SIEMENS

Data sheet

6ES7148-1CA00-0XB0

Spare part SIMATIC DP, Power module PM 148 for ET 200X 4 DO, 24V/2A DC with Load voltage supply channel diagnostics

Supply voltage	
Load voltage 2L+	
• Rated value (DC)	24 V
Short-circuit protection	Yes
 Reverse polarity protection 	No
Input current	
from load voltage 2L+ (without load), max.	60 mA
from backplane bus 5 V DC, max.	40 mA
Power loss	
Power loss, typ.	2.5 W
Digital outputs	
Number of digital outputs	4
Short-circuit protection	Yes; Electronic
 Response threshold, typ. 	3.5 A
Limitation of inductive shutdown voltage to	2L+ (-53 V)
Controlling a digital input	Yes; at minimum current of 6 mA
Switching capacity of the outputs	
● on lamp load, max.	10 W
Load resistance range	
• lower limit	12 Ω
• upper limit	4 kΩ
Output voltage	
• for signal "1", min.	2L+ (-0,8 V)
Output current	
● for signal "1" rated value	2 A; at 24 V DC
• for signal "1" permissible range, min.	6 mA
• for signal "1" permissible range, max.	2.4 A
• for signal "0" residual current, max.	0.5 mA
Parallel switching of two outputs	
• for uprating	No
• for redundant control of a load	Yes; only outputs of the same group
Switching frequency	
• with resistive load, max.	100 Hz
• with inductive load, max.	0.5 Hz

• with inductive load (acc. to IEC 60947-5-1, DC13), max.	0.5 Hz
• on lamp load, max.	1 Hz
Total current of the outputs (per group)	
all mounting positions	
— up to 20 °C, max.	6 A
— up to 55 °C, max.	4 A
Total current of the outputs (per module)	
all mounting positions	
— up to 20 °C, max.	6 A
— up to 55 °C, max.	4 A
Cable length	
• unshielded, max.	30 m
Interrupto/diagnostics/atatus information	
Interrupts/diagnostics/status information Diagnostics function	Yes; Parameterizable
Alarms	roo, raidinotonzable
Diagnostic alarm	Yes
Diagnostic messages	
Wire-break	Yes; channel by channel
Short-circuit	Yes; channel by channel
Diagnostics indication LED	
Group error SF (red)	Yes
Status indicator digital output (green)	Yes
 Load voltage monitoring 24 V DC (green) 	Yes
Potential separation	Vec
between load voltage and all other switching components	Yes
between backplane bus and all other circuit	Yes
components	
Potential separation digital outputs	
• between the channels	No
 between the channels and backplane bus 	Yes
Permissible potential difference	
between different circuits	75 V DC/60 V AC
Isolation	500 V DO
Isolation tested with	500 V DC
Dimensions	
Width	87 mm; Width module 60 mm
Height	165 mm
Depth	67 mm; incl. connector

Weights
Weight, approx.

250 g

last modified:
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