

SIPLUS S7-300 SM 326F DO8 according to EN 50155 T1 Cat 1 CI A/ B with conformal coating Based on 6ES7326-2BF41-0AB0 . Digital output F-DO 8x 24 V DC/2A PM fail-safe digital output Sinking-sourcing up to Category 4 (EN 954-1), SIL 3 (IEC 61508)



Figure similar

Supply voltage	
Rated value (DC)	24 V; 1L+
Reverse polarity protection	Yes
Load voltage L+	
• Rated value (DC)	24 V; 2L+, 3L+
• Reverse polarity protection	No
Input current	
from supply voltage 1L+, max.	75 mA
from load voltage 2L+ (without load), max.	100 mA
from load voltage 3L+ (without load), max.	100 mA
from backplane bus 5 V DC, max.	100 mA
Power loss	
Power loss, typ.	12 W
Digital outputs	
Number of digital outputs	8
Short-circuit protection	Yes

Limitation of inductive shutdown voltage to	L+ (-33 V)
Switching capacity of the outputs	
• on lamp load, max.	5 W
Output voltage	
• for signal "1", min.	L+ (-1.0 V)
Output current	
• for signal "1" rated value	2 A
• for signal "1" permissible range for 0 to 40 °C, min.	7 mA
• for signal "1" permissible range for 0 to 40 °C, max.	2 A; with horizontal installation, 1 A with vertical installation
• for signal "1" permissible range for 40 to 60 °C, min.	7 mA
• for signal "1" permissible range for 40 to 60 °C, max.	1 A; for horizontal installation
• for signal "0" residual current, max.	0.5 mA
Switching frequency	
• with resistive load, max.	30 Hz
• with inductive load, max.	2 Hz
• on lamp load, max.	10 Hz
Total current of the outputs (per group)	
horizontal installation	
— up to 40 °C, max.	7.5 A
— up to 60 °C, max.	4 A
vertical installation	
— up to 40 °C, max.	5 A
Cable length	
• shielded, max.	200 m; 200 m for SIL3, AK 6, Cat 4
• unshielded, max.	200 m
Interrupts/diagnostics/status information	
Alarms	
• Diagnostic alarm	Yes; Parameterizable
Diagnostic messages	
• Diagnostic information readable	Yes
Diagnostics indication LED	
• Fail-safe operation	Yes
• Group error SF (red)	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

- between the channels and the power supply of the electronics

Yes

Isolation

Isolation tested with 500V AC for 1 min (internal voltage limiting to $\pm 120V$)

Standards, approvals, certificates

CE mark Yes

RCM (formerly C-TICK) Yes

KC approval Yes

EAC (formerly Gost-R) Yes

Highest safety class achievable in safety mode

- acc. to EN 954 Cat. 4
- SIL acc. to IEC 61508 SIL 3

Railway application

- EN 50155 Yes; Sections 4, 5 and 12; no further agreements apply; T1, Category 1, Class A/B, EN 50155:2007

Ambient conditions

Ambient temperature during operation

- min. -25 °C; = Tmin
- max. 60 °C; = Tmax; the rated temperature range of -25 ... +55 °C (T1) applies for the use on railway vehicles according to EN50155

Altitude during operation relating to sea level

- Installation altitude above sea level, max. 2 000 m
- Ambient air temperature-barometric pressure-altitude Tmin ... Tmax at 1 140 hPa ... 795 hPa (-1 000 m ... +2 000 m)

Relative humidity

- With condensation, tested in accordance with IEC 60068-2-38, max. 100 %; RH incl. condensation/frost (no commissioning under condensation conditions)

Resistance

Use in stationary industrial systems

- to biologically active substances according to EN 60721-3-3 Yes; Class 3B2 mold, fungus and dry rot spores (with the exception of fauna); Class 3B3 on request
- to chemically active substances according to EN 60721-3-3 Yes; Class 3C4 (RH < 75 %) incl. salt spray acc. to EN 60068-2-52 (severity degree 3); *
- to mechanically active substances according to EN 60721-3-3 Yes; Class 3S4 incl. sand, dust, *

Use on land craft, rail vehicles and special-purpose vehicles

- to biologically active substances according to EN 60721-3-5 Yes; Class 5B2 mold, fungus and dry rot spores (with the exception of fauna); Class 5B3 on request
- to chemically active substances according to EN 60721-3-5 Yes; Class 5C3 (RH < 75 %) incl. salt spray acc. to EN 50155 (ST2); *
- to mechanically active substances according to EN 60721-3-5 Yes; Class 5S3 incl. sand, dust; *

Remark

— Note regarding classification of environmental conditions acc. to EN 60721

* The supplied plug covers must remain in place over the unused interfaces during operation!

Conformal coating

- Coatings for printed circuit board assemblies acc. to EN 61086
- Electronic equipment on rolling stock acc. to EN 50155
- Military testing according to MIL-I-46058C, Amendment 7
- Qualification and Performance of Electrical Insulating Compound for Printed Board Assemblies according to IPC-CC-830A

Yes; Class 2 for high availability

Yes; Class PC2 protective coating acc. to EN 50155:2017

Yes; Discoloration of coating possible during service life

Yes; Conformal coating, Class A

Connection method

required front connector

40-pin

Dimensions

Width

80 mm

Height

125 mm

Depth

120 mm

Weights

Weight, approx.

465 g

last modified:

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