

FAIL-SAFE transformer FST



General Data

Rated input voltage 230 V / 400 V
Rated output voltage 24 V / 230 V
Rated power 100 VA / 160 VA / 250 VA
Insulation class B
Max. ambient temperature 40 °C
Protection index IP 00

Advantages

With integrated FAIL-SAFE protection
High performance per volume thanks to compact design
Excellent switch-on response thanks to reduced starting currents
May be operated at 50 - 60 Hz
Excellent corrosion resistance and low noise thanks to BLOCKIMPEX
Primary side for input voltage 230 V and 400 V
100 VA and 160 VA versions for mounting with integrated DIN rail mounting in compliance with DIN 50022

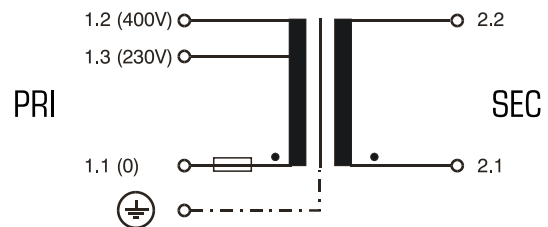
Applications

FAIL-SAFE transformer is a control transformer for electrical isolations of the input and output sides. The transformer is designed to provide control in compliance with EN 60204

FAIL-SAFE transformer as an isolating transformer for the safe electrical isolation of the input and output sides. The transformer may be used to set up protective separation as a protective measure in accordance with VDE 0100.

FAIL-SAFE transformer is a safety transformer to secure electrical isolation of the input and output sides. By limiting the output voltage, this transformer is suitable for the construction of both SELV and PELV electrical circuits.

Sample application



Standards



FAIL-SAFE control and safety transformer to: EN 61558 part 1 with part 2-2 and part 2-6

FAIL-SAFE voltage control and isolating transformer to: EN 61558 part 1 with part 2-2 and part 2-4

Approvals



ENEC 10 (VDE)



FAIL-SAFE transformer

FST



Typ	FST 100/23	FST 100/24	FST 160/23	FST 160/24	FST 250/23	FST 250/24
Electrical data						
Operating data						
Power loss	14.0 W	14.0 W	20.8 W	20.8 W	27.0 W	25.5 W
Input						
Rated input current	0,49 A / 0,28 Aac	0,49 A / 0,28 Aac	0,77 A / 0,45 Aac	0,77 A / 0,45 Aac	1,14 A / 0,65 Aac	
Rated input voltage	230 Vac / 400 Vac	230 Vac / 400 Vac	230 Vac / 400 Vac	230 Vac / 400 Vac	230 Vac / 400 Vac	230 Vac / 400 Vac
Switch-on time	100%	100%	100%	100%	100%	100%
Frequency Range	50-60 Hz	50-60 Hz	50-60 Hz	50-60 Hz	50-60 Hz	50-60 Hz
Output						
Rated output current	0,43 Aac	4,17 Aac	0,695 Aac	6,67 Aac	1,09 Aac	10,41 Aac
Rated output voltage	230 Vac	24 Vac	230 Vac	24 Vac	230 Vac	24 Vac
Rated power VDE (DB cos phi=1)	100 VA	100 VA	160 VA	160 VA	250 VA	250 VA
Rated power VDE (KB cos phi=0.5)	220 VA	220 VA	320 VA	320 VA	490 VA	490 VA
Vector group	li0	li0	li0	li0	li0	li0
Standards						
Classification	Control- and safety isolating transformer	Control- and safety isolating transformer	Control- and safety isolating transformer	Control- and safety isolating transformer	Control- and safety isolating transformer	Control- and safety isolating transformer
Environment						
Ambient temperature max.	40 °C	40 °C	40 °C	40 °C	40 °C	40 °C
Cooling method	AN	AN	AN	AN	AN	AN
Safety and protection						
Protection index	IP 00	IP 00	IP 00	IP 00	IP 00	IP 00
Safety class (prepared)	I	I	I	I	I	I
Class of Insulation System	B	B	B	B	B	B
Order numbers						
Order Number	FST 100/23	FST 100/24	FST 160/23	FST 160/24	FST 250/23	FST 250/24
Mechanical data						
Terminal and mounting						
Rail mounting	✓	✓	✓	✓		
Connections PE	Tab connector, 6.3 x 0.8 mm	Tab connector, 6.3 x 0.8 mm	Tab connector, 6.3 x 0.8 mm	Tab connector, 6.3 x 0.8 mm	Tab connector, 6.3 x 0.8 mm	Tab connector, 6.3 x 0.8 mm
Terminals Output	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²
Terminals Input	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²	Screw terminal 4 mm ²
Measures and weights						
Dimensions W x H x D	84 x 94 x 83 mm	84 x 94 x 83 mm	96 x 102 x 102 mm	96 x 102 x 102 mm	105 x 112 x 106 mm	105 x 112 x 106 mm
Core type	EI 84/43,5	EI 84/43,5	EI 96/45,7	EI 96/45,7	EI 105/60,5	EI 105/60,5
Weight	2.00 kg	2.00 kg	2.90 kg	2.90 kg	4.30 kg	4.30 kg
Dimension picture (in mm)	1	1	1	1	1	1
A	84	84	96	96	105	105
B	64	64	84	84	80.5	80.5
C	94	94	102	102	112	112
D	83	83	102	102	106	106
E	64	64	87	87	86	86

Dimension pictures

