## **SIEMENS**

## Data sheet

## 6GK5005-0BA00-1AB2

SCALANCE XB005 unmanaged Industrial Ethernet Switch for 10/100 Mbit/s; for setting up small star and line topologies; LED diagnostics, IP20, 24 V AC/DC power supply, with 5x 10/100 Mbit/s twisted pair ports with RJ45 sockets; Manual available as a download



Product type designation	SCALANCE XB005	
Transmission rate		
Transfer rate	10 Mbit/s, 100 Mbit/s	
Interfaces / for communication / integrated		
Number of electrical connections		
<ul> <li>for network components or terminal equipment</li> </ul>	5; RJ45	
Number of 100 Mbit/s SC ports		
• for multimode	0	
Interfaces / others		
Number of electrical connections		
• for power supply	1	
Type of electrical connection		
• for power supply	3-pole terminal block	
Supply voltage, current consumption, power loss		
Type of voltage / of the supply voltage	AC/DC	
Supply voltage		
• external	24 V	

• external / maximum     28 8 V       • at AC     24 V       Product component / fusing at power supply input     0.6 A / 60 V       Consumed current / maximum     0.07 A       Power loss [W]     • at DC / at 24 V       • at DC / at 24 V     1.68 W       Permitted ambient emperature     -10 +60 °C       • during operation     -10 +60 °C       • during storage     -40 +80 °C       • during transport     95 %       • operation / maximum     00 mm       • Deptin<	• external / minimum	19.2 V	
• at AC     24 V       Product component / fusing at power supply input     Yes       Fuse protection type / at input for supply voltage     0.6 A / 60 V       Consumed current / maximum     0.07 A       Power loss (W)     • at DC / at 24 V       • at DC / at 24 V     1.68 W       Permitted ambient conditions     Ambient temperature       • during operation     -10 +60 °C       • during storage     -40 +80 °C       • during transport     -40 +80 °C       • at 25 °C / without condensation / during operation / maximum     95 %       • paratelin / maximum     Box       Working type     -       • at 25 °C / without condensation / during     95 %       • at 25 °C / without condensation / during     95 %       • at 25 °C / without condensation / during     95 %       • at 25 °C / without condensation / during     95 %       • at 25 °C / without condensation / during     95 %       • at 25 °C / without condensation / during     95 %       • at 25 °C / without condensation / during     95 %       Design <t< td=""><td></td><td></td></t<>			
Product component / fusing at power supply input     Yes       Fuse protection type / at input for supply voltage     0.6 A / 60 V       Consumed current / maximum     0.07 A       Power loss [V]     • at DC / at 24 V       • at DC / at 24 V     1.68 W       Permitted ambient conditions			
Fuse protection type / at input for supply voltage     0.6 A / 60 V       Consumed current / maximum     0.07 A       Power loss [W]			
Consumed current / maximum     0.07 A       Power loss [M]     • at DC / at 24 V       Parmitted ambient conditions       Ambient temperature       • during storage     -10 +60 °C       • during storage     -40 +60 °C       • during transport     -40 +60 °C       • etal 25 °C / without condensation / during operation / maximum     95 %       Protection class IP     IP20       Design     Box       Width     45 mm       Height     100 mm       Design     0.165 kg       Mounting type     Yes       • S3 mm DIN rail mounting     Yes       • Wail mounting     Yes       • Wail mounting     Yes       • Product function / management, configuration       • multiport mirroring     No       • Coas     Yes			
Power loss [W]        i.68 W           Permitted ambient conditions         I.68 W           Ambient temperature       ·during operation       ·during operation       ·during storage       ·during storage       ·during transport       ·during transport			
• at DC / at 24 V       1.68 W         Permitted ambient conditions         Ambient temperature         • during operation       -10 +60 °C         • during storage       -40 +80 °C         • during transport       -40 +80 °C         • Relative humidity       • 95 %         • operation / maximum       95 %         Protection class IP       IP20         Design       Box         Width       45 mm         Height       100 mm         Depth       87 mm         Net weight       0.165 kg         Mounting type       • 55 ~1500 rail mounting         • SS7-1500 rail mounting       Yes         • wall mounting       Yes         • No       Yes         Product function       No         • CoS       Yes         Product function / management, configuration       No         • CoS       Yes         Product function / switch-managed       No         Product function / switch-managed       No         Product function / Peratelle Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Paratelle Redundancy Protocol (PRP)/operation in the PRP-network       No         • Paratelle Redundancy Protocol		-	
Permitted ambient conditions         Ambient temperature         • during operation       -10 +60 °C         • during storage       -40 +80 °C         • during transport       -40 +80 °C         Relative humidity       -40 +80 °C         Protection class IP       IP20         Design       Box         Width       45 mm         Height       100 mm         Depth       87 mm         Net weight       0.165 kg         Mounting type       -35 mm DIN rail mounting         • S7-1500 rail mounting       Yes         • sold function       /maligned         • cols       Yes         • cols       Yes         • cols       Yes         • cols       Yes         • Porduct function       /maligned         • cols       Yes         • Cols       Yes         • Porduct function / management, configuration       No         • Product function / switch-managed       No         Product function / switch-managed       No		1.68 W	
Ambient temperature       -10 +60 °C         • during storage       -40 +80 °C         • during transport       -40 +80 °C         Relative humidity       -40 +80 °C         • at 25 °C / without condensation / during operation / maximum       95 %         Protection class IP       IP20         Design, dimensions and weight       Box         Obesign       Box         Width       45 mm         Height       00 mm         Depth       87 mm         Net weight       0.165 kg         Mounting type       •         • 35 mm DIN rail mounting       Yes         • wall mounting       Yes         • s7-1500 rail mounting       No         Product functions / management, configuration       No         Product function / switch-managed       Yes         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/operation in the TRP-network       No         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       No         • Parallel			
• during operation       -10 +60 °C         • during storage       -40 +80 °C         • during transport       -40 +80 °C         • at 25 °C / without condensation / during operation / maximum       95 %         Protection class IP       IP20         Design       Box         With       45 mm         Height       100 mm         Depth       87 mm         Net weight       0.165 kg         Mounting type       -35 mm DIN rail mounting         • s3 mm DIN rail mounting       Yes         • s7-1500 rail mounting       Yes         • cos       Yes         Product function       No         Product function       No         • multiport mirroring       No         • cos       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product function / switch-managed       No         Product function / switch-managed       Yes         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/operation in the the PR-network       No         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       No			
- during storage     -40 +80 °C       - during transport     -40 +80 °C       Relative humidity     -40 +80 °C       • at 25 °C / without condensation / during operation / maximum     95 %       Protection class IP     IIP20       Design, dimensions and weight     Box       Design, dimensions and weight     80 ×       Width     45 mm       Height     100 mm       Depth     87 mm       Net weight     0.165 kg       Mounting type     -       • 35 mm DIN rail mounting     Yes       • wall mounting     Yes       • soft functions / management, configuration     No       Product function     No       Product function / switch-managed     Yes       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network     Yes       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network     No       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network     No       • Parallel Redundancy Protocol (PRP)/oper			
during transport     -40 +80 °C       Relative humidity     95 %       • at 25 °C / without condensation / during operation / maximum     95 %       Protection class IP     IP20       Design, dimensions and weight     0       Design, dimensions and weight     00 mm       Design, dimensions and weight     00 mm       Depth     87 mm       Height     0.165 kg       Mounting type     37 mm       • st weight     0.165 kg       Mounting type     Yes       • st mounting     Yes       • so S ~1500 rail mounting     No       Product functions / management, configuration       Product function / minoring     No       • cos     Yes       PROFINET conformity class     A       Product function / switch-managed     No       Product function     No       Product function     Yes       Product function     No       Product function     Yes       Product function     No       Product function     No <tr< td=""><td></td><td></td></tr<>			
Relative humidity     95 %       e at 25 °C / without condensation / during operation / maximum     95 %       Protection class IP     IP20       Design, dimensions and weight     Box       Design, dimensions and weight     000 mm       Design     Box       Width     45 mm       Height     100 mm       Depth     87 mm       Net weight     0.165 kg       Mounting type     -       • 35 mm DIN rail mounting     Yes       • soft functions / management, configuration     No       Product functions / management, configuration     Product function / switch-managed       Product function / switch-managed     No       Pratilel Redundancy Protocol (PRP)/operation in the PRP-network     No </td <td></td> <td></td>			
• at 25 °C / without condensation / during operation / maximum     95 %       Protection class IP     IP20       Design, dimensions and weight     Box       Width     45 mm       Height     100 mm       Depth     87 mm       Net weight     0.165 kg       Mounting type     -       • 35 mm DIN rail mounting     Yes       • wall mounting     Yes       • wall mounting     Yes       • so 7-1500 rail mounting     No       Product functions / management, configuration     No       • multiport mirroring     Yes       • CoS     Yes       PROFINET conformity class     A       Product function / switch-managed     No       Product function / switch-managed     No       Product function     Yes       • Product function     No       Pratallel Redundancy Protocol (PRP)/operation in the PRP-network     No		-40 +80 °C	
operation / maximum     IP20       Protection class IP     IP20       Design, dimensions and weight     Box       Uidth     45 mm       Height     100 mm       Depth     87 mm       Net weight     0.165 kg       Mouning type     35 mm DIN rail mounting       • wall mounting     Yes       • wall mounting     Yes       • roduct functions / management, configuration       Product function     No       • coS     Yes       PROFINET conformity class     A       Product function / switch-managed     No       Product functions / Redundancy     Yes       Product function / switch-managed     No       Product functions / Redundancy     Yes       Product function / switch-managed     No       Product function / Redundancy Protocol (PRP)/operation in the PRP-network     Yes       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network Access (RNA)     No       Standards, specifications, approvals     Standards, specifications, approvals	-		
Protection class IP       IP20         Design, dimensions and weight       Box         Design       Box         Width       45 mm         Height       100 mm         Depth       87 mm         Net weight       0.165 kg         Mounting type       -         • 35 mm DIN rail mounting       Yes         • wall mounting       Yes         • wall mounting       Yes         • S7-1500 rail mounting       No         Product functions / management, configuration       Product function         • multiport mirroring       No         • CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product function / Redundancy       Yes         Product function       No         Product function / Redundancy       Yes         Product function       No         Parallel Redundancy Protocol (PRP)/operation in the PRP-network       No         • Parallel Redundancy Protocol (PRA)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals	_	95 %	
Design. dimensions and weight         Design       Box         Width       45 mm         Height       100 mm         Depth       87 mm         Net weight       0.165 kg         Mounting type       -         • 35 mm DIN rail mounting       Yes         • wall mounting       Yes         • wall mounting       Yes         • sort functions / management, configuration         Product function       No         • cos       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product function / switch-managed       No         Product function       No         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       No         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       No         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       Standards, specifications, approvals		1700	
Design     Box       Width     45 mm       Height     100 mm       Depth     87 mm       Net weight     0.165 kg       Mounting type     -       • 35 mm DIN rail mounting     Yes       • wall mounting     Yes       • wall mounting     Yes       • s7-1500 rail mounting     No       Product functions / management, configuration     -       Product function     No       • CoS     Yes       PROFINET conformity class     A       Product function / switch-managed     No       Product function     -       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network     Yes       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network Access (RNA)     No       Standards, specifications, approvals     Standards, specifications, approvals		IP20	
Width     45 mm       Height     100 mm       Depth     87 mm       Net weight     0.165 kg       Mounting type     .       • 35 mm DIN rail mounting     Yes       • wall mounting     Yes       • wall mounting     Yes       • wall mounting     No       Product functions / management, configuration     Product function       • multiport mirroring     No       • coS     Yes       PROFINET conformity class     A       Product function / switch-managed     No       Product function     No       Product function     Yes       Product function / switch-managed     No       Product function     No       Product function     No       Parallel Redundancy Protocol (PRP)/operation in the PRP-network     Yes       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network Access (RNA)     No       Standards, specifications, approvals     Standards, specifications, approvals			
Height100 mmDepth87 mmNet weight0.165 kgMounting type	Design	Box	
Depth       87 mm         Net weight       0.165 kg         Mounting type       .         • 35 mm DIN rail mounting       Yes         • wall mounting       Yes         • wall mounting       Yes         • wall mounting       Yes         • S7-1500 rail mounting       No         Product functions / management, configuration       Product function         • multiport mirroring       No         • CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product function       Ves         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals	Width	45 mm	
Net weight       0.165 kg         Mounting type	Height	100 mm	
Mounting type       Yes         • 35 mm DIN rail mounting       Yes         • wall mounting       Yes         • S7-1500 rail mounting       No         Product functions / management, configuration       No         Product function       No         • multiport mirroring       No         • CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product functions / Redundancy       Yes         Product function       No         Product function       Yes         Product function       No         Product function       No         Product function       No         Product function       Yes         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals	Depth	87 mm	
• 35 mm DIN rail mounting       Yes         • wall mounting       Yes         • S7-1500 rail mounting       No         Product functions / management, configuration       Product function         • multiport mirroring       No         • CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Standards, specifications, approvals       Yes		0.165 kg	
• wall mounting     • wall mounting     • wall mounting     • wall mounting     • S7-1500 rail mounting     Product functions / management, configuration     Product function     • multiport mirroring     • CoS     Yes     PROFINET conformity class     A     Product function / switch-managed     No     Product function / switch-managed     No     Product functions / Redundancy     Product function     • Parallel Redundancy Protocol (PRP)/operation     in the PRP-network     • Parallel Redundancy Protocol     (PRP)/Redundant Network Access (RNA)     Standards, specifications, approvals	Mounting type		
• S7-1500 rail mounting       No         Product functions / management, configuration       Product function         • multiport mirroring       No         • CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product function       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/operation (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals	<ul> <li>35 mm DIN rail mounting</li> </ul>		
Product functions / management, configuration       Product function       • multiport mirroring     No       • CoS     Yes       PROFINET conformity class     A       Product function / switch-managed     No       Product function / switch-managed     No       Product functions / Redundancy     Yes       Product function     Yes       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network     Yes       • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)     No       Standards, specifications, approvals     Standards, specifications, approvals	<ul> <li>wall mounting</li> </ul>	Yes	
Product function       No         • multiport mirroring       No         • CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product functions / Redundancy       No         Product function       Product function         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals	<ul> <li>S7-1500 rail mounting</li> </ul>	No	
Product function       No         • multiport mirroring       No         • CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product functions / Redundancy       No         Product function       Product function         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals	Product functions / management. configuration		
• CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product functions / Redundancy       Product function         Product function       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, approvals			
• CoS       Yes         PROFINET conformity class       A         Product function / switch-managed       No         Product functions / Redundancy       Product function         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, approvals	multiport mirroring	No	
PROFINET conformity class       A         Product function / switch-managed       No         Product functions / Redundancy       Product function         Product function       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, approvals		Yes	
Product function / switch-managed       No         Product functions / Redundancy       Product function         Product function       Yes         • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals		A	
Product function       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals			
Product function       • Parallel Redundancy Protocol (PRP)/operation in the PRP-network       Yes         • Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)       No         Standards, specifications, approvals       Standards, specifications, approvals			
Parallel Redundancy Protocol (PRP)/operation in the PRP-network     Parallel Redundancy Protocol (PRP)/Redundant Network Access (RNA)     Standards, specifications, approvals			
(PRP)/Redundant Network Access (RNA) Standards, specifications, approvals	<ul> <li>Parallel Redundancy Protocol (PRP)/operation</li> </ul>	Yes	
	-	No	
	Standards, specifications, approvals		

● for FM	FM3611: Class 1, Divison 2, Group A, B, C, D / T4, CL.1, Zone 2,
	GP. IIC, T4
<ul> <li>for hazardous zone</li> </ul>	EN 60079-0:2009, EN60079-15:2010, II 3 G Ex nA IIC T4 Gc,
	KEMA 07ATEX0145 X
<ul> <li>for safety / from CSA and UL</li> </ul>	UL 60950-1, CSA C22.2 No. 60950-1
<ul> <li>for emitted interference</li> </ul>	EN 61000-6-4 (Class A)
<ul> <li>for interference immunity</li> </ul>	EN 61000-6-2

	Standards, specifications, approvals / CE		
Certificate of suitability / CE marking Yes		Yes	

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Standards, specifications, approvals / miscellaneous			
Certificate of suitability	EN 61000-6-2, EN 61000-6-4		
• C-Tick	Yes		
<ul> <li>KC approval</li> </ul>	Yes		
Standards, specifications, approvals / product conformity			
MTBF	241 у		
Further Information / Internet Links			
Internet-Link			
<ul> <li>to website: Selector SIMATIC NET SELECTION TOOL</li> </ul>	http://www.siemens.com/snst		
• to website: Industrial communication	http://www.siemens.com/simatic-net		
• to website: Industry Mall	https://mall.industry.siemens.com		
<ul> <li>to website: Information and Download Center</li> </ul>	http://www.siemens.com/industry/infocenter		
<ul> <li>to website: Image database</li> </ul>	http://automation.siemens.com/bilddb		
<ul> <li>to website: CAx Download Manager</li> </ul>	http://www.siemens.com/cax		
<ul> <li>to website: Industry Online Support</li> </ul>	https://support.industry.siemens.com		

Security information

Security information

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