SICOM3005A



> Overview

SICOM3005A series is a serial device server integrated industrial Ethernet switch supporting 4 RS232/485/422 serial ports, 6 100Mbits fast Ethernet ports including optional 2 fiber optic or 10/100Base-TX RJ45 ports and 4 10/100Base-TX RJ45 ports. SICOM3005A series supports extended power supply range including 12-24VDC(9-36VDC), 24-48VDC(18-72VDC), and 100-240AC 50/60Hz,110-220VDC(77-300VDC/85-264VAC) which enable SICOM3005A for all kinds of industrial applications including power utilities. The serial device server of SICOM3005A series supports flow control, multiport serial to UDP, mirroring of serial traffic and 1500VAC isolation protection for serial signals. The 4 serial ports of SICOM3005A are in RJ50 connectors and the serial device server shares the same firmware version with Kyland GPT serial device server modules. The SICOM3005A series combines an industrial device server with a full-function managed Ethernet switch allowing you to easily install, manage, and maintain the product, saving space in your cabinet, and reducing overall power consumption and costs. SICOM3005A is specially designed for industrial applications being able to handle a wide range of temperatures and ensure high reliability in extreme industrial environments. Based on Kyvision3.0 NMS, CLI, WEB interface, it offers centralized management. The state-of-the-art OPC software enables the switch's management embedded in various industrial systems.

Software Functions

Software Functions

Support API base on Linux, allow customer to development privately. Supports protocol conversion between TCP/UDP and serial protocols such as RS232/RS485/RS422. UART flow control base on software

Make sure data safety by filtering of access list Serial ports support mirror, VLAN base on IP layer, static route. Transmission statistics

6 Switching Ports + 4 Serial Ports Managed Serial Device Server

- 2 100Base-FX ports,4 or 6 10/100Base-TX ports and 4 serial ports.
- Supports protocol protocol exchange between TCP/UDP and serial protocols such as RS232/RS485/RS422.
- Supports API interface for user program.
- Flow control by software, serial-security, serial-static route
- Support Ethernet security management, ring-redundancy, broadcast protocol.
- Ingress protection class IP40.

Switching

VLAN,PVLAN,GVRP Port trunk, flow control, speed limit ARP SP,WRR quality of service

Redundancy

DT-Ring, recover time with in 50ms when a link failed, and is not susceptible to influence of particular topology. DRP,DHP, recover within 20ms when a link failed; Support STP/RSTP in accordance with 802.1d and 802.1w

Multicast

IGMP Snooping, GMRP and static multicast

Network Security

IEEE802.1X, TACACS+, SSH, SSL, port security, AAA, Mac filtering Port alarm, power alarm, ring alarm

Management & Maintenance

DHCP, port mirror, LLDP, link status detection CLI, Telnet, Web, Kyvision and SNMP(V2,V3) FTP/TFTP software updated and transmission files, log recording and uploading.

Clock Management

Support SNTP Client

Industrial Ethernet Solutions

V

Serial

Device

Serve

Technical Specification

Technical Parameter

- Standard RS232/485/422
- EEE 802.3i(10Base-T)
- IEEE 802.3u(100Base-TX and 100Base-FX)
- IEEE 802.3x(flow control)
- IEEE 802.1p(priority)
- IEEE 802.1Q(VLAN)
 IEEE 802.1 (PCTP)
- IEEE 802.1w(RSTP)

Switching Properties

VLAN Quantity	256
VLAN ID	$1 \sim 4093$
Quantity of Multicast Groups	256
MAC Table Size	8K
Packet Buffer Size	2Mbit
Packet Forwarding Rate	0.9Mpps
Forwarding Delay	<10µs
Priority of Queue	4

Interface

Fast Ethernet Ports

- 100Base-FX,single-mode or multi-mode,SC/ST/FC connector is optional
- 100Base-TX auto negotiation,RJ45 connector
- UART Port
- RJ50 connector,
- Compatible with RS232,RS85 and RS422 protocols.
- Console
- RS232protocol,RJ45connector
- Alarming Contactor
- 3 pin 5.08mm plugs,5A at 30Vdc,8A at 250Vac

LED

- LED on Front Panel
- PWR1,PWR2:power LED;
- Run1:runing LED;
- Run2:serial server running LED;
- ALARM:alarming LED;
- Ring:ring status LED(master or slave)
- 5,6:status of 5,6 ports;
- 1-4:port status of 1-4;
- Green:connection status;
 - * Yellow:speed;
- D1-D4:serial port status LED
 - Green:serial port sending data;
 - Yellow: serial port receiving data;

Button

Reset Button

Power Requirements

Input Voltage

Redundancy

- 12-24VDC(9-36VDC),
- 24-48VDC(18~72VDC),
- 100-240AC 50/60Hz,110-220VDC(77~300VDC/85~264VAC)
 Power Terminal
- 5 pin 5.08mm spacing plug-in terminal block
 Power Consumption <10W
 Over-load Protection Support
 Reverse Protection Support

Physical Characteristics

Housing	Metal, fanless
IP class	IP40
Dimension	66mm×135mm×107.5mm(W×H×D)
Weights	0.6Kg
Installation	DIN-rail or wall-mount

Support

307,699 hrs

5 years

Environmental Limits

Operating Temperature	-40°C -+75°C
Storage Temperature	-40°C -+85°C
Relative Humidity	5-95% RH

Warranty

MTBF	
Warranty	

Approvals

Inquire Kyland websize for the newest dynamic.

Industry Standard

EMI

CFR47 Part 15,EN55022/CISPR22,Class A

EMS

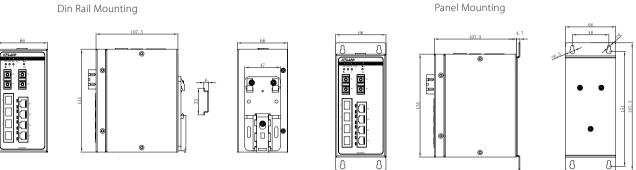
- IEC61000-4-2(ESD) ±8kV(contact),±15kV(air)
- IEC61000-4-3(RS) 10V/m(80MHz ~ 2GHz)
- IEC61000-4-4(EFT) Power Port:±4kV;Data Port:±2kV
- IEC61000-4-5(Surge) Power Port:±2kV/DM,±4kV/CM;Data Port:±2kV
- IEC61000-4-6(CS) 3V(10kHz ~ 150kHz);10V(150kHz ~ 80MHz)
- Environmental
- IEC60068-2-6(vibration)
- IEC60068-2-27(shock)
- IEC60068-2-32(free-fall)
- General industrial standard
- IEC61000-6-2IEC61000-6-4

Railway Traffic

EN50155,EN50121-4 NEMA TS-2

>> Mechanical Drawing

Din Rail Mounting



>> Ordering Information

	SICOM3005A-Ports-Connector-PS
Ports	
2S4T4D	2 100Base-FX single-mode fiber ports,4 10/100Base-T(X) fast Ethernet ports,4 serial ports
2M4T4D	2 100Base-FX multiple-mode fiber ports, 4 10/100Base-T(X) fast Ethernet ports,4serial-mode ports
6T4D	6 10/100Base-T(X) fast Ethernet ports,4serial ports
2S4T	2 100Base-FX single-mode fiber ports,4 10/100Base-T(X) fast Ethernet ports
2M4T	2 100Base-FX multiple-mode fiber ports,4 10/100Base-T(X) fast Ethernet ports
6T	6 10/100Base-T(X) fast Ethernet ports
Connector	100M fiber port specifications
SC05	SC connector, multi-mode, 1310nm, 5km
ST05	ST connector, multi-mode, 1310nm, 5km
FC05	FC connector, multi-mode, 1310nm, 5km
SC40	SC connector, single-mode, 1310nm, 40km
ST40	ST connector, single-mode, 1310nm, 40km
FC40	FC connector, single-mode, 1310nm, 40km
SC60	SC connector, single-mode, 1310nm, 60km
SC80	SC connector, single-mode, 1550nm, 80km
PS	
HV	220AC/DCW(85-264VAC/77-300VDC),single power
L2-L2	24DCW(18-72VDC),redundant power
L5-L5	12DCW(9-36VDC),redundant power

Accessories

Accessory Model	Description
DT-BGAZ-09	Panel for wall-mount
DT-FCZ-RJ45-01	Dustproof cover for RJ45 port