



SCALANCE XC224 manageable Layer 2 IE switch; IEC 62443-4-2 certified; 24x 10/100 Mbit/s RJ45 ports; 1x console port, diagnostics LED; redundant power supply; temperature range -40 °C to +70 °C; assembly: DIN rail/S7 mounting rail/wall Office redundancy functions features (RSTP, VLAN,...); PROFINET IO device Ethernet/IP-compliant, C-plug slot;

product type designation	
product brand name	SCALANCE
product type designation	XC224
transfer rate	
transfer rate	10 Mbit/s, 100 Mbit/s
interfaces / for communication / integrated	
number of electrical connections	
• for network components or terminal equipment	24; RJ45
number of 10/100 Mbit/s RJ45 ports	
• with securing collar	24
interfaces / other	
number of electrical connections	
• for operator console	1
• for signaling contact	1
• for power supply	1
type of electrical connection	
• for operator console	RJ11
• for signaling contact	2-pole terminal block
• for power supply	4-pole terminal block
design of the removable storage	
• C-PLUG	Yes
operating voltage / of the signaling contacts	
• at DC / rated value	24 V
operational current / of the signaling contacts	
• at DC / maximum	0.1 A
supply voltage, current consumption, power loss	
product component / connection for redundant voltage supply	Yes
type of voltage / 1 / of the supply voltage	DC
• supply voltage / 1 / rated value	24 V
• power loss [W] / 1 / rated value	9 W
• consumed current / 1 / at rated supply voltage / maximum	0.375 A
• supply voltage / 1 / rated value	9.6 ... 31.2 V
• consumed current / 1 / maximum	0.75 A
• type of electrical connection / 1 / for power supply	4-pole terminal block
• product component / 1 / fusing at power supply input	Yes
• fuse protection type / 1 / at input for supply voltage	2.5 A/ 125 V
ambient conditions	
ambient temperature	
• during operation	-40 ... +70 °C
• during storage	-40 ... +85 °C

• during transport	-40 ... +85 °C
relative humidity	
• at 25 °C / without condensation / during operation / maximum	95 %
protection class IP	IP20
design, dimensions and weights	
width	120 mm
height	147 mm
depth	125 mm
net weight	0.88 kg
material / of the enclosure	Polycarbonate (PC-GF10) / pressure die cast aluminum
fastening method	
• 35 mm top hat DIN rail mounting	Yes
• wall mounting	Yes
• S7-300 rail mounting	Yes
• S7-1500 rail mounting	Yes
product features, product functions, product components / general	
cascading in the case of a redundant ring / at reconfiguration time of <1~0.3~s	50
cascading in cases of star topology	any (depending only on signal propagation time)
product function	
• QoS according to DSCP	Yes
product feature	
• Cut Through switching method	No
• Store & Forward switching method	Yes
product functions / management, configuration, engineering	
product function	
• CLI	Yes
• web-based management	Yes
• MIB support	Yes
• TRAPs via email	Yes
• configuration with STEP 7	Yes
• RMON	Yes
• SMTP server	No
• port mirroring	Yes
• multiport mirroring	Yes
• CoS	Yes
• PROFINET IO diagnosis	Yes
• switch-managed	Yes
PROFINET conformity class	B
telegram length / for Ethernet / maximum	1632 byte
protocol / is supported	
• Telnet	Yes
• HTTP	Yes
• HTTPS	Yes
• TFTP	Yes
• SFTP	Yes
• BOOTP	No
• GMRP	Yes
• DCP	Yes
• LLDP	Yes
• EtherNet/IP	Yes
• SNMP v1	Yes
• SNMP v2	Yes
• SNMP v3	Yes
• IGMP (snooping/querier)	Yes
identification & maintenance function	
• I&M0 - device-specific information	Yes
• I&M1 - higher level designation/location designation	Yes
product functions / diagnostics	
product function	

• port diagnostics	Yes
• statistics Packet Size	Yes
• statistics packet type	Yes
• error statistics	Yes
• SysLog	Yes

product functions / VLAN

product function	
• VLAN - port based	Yes
• VLAN - protocol-based	No
• VLAN - IP-based	No
number of VLANs / maximum	257
number of VLANs - dynamic / maximum	257
number of VLANs / at ring redundancy (HRP; MRP; standby link)	257

product functions / DHCP

product function	
• DHCP server	Yes
• DHCP client	Yes
• DHCP Option 82	Yes
• DHCP Option 66	Yes
• DHCP Option 67	Yes

product functions / redundancy

protocol / is supported / Media Redundancy Protocol (MRP)	Yes
product function	
• media redundancy protocol (MRP) with redundancy manager	Yes
• Media Redundancy Protocol Interconnection (MRP-I)	Yes
• of the PROFINET IO device / is supported / H-Sync forwarding	Yes
• of the PROFINET IO device / is supported / PROFINET system redundancy	Yes
• ring redundancy	Yes
• high speed redundancy protocol (HRP) with redundancy manager	Yes
• high speed redundancy protocol (HRP) with standby redundancy	Yes
• redundancy procedure STP	Yes
• redundancy procedure RSTP	Yes
• redundancy procedure RSTP+	Yes
• redundancy procedure MSTP	Yes
• Parallel Redundancy Protocol (PRP)/operation in the PRP-network	Yes
• Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)	No
• passive listening	Yes
protocol / is supported	
• LACP	Yes

system modification during operation

product function / configuration in RUN via CiR/H-CiR	Yes
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product functions / security

product function	
• IEEE 802.1x (radius)	Yes
• RADIUS client	Yes
• broadcast/multicast/unicast limiter	Yes
• broadcast blocking	Yes
protocol / is supported	
• SSH	Yes
• SSL	Yes

product functions / time

product function	
• SICLOCK support	Yes
• NTP-client	Yes
• SNTP client	Yes

protocol / is supported	
• NTP	Yes
• SNTP	Yes
standards, specifications, approvals	
certificate of suitability	
• CE marking	Yes
• Regulatory Compliance Mark (RCM)	Yes
product conformity / according to EMC-guideline	2014/30/EU
standard	
• for EMC interference emission	EN 61000-6-4, EN 50121-4
• for immunity to EMC	EN 61000-6-2, EN 50121-4
• for safety / from CSA and UL	UL 60950-1 E115352
standards, specifications, approvals / hazardous environments	
certificate of suitability	
• ATEX	Yes
• UKEX	Yes
• IECEx	Yes
• ULhazloc approval	Yes
• CCC / for hazardous zone according to GB standard	Yes
• FM registration	Yes
standards, specifications, approvals / other	
certificate of suitability	
• railway application in accordance with EN 50121-4	Yes
• RoHS conformity	Yes
resistance to air pollution / conformity according to ANSI/ISA-71.04	Yes
IT security for industrial automation systems / according to IEC 62443-4-2:2019	Yes
standards, specifications, approvals / marine classification	
Marine classification association	
• American Bureau of Shipping Europe Ltd. (ABS)	Yes
• French marine classification society (BV)	Yes
• DNV GL	Yes
• Korean Register of Shipping (KRS)	Yes
• Lloyds Register of Shipping (LRS)	Yes
• Nippon Kaiji Kyokai (NK)	Yes
• Polski Rejestr Statkow (PRS)	Yes
• Royal Institution of Naval Architects (RINA)	Yes
standards, specifications, approvals / Environmental Product Declaration	
Environmental Product Declaration	Yes
Global Warming Potential [CO2 eq]	
• total	441.1 kg
• during manufacturing	47.67 kg
• during operation	392.82 kg
• after end of life	0.57 kg
product functions / general	
MTBF	41 a
reference code	
• according to IEC 81346-2	KF
• according to IEC 81346-2:2019	KFE
Warranty period	5 a
product function / is supported / identification link	Yes; acc. to IEC 61406-1:2022
further information / internet links	
internet link	
• to website: Selection guide for cables and connectors	https://support.industry.siemens.com/cs/ww/en/view/109766358
• 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

security information

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General Product Approval

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