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Data sheet 6ES7322-1FF01-0AA0



Figure similar

spare part SIMATIC S7-300, digital output SM 322, isolated, 8 DO, 120/230 V AC, 1 A, 1x 20-pole

Supply voltage	
Load voltage L1	
● Rated value (AC)	230 V; 120/230 V AC
● permissible range, lower limit (AC)	93 V
● permissible range, upper limit (AC)	264 V
● permissible frequency range, lower limit	47 Hz
● permissible frequency range, upper limit	63 Hz
Input current	
from load voltage L1 (without load), max.	2 mA
from backplane bus 5 V DC, max.	100 mA
Power loss	
Power loss, typ.	8.6 W
Digital outputs	
Number of digital outputs	8
Short-circuit protection	Yes; Fuse 8 A, 250 V; per group
● required current for fuse shutdown, min.	40 A
● Response time, max.	300 ms
Controlling a digital input	Yes
Size of motor starters according to NEMA, max.	5 NEMA compliant
Spare fuses	8 A / quick response
Zero-crossing switch	Yes; Max. 60 V
Switching capacity of the outputs	
● on lamp load, max.	50 W
Output voltage	
● for signal "1", min.	L1 (-1.5 V)
● for signal "1" (at max. current), min.	L1 (-1.5 V)
● for signal "1" (at min. current), min.	L1 (-8.5 V)
Output current	
● for signal "1" rated value	2 A
● for signal "1" permissible range for 0 to 40 °C, min.	10 mA
● for signal "1" permissible range for 0 to 40 °C, max.	2 A
● for signal "1" permissible range for 40 to 60 °C, min.	10 mA
● for signal "1" permissible range for 40 to 60 °C, max.	1 A
● for signal "1" minimum load current	10 mA
● for signal "1" permissible surge current, max.	20 A; max. 1 AC cycle
● for signal "0" residual current, max.	2 mA
Output delay with resistive load	
● "0" to "1", max.	1 AC cycle

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● "1" to "0", max.	1 AC cycle
Parallel switching of two outputs	
● for uprating	No
● for redundant control of a load	Yes
Switching frequency	
● with resistive load, max.	10 Hz
● with inductive load, max.	0.5 Hz
● with inductive load (acc. to IEC 60947-5-1, AC15), max.	0.5 Hz
● on lamp load, max.	1 Hz
Total current of the outputs (per group)	
horizontal installation	
— up to 40 °C, max.	4 A
— up to 60 °C, max.	2 A
vertical installation	
— up to 40 °C, max.	2 A
Cable length	
● shielded, max.	1 000 m
● unshielded, max.	600 m
Interrupts/diagnostics/status information	
Alarms	No
Diagnostics function	Yes; Fuse blown or load voltage missing
Alarms	
● Diagnostic alarm	No
Diagnoses	
● Wire break	No
● short-circuit	No
● Fuse blown	Yes
● Missing load voltage	Yes
Diagnostics indication LED	
● Rated load voltage PWR (green)	Yes
● Fuse OK FSG (green)	Yes
● 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	4
● between the channels and backplane bus	Yes; Optocoupler
Isolation	
Isolation tested with	1 500 V AC
Connection method	
required front connector	20-pin
Dimensions	
Width	40 mm
Height	125 mm
Depth	120 mm
Weights	
Weight, approx.	275 g
Classifications	

	Version	Classification
eClass	16	27-24-22-04
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

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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









General Product Approval		EMV			For use in hazardous locations
Manufacturer Declaration	China RoHS				FM







Maritime application









NK / Nippon Kaiji Kyokai



Maritime application



CCS (China Classification Society)

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