

SIMATIC DP, ELECTRON. MODULE ET 200SP, F-DQ
 8X24VDC/0.5 PP, 15 MM WIDTH, UP TO PL E (ISO 13849) UP TO
 SIL 3 (IEC 61508)



General information	
Product type designation	F-DQ 8x24VDC/0.5A PP HF
Firmware version	
<ul style="list-style-type: none"> FW update possible 	Yes
usable BaseUnits	BU type A0
Color code for module-specific color identification plate	CC02
Product function	
<ul style="list-style-type: none"> I&M data 	Yes; I&M0 to I&M3
Engineering with	
<ul style="list-style-type: none"> STEP 7 TIA Portal configurable/integrated as of version 	V14 SP1 with HSP 202
<ul style="list-style-type: none"> STEP 7 configurable/integrated as of version 	Still being prepared
Supply voltage	
Rated value (DC)	24 V
permissible range, lower limit (DC)	20.4 V
permissible range, upper limit (DC)	28.8 V
Reverse polarity protection	Yes

Input current	
Current consumption (rated value)	75 mA; without load
Current consumption, max.	21 mA; From the backplane bus
Output voltage	
Rated value (DC)	24 V
Power	
Power available from the backplane bus	70 mW
Power loss	
Power loss, typ.	3 W
Address area	
Address space per module	
• Inputs	6 byte; 5 bytes non-RIOforFA; 6 bytes RIOforFA
• Outputs	6 byte; 5 bytes non-RIOforFA; 6 bytes RIOforFA
Hardware configuration	
Automatic encoding	
• Electronic coding element type F	Yes
Digital outputs	
Number of digital outputs	8
Short-circuit protection	Yes
• Response threshold, typ.	Min. 0.7 A
Open-circuit detection	No
Limitation of inductive shutdown voltage to	Typ. -39 V
Controlling a digital input	Yes
Switching capacity of the outputs	
• with resistive load, max.	0.5 A
• on lamp load, max.	2 W
Load resistance range	
• lower limit	48 Ω
• upper limit	12 000 Ω
Output voltage	
• for signal "1", min.	24 V; L+ (-0.5 V)
Output current	
• for signal "1" rated value	0.5 A
• for signal "0" residual current, max.	0.5 mA
Switching frequency	
• with resistive load, max.	30 Hz; Symmetrical
• with inductive load, max.	0.1 Hz; according to IEC 60947-5-1, DC-13, symmetrical
• with capacitive load, max.	2 Hz; Symmetrical
• on lamp load, max.	10 Hz; Symmetrical
Total current of the outputs	

• Current per channel, max.	0.5 A; Note derating data in the manual
• Current per module, max.	3 A; Note derating data in the manual
Total current of the outputs (per module)	
horizontal installation	
— up to 40 °C, max.	3 A
— up to 50 °C, max.	2.5 A
— up to 60 °C, max.	2 A
vertical installation	
— up to 50 °C, max.	2 A
Cable length	
• shielded, max.	100 m
• unshielded, max.	100 m
Interrupts/diagnostics/status information	
Diagnostics function	Yes, "Alarms/diagnostic messages" section in the manual
Substitute values connectable	No
Alarms	
• Diagnostic alarm	Yes
Diagnostics indication LED	
• RUN LED	Yes; Green LED
• ERROR LED	Yes; Red LED
• Monitoring of the supply voltage (PWR-LED)	Yes; green PWR LED
• Channel status display	Yes; Green LED
• for channel diagnostics	Yes; Red LED
• for module diagnostics	Yes; green/red DIAG LED
Potential separation	
Potential separation channels	
• between the channels	No
• between the channels and backplane bus	Yes
• between the channels and the power supply of the electronics	No
Isolation	
Isolation tested with	707 V DC (type test)
Ambient conditions	
Ambient temperature during operation	
• horizontal installation, min.	0 °C
• horizontal installation, max.	60 °C
• vertical installation, min.	0 °C
• vertical installation, max.	50 °C
Dimensions	
Width	15 mm

Weights

Weight, approx.

48 g

last modified:

08/23/2017