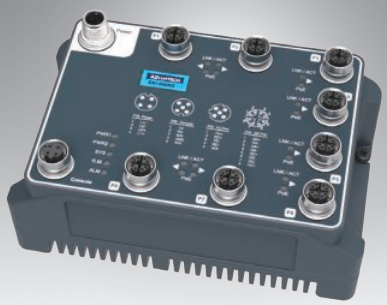
EKI-9508 Series

EN 50155 8-port Ethernet Switch

Preliminary



Features

- M12 connector with IP67 rugged housing
- Complies with EN50155 & EN50121-3-2
- Complies with EN45545-2 & EN61373
- Supports PoE IEEE802.3af/at(PoE model)
- Wide nominal power input range: 24~110V_{DC}
  Operating power input range: 16.8~137.5V_{DC}
- Compact size to fit in different narrow spaces
- Operating temperature:-40 ~ 70°C
- PoE/ non-PoE /Fast Ethernet/ Gigabit Ethernet/ Managed/ Unmanaged options available

Vertrieb durch AMC
AMC – Analytik & Messtechnik GmbH Chemnitz
Heinrich-Lorenz-Str. 55 Tel.: +49/371/38388-0
09120 Chemnitz Fax: +49/371/38388-99
E-Mail: info@amc-systeme.de Web: www.amc-systeme.de

Introduction

EKI-9508 series switch is designed for railway application, with rugged and high EMC performance. EKI-9508 series is the suitable networking solution for rolling stock and wayside applications. It provides M12 connectors for Ethernet/ console/ power-input) connections to ensure tight & robust connectivity, to guarantee reliable operation against environmental disturbances, it complies with IEC61373 vibration and shock for rolling stock application. The portfolio of EKI-9508 series provides multiple options, depends on user's demand, it has Managed type or Unmanaged type, Fast Ethernet or Gigabit Ethernet solutions, with IEEE802.3af/at PoE function (PoE model only), it provides up to total 90Watts power budget for P.D. devices (such as camera, IP-phone and wireless access point).

EKI-9508 series features a "compact" designed, with the IP67 rugged housing and the ample pitch connectors that can easy connect/ disconnect cables without interference to prevent the human error within the harsh industry and narrow environment. With the "short vertical height" dimension, it could be easily deployed/ installed in the cabinet or ceiling partition and integrate mass Ethernet connection in one box.

Specifications

Interface

- **Ethernet Port*** M12 4pin D-coded for Fast Ethernet (10/100BASE-T)
  M12 8pin X-coded for Gigabit Ethernet (10/100/1000BASE-T)
- **Console port** M12 5pin A-Coded (Management model only)
- **Power Connector** M12 5pin A-coded

*See the port options from ordering information

Physical

- **Enclosure** Die-cast zinc front panel
- and extruded aluminum chassis
- **Protection Class** IP67
- **Installation** Wall Mount
- **Dimensions** 160 x 100 x 57.2 mm (W x H x D)
- **Weight** 1.8 kg

LED Display

- **System LEDs** PWR1, PWR2, SYS, Alarm, R.M. (Management model only)
- **Port LED** Data, PoE(PoE model only)

Environment

- **Operating Temperature** -40 ~ 70°C (-40 ~ 158°F)
- **Storage Temperature** -40 ~ 85°C (-40 ~ 185°F)
- **Ambient Relative Humidity** 5~ 95% (non-condensing)

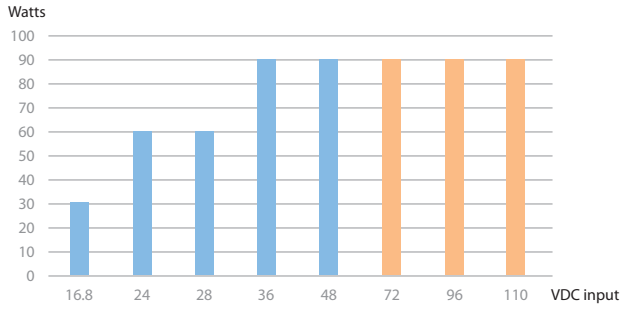
Power (non-PoE Model)

- **Power Consumption** 8 Watts
- **Nominal Input voltage** 24/28/36/48/72/96/110V_{DC}
- **Operating range** 16.8~137.5V_{DC}
- **Over current protection** Yes
- **Reverse polarity protection** Yes

Power (PoE Model)

- **Power Consumption** 15 Watts
- **Nominal Input voltage** 24/28/36/48/72/96/110V_{DC}
- **Operating range** 16.8~137.5V_{DC}
- **Reverse polarity protection** Yes
- **Over current protection** Yes

PoE Power budget



Certification

- **Safety** EN62368-1
- **EMC** CE, EN55011/ 55032/ 55035; FCC Part 15 Subpart B class A
- **EMS** EN61000-4-2 (ESD); EN61000-4-3 (RS); EN61000-4-4 (EFT); EN61000-4-5 (Surge); EN61000-4-6 (CS)
- **Shock** EN61373
- **Vibration** EN61373
- **Freefall** IEC60068-2-31
- **Railway** EN50155, EN 50121-3-2
- **Fire protection** EN45545
- **Other** EN61000-6-4, EN61000-6-2

Switch Properties (Management model only)

- **DRAM** 64MB
- **Flash** 32MB
- **Max. IGMP group** 256
- **Max static VLANs** 256
- **VLAN ID range** 1-1094
- **MAC table** 8K
- **Jumbo frame** 9KB
- **Packet buffer** 4.1MB
- **Max priority queues** 8

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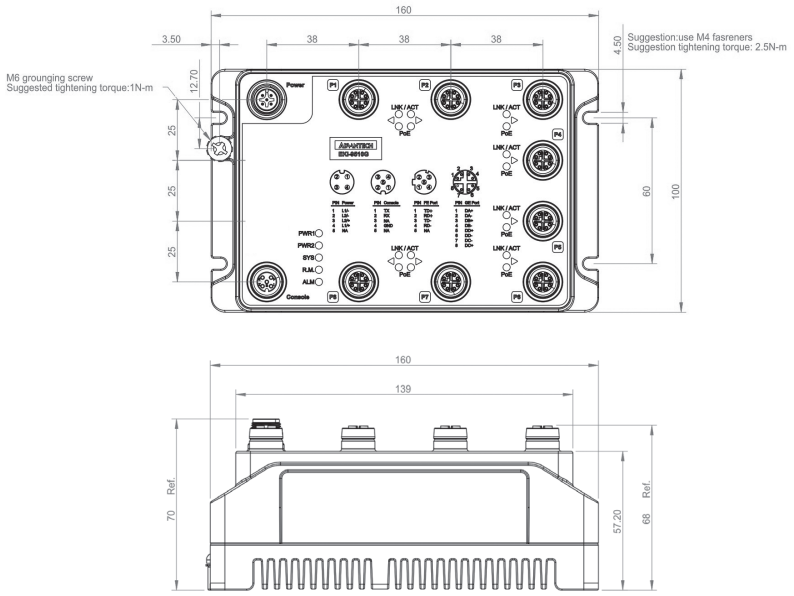
E-Mail: info@amc-systeme.de Web: www.amc-systeme.de

Dimensions

Unit: mm [in.]



L2 Features (Management model only)

- **L2 MAC Address** 8K
- **Jumbo Frame** 9KB
- **VLAN Group** 256 (VLAN ID 1~4093)
- **VLAN** 802.1Q VLAN, GVRP
- **Port Mirroring** Per port, Multi-source port
- **IP Multicast** IGMP Snooping v1/v2/v3, MLD Snooping, IGMP Immediate leave
- **Storm Control** Broadcast, Multicast, Unknown unicast
- **Redundancy Protocol** IEEE 802.1D-STP, IEEE 802.1s-MSTP, IEEE 802.1w-RSTP, X-Ring Pro

QoS (Management model only)

- **Priority Queue** Scheduling WRR (Weighted Round Robin), SP (Strict Priority)
- **Class of Service** IEEE 802.1p based CoS, IP TOS, DSCP based CoS
- **Rate Limiting** Egress Rate limit
- **Link Aggregation** IEEE 802.3ad Dynamic Port Trunking, Static Port Trunking

Security (Management model only)

- **Port Security** Static, Dynamic
- **Authentication** 802.1x (Port-Based, MAC-Based), RADIUS, TACACS+
- **Advanced Security** IP Source Guard

Management (Management model only)

- **DHCP** Client, Server, Option 66/67
- **Access** SNMP v1/v2c/v3, WEB, Telnet, RMON, Standard MIB, Private MIB
- **Security Access** SSH 2.0, SSL
- **Software Upgrade** TFTP, HTTP, Dual Image
- **NTP** NTP server/client

Accessories

PN		Description
OPT1-M12-CRP-4MD		Phoenix Contact M12 D-code 4 pin Male crimp type connector
OPT1-M12-CRP-8MX		Phoenix Contact M12 X-code 8 pin Male crimp type connector
OPT1-M12-CRP-5MA		Phoenix Contact M12 A-code 5 pin Male crimp type connector
OPT1-M12-CRP-4FA		Phoenix Contact M12 A-code 4 pin Female crimp type connector
OPT1-M12C-4MD-150R		M12 D-code 4 pin Male to RJ45, cable length:1.5m
OPT1-M12C-8MX-150R		M12 X-code 8 pin Male to RJ45, cable length:1.5m
OPT1-M12C-5MA-DB9		M12 A-code 5 pin Male to DB9 console, cable length:1.5m
OPT1-M12C-4FA-100A		M12 A-code 4 pin Female to 1m cable
1990023703S000		M12 waterproof CAP (1pc.)

Ordering Information

Part number	Management model	10/100BASE-T	10/100/1000BASE-T	PoE ports
EKI-9508E-MPW-B	Yes	8 (P1-P8)		8 (P1-P8)
EKI-9508G-MPW-B	Yes		8 (P1-P8)	8 (P1-P8)
EKI-9508E-PW-B		8 (P1-P8)		8 (P1-P8)
EKI-9508G-PW-B			8 (P1-P8)	8 (P1-P8)
EKI-9508E-MW-B	Yes	8 (P1-P8)		
EKI-9508G-MW-B	Yes		8 (P1-P8)	
EKI-9508E-W-B		8 (P1-P8)		
EKI-9508G-W-B			8 (P1-P8)	