Controller
CPX-E-CEC-M1-EP

Part number: 4252744

General operating condition

Data sheet

Feature	Value
Dimensions W x L x H	75.9 mm x 82.5 mm x 124.3 mm
Width dimension	18.9 mm
Type of mounting	With H-rail
Max. number of modules	10
Product weight	288 g
Mounting position	Vertical Horizontal
Ambient temperature	-5 °C ... 50 °C
Note on ambient temperature	-5 - 60 °C for vertical installation
Storage temperature	-20 °C ... 70 °C
Relative air humidity	95 % Non-condensing
Degree of protection	IP20
Corrosion resistance class (CRC)	0 - No corrosion stress
Vibration resistance	Transport application test with severity level 1 as per FN 942017-4 and EN 60068-2-6
Shock resistance	Shock test with severity level 1 as per FN 942017-5 and EN 60068-2-27
Protection against direct and indirect contact	PELV
LABS (PWIS) conformity	VDMA24364 zone III
CE marking (see declaration of conformity)	As per EU EMC directive As per EU RoHS directive
UKCA marking (see declaration of conformity)	To UK RoHS instructions
KC characters	KC EMC
Certification	RCM compliance mark c UL us - Listed (OL)
Certificate issuing authority	UL E239998
Note on materials	RoHS-compliant
Housing material	PA
Diagnostics via LED	Force mode Module status Network status Network status, engineering port 1 Engineering port 2 network status EtherCAT network status Network status, port 1 Network status, port 2 Run Power supply for electronics/sensors Load power supply System fault

Feature	Value
Control elements	DIL switch for RUN/STOP Rotary switch for address setting Optional: CDSB operating unit
IP address setting	DHCP Via CODESYS Optional: via CDSB operating unit
Fieldbus interface, type	Ethernet
Fieldbus interface, protocol	ACD (Address Conflict Detection) DLR (Device Level Ring) EtherNet/IP EtherNet/IP QoS EtherNet/IP Quickconnect SNMP
Fieldbus interface, function	Bus connection, incoming/forwarding
Fieldbus interface, connection type	2x socket
Fieldbus interface, connection technology	RJ45
Fieldbus interface, connection pattern	00995789
Fieldbus interface, number of poles/wires	8
Fieldbus interface, galvanic isolation	yes
Fieldbus interface, transmission rate	100 Mbit/s
Fieldbus interface 2, type	Ethernet
Fieldbus interface 2, protocol	CoE EoE EtherCAT® FoE
Fieldbus interface 2, function	Bus connection, forwarding
Fieldbus interface 2, connection type	Socket
Fieldbus interface 2, connection technology	RJ45
Fieldbus interface 2, connection pattern	00995789
Fieldbus interface 2, number of poles/wires	8
Fieldbus interface 2, galvanic isolation	yes
Fieldbus interface 2, transmission rate	100 Mbit/s
Ethernet interface, connection type	2x socket
Ethernet interface, protocol	EasyIP Modbus® TCP OPC-UA TCP/IP
Ethernet interface, function	Diagnostics Switch
Ethernet interface, connection technology	RJ45
Ethernet interface, connection pattern	00995789
Ethernet interface, number of poles/wires	8
Ethernet interface, transmission rate	10 Mbit/s 100 Mbit/s
Max. address capacity inputs	64 byte
Fieldbus interface, max. address volume for inputs	512 byte
Max. address capacity outputs	64 byte
Fieldbus interface, max. address volume for outputs	512 byte
System parameter	Diagnostic memory Fail-safe response System start
Module parameters	Channel alarms for undervoltage Analog module process value representation
Configuration support	Operator unit CDSB CODESYS V3
Additional functions	CODESYS V3 with SoftMotion
CPU data	Dual core 766 MHz
Storage medium	Micro SD <= 32 GB USB memory stick <= 32 GB

Feature	Value
Power supply, function	Electronics and sensors
Power supply, type of connection	Terminal strip
Power supply, note on connection type	› 4 A and UL 2x terminal strip for power supply
Power supply, connection technology	Spring-loaded terminal
Power supply, connection pattern	00995847
Power supply, number of pins/wires	4
Nominal operating voltage DC for electronics/sensors	24 V
Permissible voltage fluctuations for electronics/sensors	± 25 %
Power supply, conductor diameter	0.2 mm² ... 1.5 mm²
Power supply, information on conductor diameter	0.2 - 2.5 mm² for flexible conductors without cable end sleeves
Max. power supply	8 A
Intrinsic current consumption at nominal operating voltage for electronics/sensors	Typically 150 mA
Power failure buffering	20 ms
Reverse polarity protection	24 V sensor supply against 0 V sensor supply
USB interface	USB 2.0
Programming software	CODESYS provided by Festo
Program memory	100 MB user program
Processing time	Approx. 200 µs/1 k instruction
Function blocks	and others Read CPX-E module diagnostics CPX-E diagnostic status Copying of CPX-E diagnostic trace
Buffer time real-time clock	3 Weeks
Flag	CODESYS variable concept
Electrical isolation between channel and internal bus	yes