

### product type designation



### CP 343-1

Communications processor CP 343-1 for connection of SIMATIC S7-300 to Industrial Ethernet via ISO and TCP/IP, PROFINET IO controller or PROFINET IO device, integrated 2-port switch ERTEC 200, S7 communication, fetch/write, SEND/RECEIVE RFC1006, multicast, DHCP, NTC- CPU sync, with and without diagnostics, initialization via LAN, 2x RJ45 connection for LAN with 10/100 Mbit/s.

transfer rate	
transfer rate	
<ul style="list-style-type: none"> <li>at the 1st interface</li> </ul>	10 ... 100 Mbit/s
interfaces	
number of interfaces / according to Industrial Ethernet	2
number of electrical connections	
<ul style="list-style-type: none"> <li>at the 1st interface / according to Industrial Ethernet</li> <li>for power supply</li> </ul>	2 1
type of electrical connection	
<ul style="list-style-type: none"> <li>of Industrial Ethernet interface</li> <li>at the 1st interface / according to Industrial Ethernet</li> </ul>	RJ45 port RJ45 port
type of electrical connection	
<ul style="list-style-type: none"> <li>for power supply</li> </ul>	2-pole plugable terminal block
supply voltage, current consumption, power loss	
type of voltage / of the supply voltage	DC
supply voltage / 1 / from backplane bus	5 V
supply voltage	24 V
supply voltage / external	24 V
supply voltage / external / at DC / rated value	24 V
relative positive tolerance / at DC / at 24 V	20 %
relative negative tolerance / at DC / at 24 V	15 %
consumed current	
<ul style="list-style-type: none"> <li>from backplane bus / at DC / at 5 V / typical</li> <li>from external supply voltage / at DC / at 24 V / typical</li> <li>from external supply voltage / at DC / at 24 V / maximum</li> </ul>	0.2 A 0.16 A 0.2 A
power loss [W]	5.8 W
ambient conditions	
ambient temperature	
<ul style="list-style-type: none"> <li>for vertical installation / during operation</li> <li>for horizontally arranged busbars / during operation</li> <li>during storage</li> <li>during transport</li> </ul>	0 ... 40 °C 0 ... 60 °C -40 ... +70 °C -40 ... +70 °C
relative humidity	
<ul style="list-style-type: none"> <li>at 25 °C / without condensation / during operation / maximum</li> </ul>	95 %
protection class IP	IP20
design, dimensions and weights	
module format	Compact module S7-300 single width
width	40 mm

height	125 mm
depth	120 mm
net weight	0.22 kg
fastening method	
<ul style="list-style-type: none"> <li>• S7-300 rail mounting</li> </ul>	Yes

#### performance data / open communication

number of possible connections / for open communication / by means of SEND/RECEIVE blocks / maximum	16
data volume	
<ul style="list-style-type: none"> <li>• as user data per ISO connection / for open communication / by means of SEND/RECEIVE blocks / maximum</li> </ul>	8 Kibyte
<ul style="list-style-type: none"> <li>• as user data per ISO on TCP connection / for open communication / by means of SEND/RECEIVE blocks / maximum</li> </ul>	8 Kibyte
<ul style="list-style-type: none"> <li>• as user data per TCP connection / for open communication / by means of SEND/RECEIVE blocks / maximum</li> </ul>	8 Kibyte
<ul style="list-style-type: none"> <li>• as user data per UDP connection / for open IE communication / by means of SEND/RECEIVE blocks / maximum</li> </ul>	2 Kibyte
number of Multicast stations	16

#### performance data / S7 communication

number of possible connections / for S7 communication	
<ul style="list-style-type: none"> <li>• maximum</li> </ul>	16

#### performance data / multi-protocol mode

number of active connections / with multi-protocol mode	32
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#### performance data / PROFINET communication / as PN IO controller

number of PN IO devices / on PROFINET IO controller / operable / total	32
number of external PN IO lines / with PROFINET / per rack	1
data volume	
<ul style="list-style-type: none"> <li>• as user data for input variables / as PROFINET IO controller / maximum</li> </ul>	1 Kibyte
<ul style="list-style-type: none"> <li>• as user data for output variables / as PROFINET IO controller / maximum</li> </ul>	1 Kibyte
<ul style="list-style-type: none"> <li>• as user data for input variables per PN IO device / as PROFINET IO controller / maximum</li> </ul>	1433 byte
<ul style="list-style-type: none"> <li>• as user data for output variables per PN IO device / as PROFINET IO controller / maximum</li> </ul>	1433 byte
<ul style="list-style-type: none"> <li>• as user data for input variables per PN IO device / for each sub-module as PROFINET IO controller / maximum</li> </ul>	240 byte
<ul style="list-style-type: none"> <li>• as user data for output variables per PN IO device / for each sub-module as PROFINET IO controller / maximum</li> </ul>	240 byte

#### performance data / PROFINET communication / as PN IO device

product function / PROFINET IO device	Yes
data volume	
<ul style="list-style-type: none"> <li>• as user data for input variables / as PROFINET IO device / maximum</li> </ul>	512 byte
<ul style="list-style-type: none"> <li>• as user data for output variables / as PROFINET IO device / maximum</li> </ul>	512 byte
<ul style="list-style-type: none"> <li>• as user data for input variables / for each sub-module as PROFINET IO device</li> </ul>	240 byte
<ul style="list-style-type: none"> <li>• as user data for output variables / for each sub-module as PROFINET IO device</li> </ul>	240 byte
<ul style="list-style-type: none"> <li>• as user data for the consistency area for each sub-module</li> </ul>	240 byte
number of submodules / per PROFINET IO-Device	32

#### performance data / telecontrol

protocol / is supported	
<ul style="list-style-type: none"> <li>• TCP/IP</li> </ul>	Yes

#### product functions / management, configuration, engineering

product function / MIB support	Yes
protocol / is supported	
<ul style="list-style-type: none"> <li>• SNMP v1</li> </ul>	Yes
<ul style="list-style-type: none"> <li>• DCP</li> </ul>	Yes
<ul style="list-style-type: none"> <li>• LLDP</li> </ul>	Yes

configuration software	
<ul style="list-style-type: none"> <li>required</li> </ul>	STEP 7 V5.4 SP2 or higher / STEP 7 Professional V11 (TIA Portal) or higher
identification & maintenance function	
<ul style="list-style-type: none"> <li>I&amp;M0 - device-specific information</li> <li>I&amp;M1 - higher level designation/location designation</li> </ul>	Yes Yes
product function / is supported / identification link	Yes; acc. to IEC 61406-1:2022
<b>product functions / diagnostics</b>	
product function / web-based diagnostics	Yes
<b>product functions / switch</b>	
product feature / switch	Yes
product function	
<ul style="list-style-type: none"> <li>switch-managed</li> <li>with IRT / PROFINET IO switch</li> <li>configuration with STEP 7</li> </ul>	No Yes Yes
<b>product functions / redundancy</b>	
product function	
<ul style="list-style-type: none"> <li>ring redundancy</li> <li>redundancy manager</li> </ul>	Yes No
protocol / is supported / Media Redundancy Protocol (MRP)	Yes
<b>product functions / security</b>	
product function	
<ul style="list-style-type: none"> <li>password protection for Web applications</li> <li>ACL - IP-based</li> <li>ACL - IP-based for PLC/routing</li> <li>switch-off of non-required services</li> <li>blocking of communication via physical ports</li> <li>log file for unauthorized access</li> </ul>	No Yes No Yes Yes No
<b>product functions / time</b>	
product function / SICLOCK support	Yes
product function / pass on time synchronization	Yes
protocol / is supported	
<ul style="list-style-type: none"> <li>NTP</li> </ul>	Yes
<b>standards, specifications, approvals</b>	
reference code	
<ul style="list-style-type: none"> <li>according to IEC 81346-2:2019</li> </ul>	KEC
<b>standards, specifications, approvals / Environmental Product Declaration</b>	
global warming potential [CO2 eq]	
<ul style="list-style-type: none"> <li>total</li> <li>during manufacturing</li> <li>during operation</li> <li>after end of life</li> </ul>	77.4 kg 26.4 kg 50.46 kg 0.54 kg
<b>further information / internet links</b>	
internet link	
<ul style="list-style-type: none"> <li>to website: Selection guide for cables and connectors</li> <li>to web page: selection aid TIA Selection Tool</li> <li>to website: Industrial communication</li> <li>to web page: SiePortal</li> <li>to website: Image database</li> <li>to website: CAx-Download-Manager</li> <li>to website: Industry Online Support</li> </ul>	<a href="https://support.industry.siemens.com/cs/ww/en/view/109766358">https://support.industry.siemens.com/cs/ww/en/view/109766358</a> <a href="https://www.siemens.com/tstcloud">https://www.siemens.com/tstcloud</a> <a href="https://www.siemens.com/simatic-net">https://www.siemens.com/simatic-net</a> <a href="https://sieportal.siemens.com/">https://sieportal.siemens.com/</a> <a href="https://www.automation.siemens.com/bilddb">https://www.automation.siemens.com/bilddb</a> <a href="https://siemens.com/cax">https://siemens.com/cax</a> <a href="https://support.industry.siemens.com">https://support.industry.siemens.com</a>
<b>security information</b>	
security information	Siemens provides products and solutions with industrial cybersecurity functions that support the secure operation of plants, systems, machines and networks. In order to protect plants, systems, machines and networks against cyber threats, it is necessary to implement – and continuously maintain – a holistic, state-of-the-art industrial cybersecurity concept. Siemens' products and solutions constitute one element of such a concept. Customers are responsible for preventing unauthorized access to their plants, systems, machines and networks. Such systems, machines and components should only be connected to an enterprise network or the internet if and to the extent such a connection is necessary and only when appropriate security measures (e.g. firewalls and/or network segmentation) are in place. For additional information on industrial cybersecurity measures that may be implemented, please visit <a href="http://www.siemens.com/cybersecurity-industry">www.siemens.com/cybersecurity-industry</a> . Siemens' products and solutions

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Approvals / Certificates

General Product Approval



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General Product Approval

EMV

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