

product type designation



SIPLUS NET CP 1543-1

SIPLUS NET CP 1543-1 based on 6GK7543-1AX00-0XE0 with conformal coating, -40...+70 °C, communications processor for connecting SIMATIC S7-1500 to Industrial Ethernet: TCP/IP, ISO, UDP, S7 communication, IP broadcast/ multicast, security (hardware identification, IP/MAC access list, firewall), diagnostics SNMPV1/V3, DHCP, FTP client/ server, email, IPv4/IPv6, data storage on SD Card of the CPU, time-of-day synchronization via NTP, access to the

transfer rate	
transfer rate	
• at the 1st interface	10 ... 1000 Mbit/s
interfaces	
number of interfaces / according to Industrial Ethernet	1
number of electrical connections	
• at the 1st interface / according to Industrial Ethernet	1
type of electrical connection	
• at the 1st interface / according to Industrial Ethernet	RJ45 port
supply voltage, current consumption, power loss	
type of voltage / of the supply voltage	DC
supply voltage / 1 / from backplane bus	15 V
relative symmetrical tolerance / at DC	
• at 15 V	3 %
consumed current	
• from backplane bus / at DC / at 15 V / typical	0.35 A
power loss [W]	5.3 W
ambient conditions	
ambient temperature	
• for vertical installation / during operation	-40 ... +40 °C
• for horizontally arranged busbars / during operation	-40 ... +70 °C
• during storage	-40 ... +70 °C
• during transport	-40 ... +70 °C
installation altitude / at height above sea level / maximum	5000 m
ambient condition / relating to ambient temperature - air pressure - installation altitude	Tmin ... Tmax at 1 140 hPa ... 795 hPa (-1 000 m ... +2 000 m) // Tmin ... (Tmax - 10 K) at 795 hPa ... 658 hPa (+2 000 m ... +3 500 m) // Tmin ... (Tmax - 20 K) at 658 hPa ... 540 hPa (+3 500 m ... +5 000 m)
relative humidity	
• with condensation / according to IEC 60068-2-38 / maximum	100 %; RH including condensation/frost (no commissioning when condensation is present), horizontal installation
chemical resistance / to commercially available cooling lubricants	Yes; incl. airborne diesel and oil droplets
resistance to biologically active substances	
• conformity according to EN 60721-3-3	Yes; Class 3B2 mold and fungal spores (excluding fauna), Class 3B3 on request
• conformity according to EN 60721-3-6	Yes; Class 6B2 mold, fungal and dry rot spores (excluding fauna)
resistance to chemically active substances	
• conformity according to EN 60721-3-3	Yes; Class 3C4 (RH < 75 %) incl. salt spray in accordance with EN 60068-2-52 (Severity 3). The supplied plug covers must remain in place on the unused interfaces during operation.
• conformity according to EN 60721-3-6	Yes

resistance to mechanically active substances	
conformity according to EN 60721-3-3	Yes; Class 3S4 incl. sand, dust. The supplied plug covers must remain in place over the unused interfaces during operation.
conformity according to EN 60721-3-6	Yes; Class 6S3 incl. sand, dust. The supplied plug covers must remain in place over the unused interfaces during operation.
coating / for equipped printed circuit board / according to EN 61086	Yes; Class 2 for high availability
type of coating / protection against pollution according to EN 60664-3	Yes; Protection of the type 1
type of test / of the coating / according to MIL-I-46058C	Yes; Coating discoloration during service life possible
product conformity / of the coating / Qualification and Performance of Electrical Insulating Compound for Printed Board Assemblies according to IPC-CC-830A	Yes; Conformal coating, class A
protection class IP	IP20
design, dimensions and weights	
module format	Compact module S7-1500 single width
width	35 mm
height	142 mm
depth	129 mm
net weight	0.35 kg
fastening method	
S7-1500 rail mounting	Yes
product features, product functions, product components / general	
number of units	
per CPU / maximum	8
note	depending on CPU type
performance data / open communication	
number of possible connections / for open communication	
by means of T blocks / maximum	118; depending on the system upper limit
data volume	
as user data per ISO on TCP connection / for open communication / by means of T blocks / maximum	65536 byte
number of Multicast stations	118
performance data / S7 communication	
number of possible connections / for S7 communication	
maximum	118; depending on the system upper limit
performance data / multi-protocol mode	
number of active connections / with multi-protocol mode	118
performance data / IT functions	
number of possible connections	
as client / by means of FTP / maximum	32
as server / by means of FTP / maximum	16
number of possible connections	
as server / by means of HTTP / maximum	4
as email client / maximum	1
data volume / as user data for email / maximum	64 Kibyte
performance data / telecontrol	
protocol / is supported	
TCP/IP	Yes
product functions / management, configuration, engineering	
product function / MIB support	Yes
protocol / is supported	
SNMP v1	Yes
DCP	Yes
LLDP	No
configuration software	
required	STEP 7 Professional V14 (TIA Portal) or higher
identification & maintenance function	
I&M0 - device-specific information	Yes
I&M1 - higher level designation/location designation	Yes
product functions / diagnostics	
product function / web-based diagnostics	Yes; via S7-1500 CPU

product functions / routing	
service / routing / note	IP routing up to 1 Mbps
product function	
• static IP routing	Yes
• static IP routing IPv6	No
• dynamic IP routing	No
• dynamic IP routing IPv6	No
protocol / is supported	
• RIP v1	No
• RIPv2	No
• RIPnG for IPv6	No
• OSPFv2	No
• OSPFv3 for IPv6	No
• VRRP	No
• VRRP for IPv6	No
• BGP	No
• PPP	No
• PPoE via DSL	No
product functions / security	
firewall version	stateful inspection
product function / with VPN connection	IPSec
type of encryption algorithms / with VPN connection	AES-256, AES-192, AES-128, 3DES-168, DES-56
type of authentication procedure / with VPN connection	Preshared key (PSK), X.509v3 certificates
type of hashing algorithms / with VPN connection	MD5, SHA-1
number of possible connections / with VPN connection	16
product function	
• password protection for Web applications	No
• ACL - IP-based	No
• ACL - IP-based for PLC/routing	No
• switch-off of non-required services	Yes
• blocking of communication via physical ports	No
• log file for unauthorized access	Yes
product functions / time	
product function / SICLOCK support	Yes
product function / pass on time synchronization	Yes
protocol / is supported	
• NTP	Yes
standards, specifications, approvals	
reference code	
• according to IEC 81346-2:2019	KEC
further information / internet links	
internet link	
• to web page: selection aid TIA Selection Tool	https://www.siemens.com/tstcloud
• to website: Industrial communication	https://www.siemens.com/simatic-net
• to web page: SiePortal	https://sieportal.siemens.com/
• to website: Image database	https://www.automation.siemens.com/bilddb
• to website: CAX-Download-Manager	https://www.siemens.com/cax
• to website: Industry Online Support	https://support.industry.siemens.com
security information	
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Approvals / Certificates

For use in hazard-ous locations	Environment
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last modified:

8/22/2024