



SIMATIC ET 200SP, PROFINET interface module IM 155-6PN Basic, Max. 12 I/O modules, 2x integrated RJ45 sockets incl. server module

General information	
Product type designation	IM 155-6 PN BA
HW functional status	from FS04
Firmware version	
<ul style="list-style-type: none"> FW update possible 	Yes
Product function	
<ul style="list-style-type: none"> I&M data 	Yes; I&M0 to I&M3
<ul style="list-style-type: none"> Module swapping during operation (hot swapping) 	Yes; Single hot swapping
<ul style="list-style-type: none"> Isochronous mode 	No
Engineering with	
<ul style="list-style-type: none"> STEP 7 TIA Portal configurable/integrated from version 	V13 SP1
<ul style="list-style-type: none"> STEP 7 configurable/integrated from version 	V5.5 SP4
<ul style="list-style-type: none"> PROFINET from GSD version/GSD revision 	GSDML V2.31
Configuration control	
via dataset	Yes
Supply voltage	
Rated value (DC)	24 V
permissible range, lower limit (DC)	19.2 V
permissible range, upper limit (DC)	28.8 V
Reverse polarity protection	Yes
Short-circuit protection	Yes
Mains buffering	
<ul style="list-style-type: none"> Mains/voltage failure stored energy time 	5 ms
Input current	
Current consumption, max.	300 mA
I^2t	0.09 A ² ·s
Power loss	
Power loss, typ.	1.8 W
Address area	
Address space per module	
<ul style="list-style-type: none"> Address space per module, max. 	32 byte; For input and output data respectively
Address space per station	
<ul style="list-style-type: none"> Address space per station, max. 	32 byte
Hardware configuration	
Rack	
<ul style="list-style-type: none"> Quantity of operable ET 200SP modules, max. 	12
<ul style="list-style-type: none"> Quantity of operable ET 200AL modules, max. 	0
Interfaces	
Number of PROFINET interfaces	1; 2 ports (switch)
1. Interface	

Interface types	
<ul style="list-style-type: none"> • RJ 45 (Ethernet) • Number of ports • integrated switch • BusAdapter (PROFINET) 	<p>Yes; 2 integrated RJ45 ports</p> <p>2</p> <p>Yes</p> <p>No</p>
Protocols	
<ul style="list-style-type: none"> • PROFINET IO Device • Open IE communication • Media redundancy 	<p>Yes</p> <p>Yes</p> <p>Yes; PROFINET MRP</p>
PROFINET IO Device	
Services	
<ul style="list-style-type: none"> — IRT — PROFIenergy — Prioritized startup — Shared device 	<p>No</p> <p>No</p> <p>No</p> <p>No</p>
Interface types	
RJ 45 (Ethernet)	
<ul style="list-style-type: none"> • Transmission procedure • 100 Mbps • Autonegotiation • Autocrossing 	<p>PROFINET with 100 Mbit/s full duplex (100BASE-TX)</p> <p>Yes</p> <p>Yes</p> <p>Yes</p>
Protocols	
Modbus TCP	No
Redundancy mode	
<ul style="list-style-type: none"> • PROFINET system redundancy (S2) 	No
Media redundancy	
<ul style="list-style-type: none"> — MRP — MRPD 	<p>Yes</p> <p>No</p>
Open IE communication	
<ul style="list-style-type: none"> • TCP/IP • SNMP • LLDP 	<p>Yes</p> <p>Yes</p> <p>Yes</p>
Interrupts/diagnostics/status information	
Status indicator	Yes
Alarms	Yes
Diagnostics function	Yes
Diagnostics indication LED	
<ul style="list-style-type: none"> • RUN LED • ERROR LED • MAINT LED • Monitoring of the supply voltage (PWR-LED) • Connection display LINK TX/RX 	<p>Yes; green LED</p> <p>Yes; red LED</p> <p>Yes; Yellow LED</p> <p>Yes; green PWR LED</p> <p>Yes; 2x green link LEDs on BusAdapter</p>
Potential separation	
between backplane bus and electronics	No
between PROFINET and all other circuits	Yes; 1500 V AC (type test)
between supply and all other circuits	No
Permissible potential difference	
between different circuits	Safety extra low voltage SELV
Isolation	
Isolation tested with	707 V DC (type test)
Standards, approvals, certificates	
Network loading class	2
Ambient conditions	
Ambient temperature during operation	
<ul style="list-style-type: none"> • horizontal installation, min. • horizontal installation, max. • vertical installation, min. • vertical installation, max. 	<p>-30 °C; No condensation</p> <p>60 °C</p> <p>-30 °C; No condensation</p> <p>50 °C</p>
Altitude during operation relating to sea level	
<ul style="list-style-type: none"> • Installation altitude above sea level, max. 	5 000 m; Restrictions for installation altitudes > 2 000 m, see manual

connection method	
ET-Connection	
• via BU/BA Send	No
Dimensions	
Width	35 mm
Height	117 mm
Depth	74 mm
Weights	
Weight, approx.	125 g

last modified: 8/8/2023 