



Industrial 24FE+4G Gigabit Managed Ethernet Switch

JetNet 5428Gv2



The JetNet 5428G is a 19-inch Gigabit Layer 2+ Industrial switch, equipped with 24 100 Base-TX ports and 4 100/1000 RJ-45/SFP combo ports. JetNet 5428G is a special design for industrial control rooms where high-port density and performance are required.

In addition to the advanced cyber security and the advanced cyber redundancy features, JetNet 5428G model provides the redundant power supplies to ensure the high availability for mission critical industrial applications. With JetNet 5428G, you can not only fulfill the application requirements but have the best solution for the industrial Ethernet infrastructure.

Features

- 24 100Base-TX, 4 100/1000 RJ-45/SFP combo ports
- Advanced Cyber Security DHCP Snooping, IP Source Guard, Dynamic ARP Inspection, L2/L3/L4 Access Control List (ACL)
- Advanced Cyber Redundancy MSR, SuperChain, ITU-T G.8032 ERPS
- ▶ USB Firmware upgrade and configuration backup and restore
- EEE Energy saving
- Friendly Device and Auto Network Topology utility
- Isolated redundant power inputs with universal 24/48VDC power or 110/220 VAC power
- ► Compliance with NEMA TS-2
- -40 to 75°C operating temperature, fanless

Specification

SNMP Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command USB Firmware upgrade and configuration backup and restore **Telnet/Local Console support command like interface with Cisco like commands, and of 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet security. SUPPORTS Manage Station with IP Secure function, up to 4 Manage Stations Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication SNMP MIB MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB	Technology		
Switch Technology Store and Forward Technology with 12.8Gbps Non-Blocking Switching Fabric CPU Performance 600Mhz MIPS CPU with 10 Seconds Hardware Based Watchdog Timer System Memory 256Mbytes RAM, 32Mbytes Flash ROM Transfer packet Size 64Bytes ~ 9728Bytes (include double Tag VLAN) MAC address Table 16K Packet Buffer Transfer performance 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management Configuration, monitoring interface 1.5Mbytes shared memory 14,880pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management Configuration, monitoring interface 1.5Mbytes shared memory 14,880pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management - In-Band Management: Telnet with SSH, Web-Browser with SSL, IPv6, SNMP V1/V2c/V3 w SNMP Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP - Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command - USB Firmware upgrade and configuration backup and restore System Manage Secure 1. Telnet/Local Console support command like interface with Cisco like commands, and of 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet secure supports Manage Station with IP Secure function, up to 4 Manage Stations - Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication SNMP MIB Mib II, Bridge Mib, Ethernet Like Mib, VLAN Mib, IGMP Mib, Private Mib Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication		IEEE 802.3u 100Base-TX Fast Ethernet IEEE 802.3u 100Base-FX Fast Ethernet Fiber IEEE 802.3ab 1000Base-T Gigabit Ethernet copper IEEE 802.3z Gigabit Ethernet Fiber IEEE 802.3x Flow Control and back-pressure IEEE 802.1AB Link Layer Discovery Protocol (LLDP) IEEE 802.1p Class of Service (CoS) IEEE 802.1Q VLAN and GVRP IEEE 802.1Q Double Tag VLAN (QinQ) IEEE 802.1D Rapid Spanning Tree (RSTP) IEEE 802.1S Multiple Spanning Tree Protocol (MSTP) IEEE 802.3ad Link Aggregation Protocol (LACP) IEEE 802.1x Port based Network Access Protocol ITU-T G.8032 ERPS	
CPU Performance 600Mhz MIPS CPU with 10 Seconds Hardware Based Watchdog Timer 256Mbytes RAM, 32Mbytes Flash ROM Transfer packet Size 64Bytes - 9728Bytes (include double Tag VLAN) MAC address Table 16K Packet Buffer 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management Configuration, monitoring interface 1.1B-Band Management: Telnet with SSH, Web-Browser with SSL, IPv6, SNMP V1/V2c/V3 w SNMP Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command USB Firmware upgrade and configuration backup and restore System Manage Secure 5.1 Telnet/Local Console support command like interface with Cisco like commands, and of 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet secure Supports Manage Station with IP Secure function, up to 4 Manage Stations Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication SNMP MIB MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	Performance		
System Memory 256Mbytes RAM, 32Mbytes Flash ROM Transfer packet Size 64Bytes - 9728Bytes (include double Tag VLAN) MAC address Table 16K Packet Buffer 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management Configuration, monitoring interface 5NMP Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command USB Firmware upgrade and configuration backup and restore System Manage Secure 5 Telnet/Local Console support command like interface with Cisco like commands, and of 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet secure Supports Manage Station with IP Secure function, up to 4 Manage Stations Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication SNMP MIB MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	Switch Technology	Store and Forward Technology with 12.8Gbps Non-Blocking Switching Fabric	
Transfer packet Size 64Bytes - 9728Bytes (include double Tag VLAN) MAC address Table 16K Packet Buffer 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management Configuration, monitoring interface	CPU Performance	600Mhz MIPS CPU with 10 Seconds Hardware Based Watchdog Timer	
MAC address Table Packet Buffer Transfer performance 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management Configuration, monitoring interface 1.5Mby Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command USB Firmware upgrade and configuration backup and restore System Manage Secure 1.5Mby Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command USB Firmware upgrade and configuration backup and restore System Manage Secure 1.5Elnet/Local Console support command like interface with Cisco like commands, and of 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet secure. Supports Manage Station with IP Secure function, up to 4 Manage Stations Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication SNMP MIB MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	System Memory	256Mbytes RAM, 32Mbytes Flash ROM	
Packet Buffer Transfer performance 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Management Configuration, monitoring interface 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Nanagement 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Nanagement 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet Nanagement 1.5Mbytes shared memory 14,880pps for Ethernet, 148,800pps for Fast Ethernet, 1488,100pps for Gigabit Ethernet SNMP MIS SNMP V1/V2c/V3 we SNMP V	Transfer packet Size	64Bytes ~ 9728Bytes (include double Tag VLAN)	
Transfer performance Management Configuration, monitoring interface **In-Band Management: Telnet with SSH, Web-Browser with SSL, IPv6, SNMP V1/V2c/V3 w SNMP Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP **Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command **USB Firmware upgrade and configuration backup and restore System Manage Secure **Telnet/Local Console support command like interface with Cisco like commands, and of 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet secure 5 supports Manage Station with IP Secure function, up to 4 Manage Stations **Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication SNMP MIB Management Utility Management Utility Management Utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	MAC address Table	16K	
Configuration, monitoring interface * In-Band Management: Telnet with SSH, Web-Browser with SSL, IPv6, SNMP V1/V2c/V3 w SNMP Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command USB Firmware upgrade and configuration backup and restore * Telnet/Local Console support command like interface with Cisco like commands, and off 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet secur Supports Manage Station with IP Secure function, up to 4 Manage Stations Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication **SNMP MIB** MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication		· · · · · · · · · · · · · · · · · · ·	
SNMP Trap (4 Trap Stations), RMON Group 1,2,3,9, Modbus/TCP, EtherNet/IP Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command USB Firmware upgrade and configuration backup and restore Telnet/Local Console support command like interface with Cisco like commands, and of 4 management sessions; the system supports SSL for HTTP security, SSH for Telnet secur Supports Manage Station with IP Secure function, up to 4 Manage Stations Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	Management		
4 management sessions; the system supports SSL for HTTP security, SSH for Telnet security. Supports Manage Station with IP Secure function, up to 4 Manage Stations • Management Device Login Switch System by Remote RADIUS account/password, key for RADIUS Server authentication SNMP MIB MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication		 Out-Band Management: Local RJ-45/RS-232 connector with Cisco like command 	
Management Utility Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topo Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	System Manage Secure	 Management Device Login Switch System by Remote RADIUS account/password, key for 	
Discovery Network Time Protocol NTP protocol with daylight saving and localize time sync function IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	SNMP MIB	MIB II, Bridge MIB, Ethernet Like MIB, VLAN MIB, IGMP MIB, Private MIB	
IEEE 1588 PTP IEEE 1588 Precision Time Protocol v1/v2 E-mail Warning 4 receipt E-mail accounts with mail server authentication	Management Utility	Management utility with IEEE 802.1AB link Layer Protocol for Device finding and Link Topology Discovery	
E-mail Warning 4 receipt E-mail accounts with mail server authentication	Network Time Protocol	NTP protocol with daylight saving and localize time sync function	
·	IEEE 1588 PTP	IEEE 1588 Precision Time Protocol v1/v2	
System log Local or remote log server with authentication	E-mail Warning	4 receipt E-mail accounts with mail server authentication	
·	System log	Local or remote log server with authentication	

Korenix Technology

Network Performance	
Port Configuration	Port Link Speed, Link Mode, Link Status and Port Enable/Disable
Port Trunk/ Link Aggregation	IEEE 802.3ad port aggregation and static port trunk, Trunk member up to 8 ports, maximum 8 trunk groups include Gigabit Ethernet port
VLAN	IEEE 802.1Q tag VLAN with 4K VLAN/GVRP entries 3 VLAN modes - Trunk, Hybrid and Link access
Private VLAN	Direct Client ports in isolated /community VLAN to promiscuous port in primary VLAN
IEEE 802.1 QinQ	Double Tag for Private VLAN Access
Class of Service	IEEE 802.1p class of service, 8 priority queues/port
Traffic Prioritize	Supports 8 physical queues with weighted fair queuing (WRR) or Strict Priority Schemer, which follows IEEE 802.1p CoS tag and IPv4 Type of Service/Differ information to prioritiz the traffic of your industrial network
IGMP Snooping	IGMP Snooping v1/v2/v3 for multicast filtering and IGMP Query mode, also support unknown multicast forwarding policies- Drop, Flooding and Forward to route port
Rate Control	Ingress/Egress filtering for Broadcast, Multicast, Unknown DA or All packets
Port Mirroring	On-line traffic monitoring on multiple selected target ports
DHCP	DHCP Client/Server with IP & MAC address binding, DHCP Relay Agent function and DHCP Server with Static port based IP assigned function
Advanced Cyber Security *See Note-1	Port security, IEEE 802.1x, DHCP Snooping, IP Source Guard, Dynamic ARP Inspection, L2/L3/L4 Access Control List (ACL), TACACS+
Industrial Protocol	Modbus/TCP, EtherNet/IP
Network Redundancy	
Redundancy	Multiple Super Ring TM Technology, Includes Rapid Super Ring, Rapid Dual Homing, TrunkRing TM , MultiRing TM , SuperChain TM
Rapid Dual Homing	Multiple uplink paths to one or multiple upper Switch, up to 256 Groups RDH Peer protection
TrunkRing TM	Integrate port aggregate function in ring path to get higher throughput ring architecture
MultiRing TM	Couple or multiple up to 14 Rapid Super Rings in one device, supports up to 12 100M rings and 2 Gigabit rings
SuperChain TM	It is new ring technology with flexible and scalability, compatibility, and easy configurable. The ring includes 2 types of node Switch - Border Switch and Member Switch
Rapid Spanning Tree	IEEE 802.1D-2004 Rapid Spanning Tree Protocol. Compatible with Legacy Spanning Tree and IEEE 802.1w
Multiple Spanning Tree	IEEE 802.1s Multiple Spanning Tree, each MSTP instance can include one or more VLANs, and also supports multiple RSTP deployed in a VLAN or multiple VLANs
ITU-T G.8032 ERPS *See Note-2	Support ITU-T G.8032 ERPS V1 single ring topology, and ERPS v2 multiple rings with ladde topology
Loop Protection	The Loop Protection prevents any network looping
Power Requirement	
System Power	Input voltage: AC110/220 (90-264VAC), DC24/48V(18~75VDC)
Power Consumption	Max. 16Watts (DC mode) Max. 20Watts (AC mode 110V) Max. 23Watts (AC mode 220V)
Mechanical	
Installation	19", 1U Rackmount
Enclosure Material	Steel Metal
Dimension	44mm(H) x 438mm (W) x 170mm (D)
Weight	2.65 kg with package
Ingress Protection	IP 30

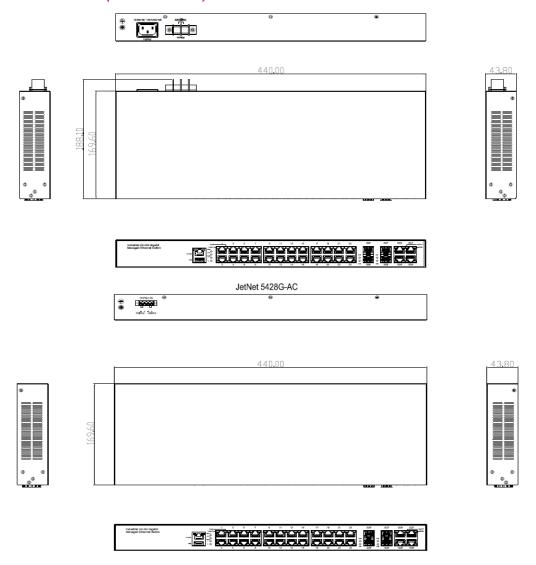
Korenix Technology

Environmental		
Operating Temperature	-40°C~75°C	
Operating Humidity	10%-95%, Non-Condensing	
Storage Temperature	-40°C~85°C	
Hi-Pot Insulation	AC 1.5KV for Ethernet Interface to Power, Power to Case	
MTBF(hrs)	>234,000	
Approvals		
Traffic Control	NEMA TS2	
EMC	EMI: IEC/EN61000-3-2, EN61000-3-3, EN55022 FCC Class A, CE Radiation, Conduction EMS: IEC/EN55024 IEC61000-4-2, IEC61000-4-3, IEC61000-4-4, IEC61000-4-5, IEC61000-4-6, IEC61000-4-8 IEC61000-4-11	
Vibration	IEC 60068-2-6, IEC 60068-2-36	
Shock	IEC 60068-2-27	
Free Fall	IEC 60068-2-32	
Warranty	5 Years	

^{*} Note-1: Advanced Cyber Security - DHCP Snooping, IP Source Guard, Dynamic ARP Inspection, TACACS+ (By Request) * Note-2: ITU-T G.8032 ERPS - ERPS v2 multiple rings with ladder topology (By Request)

Korenix Technology

Dimension (Unit = mm)



JetNet 5428G-2DC

Ordering Information

JetNet 5428G-AC

24 100TX, 4 100/1000 RJ-45/SFP combo ports, Ind. Gigabit Managed Ethernet Switch, -40-75°C, AC power

JetNet 5428G-2DC

24 100TX, 4 100/1000 RJ-45/SFP combo ports, Ind. Gigabit Managed Ethernet Switch, -40-75°C, dual DC power

Distributore Korenix per l'Italia: