flow Control and Back-pressure
IEEE 802.1p class of service
IEEE 802.1Q VLAN
IEEE 802.1D Spanning Tree Protocol (STP)
IEEE 802.1W Rapid Spanning Tree Protocol (RSTP)

Processing: Store and Forward architecture**Packet Filter:** Broadcast packet filtering

Interface

Number of Ports: 8 x 10/100 Base-TX**Network Cable:**

10Base-T: 2-pair UTP/STP Cat. 3, 4, 5 cable, EIA/TIA-568 100-ohm (100m)
100Base-TX: 2-pair UTP/STP Cat. 5 cable, EIA/TIA-568 100-ohm (100m)

LED Indicators:

Per port: Link/Activity (Green), Full duplex/Collision (Green)
Per unit: Power x 3 (Green), Fault (Red), R.M (Orange)

Alarm: Relay output for port break and power failure

Redundancy

Network Redundancy:

Super Ring with recovery time less than 300ms
RSTP, STP

Power Redundancy: Dual power inputs 24 VDC

Management

Protocols:

SNMP V1/V2c, RMON 1 (Statistics, History, Alarm, Events)
SMTP, SNMP, IGMP V1 & Query mode, DHCP / Client, TFTP
MIB: MIB-II, Bridge MIB, Ethernet-like MIB, VLAN MIB, Private MIB

Configuration:

Web-interface management
Default button is provided to restore default settings.

VLAN: Supports Port-based VLAN and IEEE802.1Q Tag VLAN**Quality of Service:** Four priority queues per port**Port Mirroring:** Online traffic monitoring on selected ports**IP Security:** IP addresses are used to define access levels.**E-mail warning:** Pre-defined events

Performance

Transfer Rate:

14,880 pps for Ethernet port and 148,800 pps for Fast Ethernet port

Transfer Packet Size: 64 bytes to 1522 bytes (with VLAN tag)**MAC Address:** 2K MAC address table**Memory Buffer:** 1Mbits**Back-plane:** 1.6 Gbps

Power Requirements

Power Supply:

Input Voltage: 24 VDC (12 to 48 VDC), dual inputs

Reverse Polarity Protection: Present

Power Consumption: 3.5 Watts

Mechanical

Installation: DIN-rail kit and wall-mounting ear**Casing:** IP-30 protection, aluminum case**Dimensions:** 53 mm (W) x 135 mm (H) x 105mm (D)

Environmental

Operating Temperature: -10 to 70 °C (14 to 158 °F)**Operating Humidity:** 5% to 95% (Non-condensing)**Storage Temperature:** -40 to 85 °C (-40 to 185 °F)

Regulatory Approvals

EMI: FCC Class A, EN55022 Class A**EMC:**

EN61000-4-2, EN61000-4-3, EN61000-4-4
EN61000-4-5, EN61000-4-6, EN61000-4-8, EN61000-4-11

Safety: UL, cUL, EN60950**Shock:** IEC 60068-2-27**Free Fall:** IEC 60068-2-32**Vibration:** IEC 60068-2-6**MTBF:** 319,175 hours * MIL-HDBK-217F GB (MILITARY HANDBOOK) standard**Warranty:** Global 5 years**JETNET**

Ordering Information

JetNet 4508 Industrial 8-Port Managed Ethernet Rail Switch

- 8-port 10/100Base-TX Switch
- Quick Installation Guide
- Documentation CD-ROM
- Wall mounting plate and six screws