XCP-Gateway Basic

Product description

The protocol converter **XCP-Gateway Basic** is especially designed for the CSM EtherCAT® measurement module series and has been developed for measurement tasks with numerous measurement channels and high measurement data rates. **XCP-Gateway Basic** allows the linking of CSM EtherCAT® measurement devices to the data protocol XCP-on-Ethernet, thus combining the advantages of data acquisition via EtherCAT® with the flexibility of the widespread standard XCP-on-Ethernet.

By using the XCP standard, **XCP-Gateway Basic** is not only suited for various stationary fields of application but most of all for the connection to common measurement data acquisition systems that are used in mobile applications.

Key features

- *EtherCAT® to XCP-on-Ethernet converter*
  - *EtherCAT®: time synchronization of all measurement signals better than 1 μs*
  - *XCP-on-Ethernet: accuracy of measurement signal time stamps is 1 μs*
- *Suited for 4.5 million data points per second (MS/s), e.g. four channels with 1 MHz*
- *Autonomous master for CSM EtherCAT® devices of the measurement module series*
- *Simple configuration of XCP-Gateway Basic and connected measurement modules via CSMconfig*

Shipping content

- XCP-Gateway Basic
- Configuration software CSMconfig
- Documentation

Accessories

- See datasheet "ECAT Accessories".

CSM GmbH
Computer-Systeme-Messtechnik

Innovative Measurement and Data Technology

Technical data

Type designation	XCP-Gateway Basic
PC	
Physical layer	Ethernet 100Base-TX, 100 MBit/s
Protocol	XCP on UDP/IP
ECAT	
Physical layer	Ethernet 100Base-TX, 100 MBit/s
Protocol	EtherCAT®
Configuration	via CSMconfig, settings are stored in the device
Power supply	
Minimum	6 V DC (-10 %)
Maximum	50 V DC (+10 %)
Power consumption	typ. 2 W
LED Ethernet	Link/Activity PC (green) / Link/Activity ECAT (green)
LED Status	2 multi-colored LEDs for gateway and bus
Housing [1]	aluminium, silver anodized
Protection class	IP67
Weight	approx. 400 g
Dimensions (w × h × d)	approx. 200 × 35 × 50 mm, approx. 200 × 40 × 50 mm (Slide Case)
Connectors	
PC (Ethernet / power supply)	LEMO 1B, 8-pole, code L
ECAT (EtherCAT® / power supply)	LEMO 1B, 8-pole, code A
Sync	LEMO 0B, 2-pole, code G (galvanically isolated) [2]
Operating and storage conditions	
Operating temperature	-40 °C to +85 °C
Relative humidity	5 % to 95 %
Pollution degree	3
Storage temperature	-55 °C to +90 °C
Conformity	CE

[1] Optionally available in other variants.

[2] As of hardware revision C002, older hardware revisions feature a connector without galvanic isolation of type Binder 712, 3-pole.

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