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> PLC > Modular Controller SIMATIC S7 > S7-1200 > Signal modules

6ES7222-1BH30-0XB0 DIGITAL OUTPUT SM1222, 16 DO, 24V DC

Technical / CAx data

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### SIMATIC S7-1200, DIGITAL OUTPUT SM 1222, 16 DO, 24V DC, TRANSISTOR 0.5A

#### Supply voltages

##### Rated value

permissible range, lower limit (DC)	20.4 V
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permissible range, upper limit (DC)	28.8 V
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#### Current consumption

from backplane bus 5 V DC, max.	140 mA
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#### Power losses

Power loss, typ.	2.5 W
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#### Connection method

required front connector	Yes
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#### Digital inputs

Number of inputs	0
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#### Digital outputs

Number of digital outputs	16
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in groups of	1
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Short-circuit protection of the output	No; to be provided externally
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Limitation of inductive shutdown voltage to	typ. (L+) -48 V
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##### Switching capacity of the outputs

with resistive load, max.	0.5 A
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on lamp load, max.	5 W
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##### Output voltage

Rated value (DC)	24 V
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for signal "0" (DC), max.	0.1 V; with 10 kOhm load
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for signal "1", min.	20 VDC
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##### Output current

for signal "1" rated value	0.5 A
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for signal "0" residual current, max.	10 µA
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##### Output delay with resistive load

0 to "1", max.	50 µs
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1 to "0", max.	200 µs
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##### Aggregate current of outputs (per group)

horizontal installation

up to 50 °C, max.	8 A; Current per mass
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##### Cable length

Cable length, shielded, max.	500 m
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Cable length unshielded, max.	150 m
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#### Relay outputs

##### Switching capacity of contacts

with inductive load, max.	0.5 A
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on lamp load, max.	5 W
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with resistive load, max.	0.5 A
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<b>Interrupts/diagnostics/status information</b>	
<b>Alarms</b>	
<b>Alarms</b>	Yes
<b>Diagnostic alarm</b>	Yes
<b>Diagnoses</b>	
<b>Diagnostic functions</b>	Yes
<b>Diagnostics indication LED</b>	
	Yes
<b>for maintenance</b>	Yes
<b>Status indicator digital output (green)</b>	Yes
<b>Galvanic isolation</b>	
<b>Galvanic isolation digital outputs</b>	
<b>between the channels, in groups of</b>	1
<b>between the channels and the backplane bus</b>	500 VAC
<b>Climatic and mechanical conditions for storage and transport</b>	
<b>Climatic conditions for storage and transport</b>	
<b>Free fall</b>	
<b>Drop height, max. (in packaging)</b>	0.3 m
<b>Temperature</b>	
<b>Permissible temperature range</b>	-40 °C to +70 °C
<b>Air pressure acc. to IEC 60068-2-13</b>	
<b>Permissible air pressure</b>	1080 to 660 hPa
<b>Relative humidity</b>	
<b>Permissible range (without condensation) at 25 °C</b>	95%
<b>Mechanical and climatic conditions during operation</b>	
<b>Climatic conditions in operation</b>	
<b>Temperature</b>	
<b>Permissible temperature range</b>	0° C to 55° C horizontal mounting 0° C to 45° C vertical mounting 95% non-condensing humidity
<b>Degree of protection</b>	
<b>IP20</b>	Yes
<b>Standards, approvals, certificates</b>	
<b>CE mark</b>	Yes
<b>C-TICK</b>	Yes
<b>FM approval</b>	Yes
<b>Mechanics</b>	
<b>Plastic</b>	Yes
<b>Dimensions and weight</b>	
<b>Dimensions</b>	
<b>Width</b>	45 mm
<b>Height</b>	100 mm
<b>Depth</b>	75 mm
<b>Weight</b>	
<b>Weight, approx.</b>	220 g
<b>Status</b>	Jan 17, 2011

