



MCN-3

THREE-PHASE AC VOLTAGE AND CURRENT MEASURE INTERFACE



APPLICATION

- » three-phase voltage and current measurement

FEATURES

- » co-operation with remote monitoring system
- » galvanic separation
- » easy installation
- » operation kept to a minimum
- » small dimensions

COMMUNICATION

- » RS-485 communication with MSU2 or MRS monitoring controller

CONSTRUCTION

The construction of module allows easy installation in device with DIN35 bus. Connections with other modules and measured signals are done using cut-off connectors and connectors.

DESCRIPTION

The MCN-3 Interface is adapted for co-operation with MSU-2 or MRS controller. It is used for monitoring power systems (low-voltage distribution boards, inverters, UPS, aggregates etc.) as three-phase load parameters measuring system output voltage and load current.

The load current value is measured by internal Current Transformer (CT) or external CT added to input connector of the module.

The interface measures three-phase voltage and current RMS value in each channel independently.

MCN-3 module uses bidirectional RS-485 bus for communication with MASTER controllers. Double RJ45 connector allows connecting other measuring modules.

The module is additionally equipped with universal digital inputs of general purposes to which external sensors can be connected.

Nominal supply voltage	12 VDC
Max current consumption (transmission)	300 mA
Max current consumption (collection)	25 mA
Number of measuring channels	3
Voltage measurement range	0 ÷ 265 VAC
Voltage measurement accuracy	1%
Current measurement range (internal CT)	0 ÷ 25 A
Current measurement range (external CT)	dependant on current transformer used
Current measurement accuracy	2%
Communication bus	RS-485 (full duplex)
Maximum transmission speed	115,2 kb/s
Bus impedance	120Ω
Maximum RS-485 length	1000 m
RS-485 bus connector	2 x RJ45
Number of digital universal inputs	4
Input voltage range	0 ÷ 5 V
Ambient temperature	-20 ÷ +50°C
Permissible relative humidity	90%
International Protection Rating	IP20
Case assured isolation	double
Isolation between circuits	basic
Connector type	5,08 mm connector
Dimensions (L x H x D)	95 x 78 x 58 mm
Weight	350 g