SIEMENS

Data sheet

6ES7137-6AA01-0BA0



SIMATIC ET 200SP, CM PTP communication module for serial connection RS-422, RS-485 and RS-232, freeport, 3964 (R), USS, MODBUS RTU master, slave, max. 250 Kbit/s, suitable for BU type A0, pack quantity: 1 unit

Figure similar

General information	
Product type designation	CM PtP
Firmware version	OIVI I U
FW update possible	Yes
usable BaseUnits	BU type A0
Product function	во туре но
• I&M data	Yes; I&M0 to I&M3
Engineering with	1 65, IXIVIO TO IXIVIS
STEP 7 TIA Portal configurable/integrated from version	STEP 7 V17 or higher
STEP 7 configurable/integrated from version	via GSD as of V5.6 HF4
PROFIBUS from GSD version/GSD revision	GSD as of Revision 5
PROFINET from GSD version/GSD revision	GSDML V2.34
Supply voltage	GODIVIL V2.04
Rated value (DC)	24 V
permissible range, lower limit (DC)	19.2 V
permissible range, lower limit (DC)	28.8 V
Reverse polarity protection	Yes
Input current	
Current consumption (rated value)	31 mA
Current consumption, max.	35 mA
Power loss	
Power loss, typ.	0.7 W
Address area	
Address space per module	
• Inputs	8 byte; performance mode: 32 byte
• Outputs	0 byte; performance mode: 32 byte
Hardware configuration	
Automatic encoding	Yes
Mechanical coding element	Yes
Type of mechanical coding element	type D
1. Interface	21.
Interface types	
• RS 485	Yes
• RS 422	Yes
• RS 232	Yes
Design of the connection	Push-in terminal
Interface types	
RS 232	
Transmission rate, max.	115.2 kbit/s

 Cable length, max. 	45
	15 m
RS 232 auxiliary signals	RTS, CTS, DTR, DSR, RI, DCD
RS 485	250 kbit/s
Transmission rate, max. Only I provide records.	200 1000
Cable length, max.	1 200 m; 100 to 1200 m, depending on transmission speed
RS 422	445.011.77
Transmission rate, max.	115.2 kbit/s
Cable length, max.	1 200 m
4-wire full duplex connection	Yes
4-wire multipoint connection	Yes
Protocols	
Integrated protocols	
Freeport	
— Telegram length, max.	2 kbyte; performance mode: receive data max. 24 byte and send data max. 30 byte
— Bits per character	7 or 8
 Number of stop bits 	1 or 2 bit
— Parity	None, even, odd, always 1, always 0, any
3964 (R)	
— Telegram length, max.	2 kbyte; performance mode: receive data max. 24 byte and send data max. 30
3	byte
— Bits per character	7 or 8
 Number of stop bits 	1 or 2 bit
— Parity	None, even, odd, always 1, always 0, any
Modbus RTU master	
— Address area	1 to 247, extended 1 to 65535
Number of slaves, max.	32
MODBUS RTU slave	
— Address area	1 to 247, extended 1 to 65535
Telegram buffer	
Buffer memory for telegrams	4 kbyte
 Number of telegrams which can be buffered 	255
Interrupts/diagnostics/status information	
Diagnostics function	Yes
Alarms	
Diagnostic alarm	Yes
Hardware interrupt	No
Diagnoses	
Wire-break	Yes
Wire-break Diagnostics indication LED	Yes
	Yes; green PWR LED
Diagnostics indication LED	
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED)	Yes; green PWR LED
Diagnostics indication LED Monitoring of the supply voltage (PWR-LED) for module diagnostics	Yes; green PWR LED Yes; green/red DIAG LED
Diagnostics indication LED ■ Monitoring of the supply voltage (PWR-LED) ■ for module diagnostics ■ Receive RxD	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test)
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min.	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test)
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, max.	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, max. • vertical installation, min.	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C -30 °C
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, max. • vertical installation, max.	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C
Diagnostics indication LED Monitoring of the supply voltage (PWR-LED) for module diagnostics Receive RxD Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation horizontal installation, min. horizontal installation, max. vertical installation, min. vertical installation, max. Altitude during operation relating to sea level	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C -30 °C 50 °C
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, max. • vertical installation, min. • vertical installation, max. Altitude during operation relating to sea level • Installation altitude above sea level, max.	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C -30 °C
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, max. • vertical installation, min. • vertical installation, max. Altitude during operation relating to sea level • Installation altitude above sea level, max. Decentralized operation	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C -30 °C 50 °C
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, min. • vertical installation, min. • vertical installation, max. Altitude during operation relating to sea level • Installation altitude above sea level, max. Decentralized operation to SIMATIC S7-300	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C -30 °C 50 °C 5 000 m
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, max. • vertical installation, min. • vertical installation, max. Altitude during operation relating to sea level • Installation altitude above sea level, max. Decentralized operation to SIMATIC S7-300 to SIMATIC S7-400	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C -30 °C 50 °C 5 000 m
Diagnostics indication LED • Monitoring of the supply voltage (PWR-LED) • for module diagnostics • Receive RxD • Transmit TxD Potential separation between backplane bus and interface Isolation Isolation tested with Ambient conditions Ambient temperature during operation • horizontal installation, min. • horizontal installation, max. • vertical installation, min. • vertical installation, max. Altitude during operation relating to sea level • Installation altitude above sea level, max. Decentralized operation to SIMATIC S7-300	Yes; green PWR LED Yes; green/red DIAG LED Yes; green LED Yes; green LED Yes 707 V DC (type test) -30 °C 60 °C -30 °C 50 °C 5 000 m

to standard PROFINET controller	Yes	
Dimensions		
Width	15 mm	
Height	73 mm	
Depth	58 mm	
Weights		
Weight, approx.	30 g	

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