## SIEMENS

## Data sheet

## 6ES7138-4FB04-0AB0



SIMATIC DP, Electronics module for ET 200S, 4 F-DO PROFIsafe, 24 V DC/2 A, 30 mm overall width, up to PL E (ISO 13849), up to SIL 3 (IEC 61508), can also be used in PROFINET configuration with IM 151-3 HF

Supply voltage	
Load voltage L+	
<ul> <li>Rated value (DC)</li> </ul>	24 V
<ul> <li>Reverse polarity protection</li> </ul>	No
Input current	
From load voltage L+ (no load), typ.	100 mA
from backplane bus 3.3 V DC, max.	28 mA
Power loss	
Power loss, typ.	3.5 W
Digital outputs	
Type of digital output	Transistor
Number of digital outputs	4
Short-circuit protection	Yes
Limitation of inductive shutdown voltage to	Typ. (2L+) -47 V
Controlling a digital input	No
Switching capacity of the outputs	
• on lamp load, max.	10 W
Load resistance range	
lower limit	12 Ω
upper limit	1 kΩ
Output voltage	
● for signal "1", min.	L+ (-2,0 V), current sourcing switch: L+ (-1,5 V), voltage drop on current sinking switch: max. 0.5 V
Output current	
<ul> <li>for signal "1" rated value</li> </ul>	2 A
<ul> <li>for signal "1" permissible range, min.</li> </ul>	20 mA
<ul> <li>for signal "1" permissible range, max.</li> </ul>	2.4 A
<ul> <li>for signal "0" residual current, max.</li> </ul>	0.5 mA; Current-sourcing and current-sinking switches
Parallel switching of two outputs	
<ul> <li>for uprating</li> </ul>	No
<ul> <li>for redundant control of a load</li> </ul>	No
Switching frequency	
<ul> <li>with resistive load, max.</li> </ul>	30 Hz; Symmetrical
<ul> <li>with inductive load, max.</li> </ul>	0.1 Hz; Symmetrical
<ul> <li>on lamp load, max.</li> </ul>	10 Hz; Symmetrical
Total current of the outputs	
Current per module, max.	6 A
Total current of the outputs (per group)	

horizontal installation	
— up to 40 °C, max.	6 A
— up to 55 °C, max.	5 A
— up to 60 °C, max.	4 A
vertical installation	
— up to 40 °C, max.	4 A
Cable length	
<ul> <li>shielded, max.</li> </ul>	500 m
<ul> <li>unshielded, max.</li> </ul>	500 m
Interrupts/diagnostics/status information	
Diagnostics function	Yes
Diagnoses	
Wire-break	Yes
Short-circuit	Yes
Diagnostics indication LED	
Group error SF (red)	Yes
<ul> <li>Status indicator digital output (green)</li> </ul>	Yes
Potential separation	
Potential separation digital outputs	
<ul> <li>between the channels</li> </ul>	No
<ul> <li>between the channels and backplane bus</li> </ul>	Yes
<ul> <li>Between the channels and load voltage L+</li> </ul>	No
Standards, approvals, certificates	
Highest safety class achievable in safety mode	
<ul> <li>Performance level according to ISO 13849-1</li> </ul>	PLe
SIL acc. to IEC 61508	SIL 3
Dimensions	
Width	30 mm
Height	81 mm
Depth	52 mm
Weights	
Weight, approx.	85 g

last modified:

1/16/2021 🖸