



Figure similar

spare part SIMATIC S7-300, digital output SM 322, isolated, 8 DO (relay), 1x 40-pole, 24 V DC, 120-230 V AC, 5 A with RC filter overvoltage protection

Supply voltage	
Load voltage L+	
• Rated value (DC)	24 V
• permissible range, lower limit (DC)	24 V
• permissible range, upper limit (DC)	120 V
Load voltage L1	
• Rated value (AC)	230 V
Input current	
from supply voltage L+, max.	160 mA
from backplane bus 5 V DC, max.	100 mA
Power loss	
Power loss, typ.	3.5 W
Digital outputs	
Number of digital outputs	8; Relays
Short-circuit protection	No; to be provided externally
Controlling a digital input	Yes
Switching capacity of the outputs	
• on lamp load, max.	1 500 W; 230 V AC
• Low energy/fluorescent lamps with electronic control gear	10x 58 W
• Fluorescent tubes, conventionally compensated	1x 58 W
• Fluorescent tubes, uncompensated	10x 58 W
Output current	
• for signal "1" rated value	5 A
• for signal "1" minimum load current	10 mA
Parallel switching of two outputs	
• for uprating	No
• for redundant control of a load	Yes
Switching frequency	
• with resistive load, max.	2 Hz
• with inductive load, max.	0.5 Hz
• With inductive load (to IEC 60947-5-1, DC13/AC15), max.	0.5 Hz
• on lamp load, max.	2 Hz
• mechanical, max.	10 Hz
Total current of the outputs (per group)	
horizontal installation	
— up to 60 °C, max.	5 A
vertical installation	
— up to 40 °C, max.	5 A
Relay outputs	

• Contact connection (internal)	Yes; 330 Ohm, 0.1uF
• Number of operating cycles, max.	100 000; 100 000 (24 V DC, at 5 A), 100 000 (230 V AC, at 5 A)
Switching capacity of contacts	
— with inductive load, max.	5 A; 5 A (230 V DC), 5 A (24 V AC)
— with resistive load, max.	5 A; 5 A (230 V DC), 5 A (24 V AC)
— Thermal continuous current, max.	5 A
Cable length	
• shielded, max.	1 000 m
• unshielded, max.	600 m
Interrupts/diagnostics/status information	
Alarms	Yes
Diagnostics function	Yes; Parameterizable
Alarms	
• Diagnostic alarm	Yes; Parameterizable
Diagnoses	
• Diagnostic information readable	Yes
Diagnostics indication LED	
• Group error SF (red)	Yes
• Status indicator digital output (green)	Yes
Potential separation	
Potential separation digital outputs	
• between the channels	Yes
• between the channels, in groups of	1
• between the channels and backplane bus	Yes; Optocoupler
• Between the channels and the power supply of the relays	Yes
Isolation	
Isolation tested with	1 500 V AC
connection method	
required front connector	40-pin
Dimensions	
Width	40 mm
Height	125 mm
Depth	120 mm
Weights	
Weight, approx.	320 g
Classifications	

	Version	Classification
eClass	14	27-24-22-04
eClass	12	27-24-22-04
eClass	9.1	27-24-22-04
eClass	9	27-24-22-04
eClass	8	27-24-22-04
eClass	7.1	27-24-22-04
eClass	6	27-24-22-04
ETIM	10	EC001419
ETIM	9	EC001419
ETIM	8	EC001419
ETIM	7	EC001419
IDEA	4	3566
UNSPSC	15	32-15-17-05

Approvals / Certificates	
General Product Approval	

[Miscellaneous](#)

[Manufacturer Declaration](#)



EMV			For use in hazardous locations	Maritime application	
 EG-Konf.		 RCM	FM	 ABS	 BUREAU VERITAS
Maritime application					
 DNV	 LRS	NK / Nippon Kaiji Kyokai	 PRS	 RINA	CCS (China Classification Society)

last modified: 4/7/2025 