CMeX10S-13S

M-Bus Master for 32-256 meters

CMeX10S-13S is an M-Bus Master which, by providing additional drive strength, extends the number of meters an Elvaco CMe Series Gateway is able to use. The product is equipped with a unique IR Pass Through feature which enables up to four CMe/CMeX Series devices to communicate via IR, by stacking them side-by side. The product also supports integration with existing M-Bus systems through RS232.

Technical specification

Mechanics

Protection class	IP20
Dimensions (w x h x d)	108 x 90 x 65 mm
Mounting	DIN-rail (DIN 50022) 35 mm
Weight	220 g

Electrical connections

Supply voltage	Screw terminal. Cable 0.75-2.5 mm²
M-Bus master port	Pin terminal. Solid wire 0.6-0.8 Ø mm
RS232	RJ45 8/8

Electrical characteristics

Nominal voltage	100-240 VAC (±10%)
Voltage range	-10 % to +10 % of nominal voltage
Frequency	50/60 Hz
Power consumption (max)	<25 W
Power consumption (nom)	0.07 W x M-Bus unit loads + 1.5 W
Overvoltage category	CAT 2

User interface

Grenn LED	Power
Red LED	Error
Yellow LED 1	M-Bus data transmission from device
Yellow LED 2	M-Bus data transmission to device

Approvals

EMC	EN 61000-6-2, EN 61000-6-3, FCC 47 CFR
Safety	EN 62368-1 2018, UL 62368-1:2014 Ed.2, CSA C22.2#62368-1:2014 Ed.2

M-Bus

Interfaces	IR, integrated M-Bus Master
M-Bus standard	EN 13757

Integrated M-Bus Master

Nominal voltage	42 VDC
M-Bus baud rate, masterport	300 och 2400 bit/s
Maximum numbers of M-Bus devices	CMeX10S: 32 CMeX11S: 64 CMeX12S: 128 CMeX13S: 256
M-Bus search modes	Primary, secondary
Maximum cable length	5000 m (100 nF/km, maximum 90 ohm)
IR Pass Through	Yes, with a maximum of four devices stacked side by side

Integration

Compability	All M-Bus meters, ABB meters with IR interface, CMe/CMeX Series

Environmental specifications

Operating temperature	-30 °C to +55 °C
Operating humidity	5 % to 90 %, non-condensing
Operating altitude	0-2000 m
Pollutuion degree	Degree 2
Usage environment	Indoors, can be extended with IP67 enclosure for outdoor use
Storage temperature	-40 °C to +85 °C