

Overview



- Digital inputs and outputs as supplement to the integral I/O of the CPUs
- For flexible adaptation of the controller to the corresponding task
- For subsequent expansion of the system with additional inputs and outputs
- From +60 °C to +70 °C, max. 50% of the inputs can be controlled simultaneously

Note:

SIPLUS extreme products are based on Siemens Industry standard products. The contents listed here were taken from the respective standard products. SIPLUS extreme-specific information was added.

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Technical specifications

The technical data correspond to those of the based-on modules apart from the values listed in the table.

	6AG1223-1BH32-2XB0 SM 1223 DI 8x24 VDC, DQ 8x24 VDC	6AG1223-1BH32-4XB0 SM 1223 DI 8x24 VDC, DQ 8x24 VDC	6AG1223-1PH32-2XB0 SM 1223 DI 8x24 VDC, DQ 8xRelay	6AG1223-1PH32-4XB0 SM 1223 DI 8x24 VDC, DQ 8xRelay
Based on	6ES7223-1BH32-0XB0	6ES7223-1BH32-0XB0	6ES7223-1PH32-0XB0	6ES7223-1PH32-0XB0
Ambient conditions				
Extended ambient conditions				
- Relative to ambient temperature-atmospheric pressure-installation altitude - at cold restart, minimum - Relative humidity - with condensation, maximum - With condensation, tested in accordance with IEC 60068-2-38, maximum - Resistance - to biologically active substances/conformity with EN 60721-3-3 - to chemically active substances/conformity with EN 60721-3-3 - to mechanically active substances/conformity with EN 60721-3-3	Tmin ... Tmax at 1080 hPa ... 795 hPa (-1000 m ... +2000 m) // Tmin ... (Tmax - 10K) at 795 hPa ... 658 hPa (+2000 m ... +3500 m) // Tmin ... (Tmax - 20K) at 658 hPa ... 540 hPa (+3500 m ... +5000 m)			
	-25 °C			
	100 %; RH incl. condensation/frost (no commissioning under condensation conditions)			
		100 %; RH incl. condensation/frost (no commissioning under condensation conditions)		
	Yes; Class 3B2 mold, fungus and dry rot spores (with the exception of fauna). The supplied connector covers must remain on the unused interfaces during operation!			
	Yes; Class 3C4 (RH < 75%) incl. salt spray according to EN 60068-2-52 (degree of severity 3). The supplied connector covers must remain on the unused interfaces during operation!			
	Yes; Class 3S4 incl. sand, dust. The supplied connector covers must remain on the unused interfaces during operation!			
Climatic and mechanical conditions for storage and transport				
Climatic conditions for storage and transport				
- Free fall - Drop height, max. (in packaging) - Temperature - Permissible temperature range	0.3 m; five times, in dispatch package			
	-40 °C to +70 °C			
Mechanical and climatic conditions during operation				
Climatic conditions in operation				
- Temperature - Min. - max. - Permissible temperature change	-40 °C; = Tmin; startup @ -25 °C 70 °C; = Tmax; Tmax > +60 °C number of simultaneously activated outputs 4, inputs 4 (no adjacent points) for horizontal mounting position 5°C to 55°C, 3°C / minute	-20 °C; = Tmin; startup @ 0 °C 60 °C; = Tmax	-40 °C; = Tmin; startup @ -25 °C 70 °C; = Tmax; Tmax > +60 °C number of simultaneously activated outputs 4, inputs 4 (no adjacent points) for horizontal mounting position	-20 °C; = Tmin; startup @ 0 °C 60 °C; = Tmax

SIMATIC S7-1200

SIPLUS digital modules

SIPLUS SM 1223 digital input/output modules

Technical specifications (continued)

	6AG1223-1PL32-2XB0 SM 1223 DI 16x24 VDC, DQ 16xRelay	6AG1223-1PL32-4XB0 SM 1223 DI 16x24 VDC, DQ 16xRelay	6AG1223-1BL32-2XB0 SM 1223 DI 16x24 VDC, DQ 16x24 VDC	6AG1223-1BL32-4XB0 SM 1223 DI 16x24 VDC, DQ 16x24 VDC
Based on	6ES7223-1PL32-0XB0	6ES7223-1PL32-0XB0	6ES7223-1BL32-0XB0	6ES7223-1BL32-0XB0
Ambient conditions Extended ambient conditions - Relative to ambient temperature-atmospheric pressure-installation altitude - Relative humidity - With condensation, tested in accordance with IEC 60068-2-38, maximum - Resistance - to biologically active substances/conformity with EN 60721-3-3 - to chemically active substances/conformity with EN 60721-3-3 - to mechanically active substances/conformity with EN 60721-3-3				
Tmin ... Tmax at 1080 hPa ... 795 hPa (-1000 m ... +2000 m) // Tmin ... (Tmax - 10K) at 795 hPa ... 658 hPa (+2000 m ... +3500 m) // Tmin ... (Tmax - 20K) at 658 hPa ... 540 hPa (+3500 m ... +5000 m)				
100 %; RH incl. condensation/frost (no commissioning under condensation conditions)				
Yes; Class 3B2 mold, fungus and dry rot spores (with the exception of fauna). The supplied connector covers must remain on the unused interfaces during operation!				
Yes; Class 3C4 (RH < 75%) incl. salt spray according to EN 60068-2-52 (degree of severity 3). The supplied connector covers must remain on the unused interfaces during operation!				
Yes; Class 3S4 incl. sand, dust. The supplied connector covers must remain on the unused interfaces during operation!				
Climatic and mechanical conditions for storage and transport Climatic conditions for storage and transport - Free fall - Drop height, max. (in packaging) - Temperature - Permissible temperature range				
0.3 m; five times, in dispatch package				
-40 °C to +70 °C				
Mechanical and climatic conditions during operation Climatic conditions in operation - Temperature - Min. - max.				
-40 °C; = Tmin; startup @ -25 °C 70 °C; = Tmax; Tmax > +60 °C number of simultaneously activated outputs 8, inputs 8 (no adjacent points) for horizontal mounting position				
-20 °C; = Tmin; startup @ 0 °C 60 °C; = Tmax				
-40 °C; = Tmin; startup @ -25 °C 70 °C; = Tmax; Tmax > +60 °C number of simultaneously activated outputs 8, inputs 8 (no adjacent points) for horizontal mounting position				
-20 °C; = Tmin; startup @ 0 °C 60 °C; = Tmax				

Ordering data

Article No.

Article No.

Digital input/output SIPLUS SM 1223 signal module

(Extended temperature range and medial exposure)

- 8 inputs, 24 V DC, IEC type 1 current sinking, 8 transistor outputs, 24 V DC, 0.5 A, 5 W
- Suitable for areas with extraordinary medial exposure (conformal coating)
 - 25 ... +70 °C, from +60 ... +70 °C number of simultaneously controllable inputs and outputs max. 50 %
- 16 inputs, 24 V DC, IEC type 1 current sinking, 16 transistor outputs, 24 V DC, 0.5 A, 5 W
- Suitable for areas with extraordinary medial exposure (conformal coating)
 - 25 ... +70 °C, from +60 ... +70 °C number of simultaneously controllable inputs and outputs max. 50 %

6AG1223-1BH32-4XB0

6AG1223-1BH32-2XB0

6AG1223-1BL32-4XB0

6AG1223-1BL32-2XB0

8 inputs, 24 V DC, IEC type 1 current sinking, 8 relay outputs, 5 ... 30 V DC / 5 ... 250 V AC, 2 A, 30 W DC / 200 W AC

- Suitable for areas with extraordinary medial exposure (conformal coating)
- 25 ... +70 °C, from +60 ... +70 °C number of simultaneously controllable inputs and outputs max. 50 %

16 inputs, 24 V DC, IEC type 1 current sinking, 16 relay outputs, 5 ... 30 V DC / 5 ... 250 V AC, 2 A, 30 W DC / 200 W AC

- Suitable for areas with extraordinary medial exposure (conformal coating)
- 25 ... +70 °C, from +60 ... +70 °C number of simultaneously controllable inputs and outputs max. 50 %

Accessories

6AG1223-1PH32-4XB0

6AG1223-1PH32-2XB0

6AG1223-1PL32-4XB0

6AG1223-1PL32-2XB0

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