

Datasheet

ADA-13110MG

RS232 to ETHERNET converter with MODBUS GATEWAY



APPLICATION

ADA-13110MG converter is use for data transmission between devices equip with RS232 interface via LAN/WAN network. Data transmission takes place without the interference of data format. Operating in ETHERNET network can be in Virtual Serial Port, TCP serial bridge, UDP serial bridge, TCP sockets, UDP sockets, MODBUS Data Gateway. The MODBUS Data Gateway converts MODBUS-RTU master/slave and MODBUS-ASCII master/slave protocol to MODBUS-TCP and inversely. This allows for integrate MODBUS-RTU/ASCII with MODBUS-TCP devices within one network.

Can be configured and managed via Internet browser – converter has implemented WWW server. ADA-13110MG has standard DB-9M (male) RS232 connector, screw terminal block for connecting the power supply and RJ45 modular connector for ETHERNET network connection. The converter transmits data via RS232 interface with maximum baud rate up to 230,4 kbps and uses signals Rx, Tx, RTS, CTS, DTR, DSR, DCD of RS232 interface.

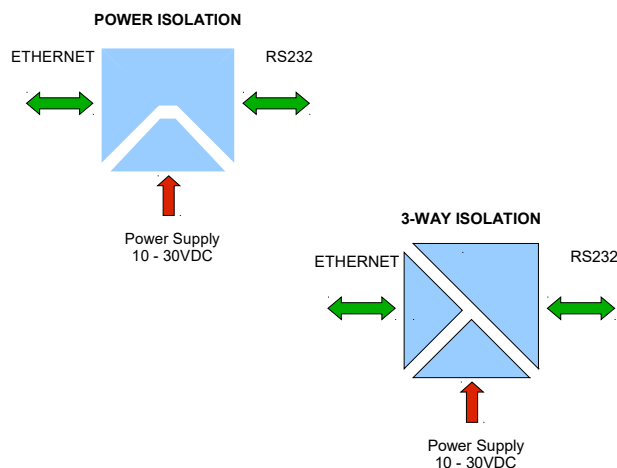
To the RS232 port of ADA-13110MG can be connected to telephone exchanges, barcode scanners, modems, weight, magnetic card readers. It is adapted for powering from the regular voltage external source which value should contain from 10V to 30V and was provided from the power pack about 3W power. Converter has implemented protection against opposite polarization of power supply and over-voltage protection ESD 15kV on RS232 interface lines.

TECHNICAL DATA

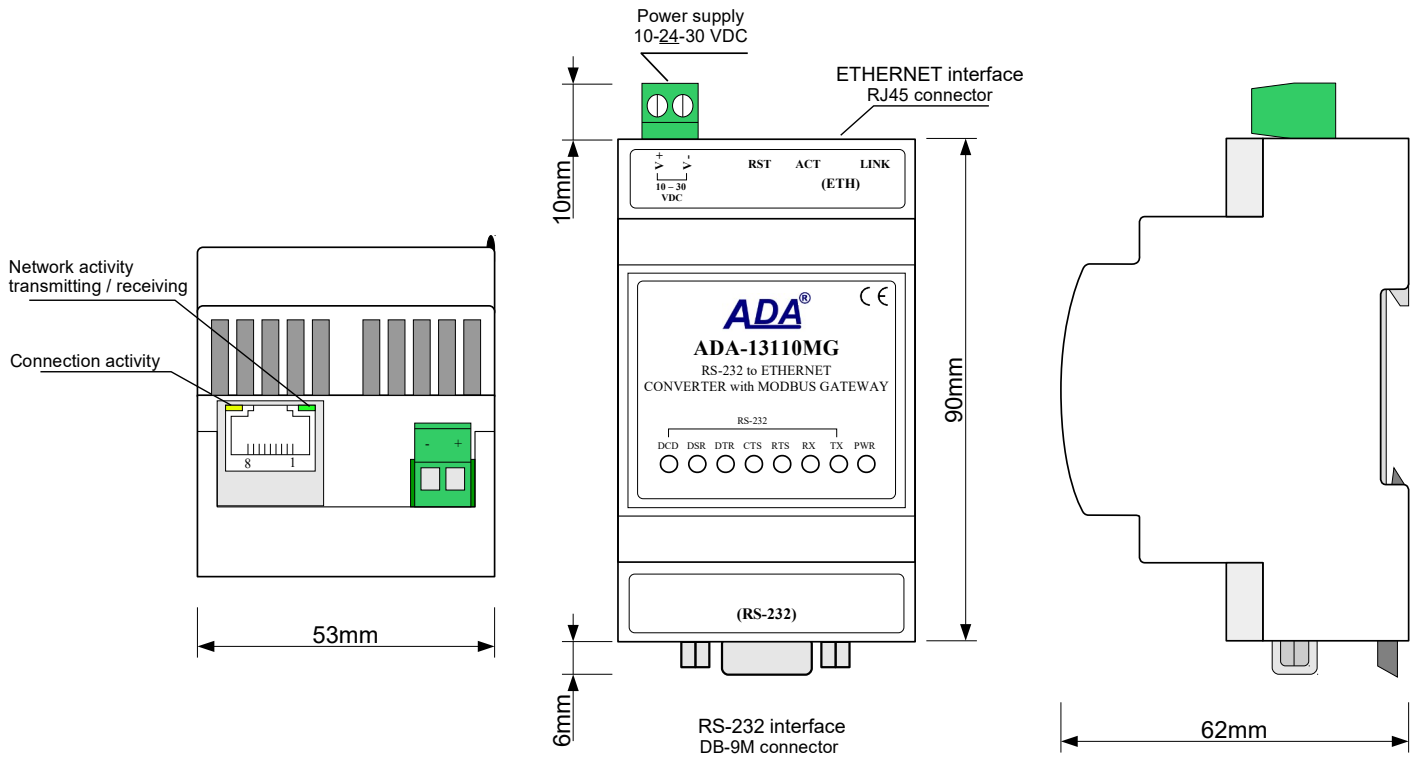
Transmission Parameters		
Interface	ETHERNET	RS232
Connector	RJ45	DB-9M (male)
Max. Line length	LAN up to 150 m	Up to 15m
Max. number of connected device	Depend on addressing type in network	1
Transmission line	4-pair twisted cable, UTP	e.g. CAB-DB9F/DB9M-S-

	4x2x0,5 (24AWG), shield inside large interferences STP 4x2x0,5 (24AWG)).	1,8m cable
Standards	IEEE 802.3,	EIA-232, CCITT V.24
Baud rate	10/100 Mbit/s	Up to 230,4 kbps
Transmission type	Asynchronism half duplex or full duplex,	
Optical Signalization	<ul style="list-style-type: none"> • PWD green LED - power supply, • RX red LED - receive data on RS232 port, • TX yellow LED- transmit data on RS232 port, • RTS yellow LED – outgoing signal on RS232 port, • CTS red LED - incoming signal on RS232 port, • DTR yellow LED – outgoing signal on RS232 port, • DSR red LED - incoming signal on RS232 port, • DCD red LED - incoming signal on RS232 port, 	
Electrical Parameters		
Power requirements	10 - 24 – 30 V DC	
Power Cable	Recommended length of power cable – up to 3m	
Power	3W	
Protection from reverse power polarization	YES	
Galvanic Isolation	1kV= or 3kV=(between power circuit and RS232 interface), 1kV= or 3kV=(between power circuit and ETHERNET signal line)	
Electromagnetic compatibility	Resistance to disruptions PN-EN 55024. Emission of disruptions PN-EN 55022.	
Safety requiring	According to the PN-EN60950 norm.	
Environment	Commercial and light industrial.	
Environmental Parameters		
Operating temperature	-30 ÷ 60°C	
Humidity	5 ÷ 95% - non-condensing	
Storage temperature	-40 ÷ 70°C	
Casing		
Dimensions (W x D x H)	53mm x 90mm x 62 mm	
Material	PC/ABS	
Degree of casing protection	IP40	
Degree of terminal protection	IP20	
Weight	0,10 kg	
According to standards	DIN EN50022, DIN EN43880	
Location during work	Free	
Mounting method	On the rail compliant with DIN35 / TS35 standard.	

GALVANIC ISOLATION



DIMENSIONS AND CONNECTION



VERSIONS

ADA-13110MG - [] - []	
Electronic versions:	
Basic	1
Galvanic isolation:	
1kV= from the power supply	2
3kV= from the power supply	3
1kV= 3-way	23
3kV= 3-way	33

Order example:

Product Symbol: **ADA-13110MG-1-2**

- 1 – basic version of electronic,
- 2 – 1kV= galvanic isolation, from the power supply,

Isolation from the power supply allows transmitting signals: Tx, Rx, RTS, CTS, DTR, DSR, DCD of RS232 interface.
 3-way isolation allows transmitting signals: Tx, Rx, RTS of RS232 interface.