

PCB terminal block - FRONT 2,5-V/SA10-EX - 1700309

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PCB terminal block, nominal current: 24 A, nom. voltage: 320 V, nominal current (Ex): 21 A, nominal voltage (Ex): 176 V, pitch: 5 mm, number of positions: 1, connection method: Front screw connection, mounting: Wave soldering, conductor/PCB connection direction: 90 °, color: green. The article can be aligned to create different nos. of positions!

Why buy this product

- ✓ Well-known connection principle allows worldwide use
- ✓ Low temperature rise, thanks to maximum contact force
- ✓ Satisfies the more stringent safety requirements of "Ex e" protection according to IEC 60079-7 for potentially explosive areas
- ✓ Operation and conductor connection from one direction enable integration into front of device
- ✓ Two solder pins reduce the mechanical strain on the soldering spots
- ✓ The latching on the side enables various numbers of positions to be combined



Key Commercial Data

Packing unit	50 STK
GTIN	 4 017918 022808
GTIN	4017918022808

Technical data

Item properties

Brief article description	PCB terminal block
Range of articles	FRONT 2,5-V-EX
Pitch	5 mm
Number of positions	1
Connection method	Front screw connection
Drive form screw head	Slotted
Screw thread	M2,5
Mounting type	Wave soldering
Pin layout	Linear double pinning
Number of levels	1

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Technical data

Connection capacity

Conductor cross section solid	0.2 mm ² ... 2.5 mm ²
Conductor cross section flexible	0.2 mm ² ... 2.5 mm ²
Conductor cross section AWG / kcmil	24 ... 14
Conductor cross section flexible, with ferrule without plastic sleeve	0.25 mm ² ... 1.5 mm ²
Conductor cross section, flexible, with ferrule, with plastic sleeve	0.25 mm ² ... 1.5 mm ²
2 conductors with same cross section, solid	0.2 mm ² ... 0.75 mm ²
2 conductors with same cross section, flexible	0.2 mm ² ... 0.75 mm ²
2 conductors with same cross section, stranded, ferrules without plastic sleeve	0.25 mm ² ... 0.34 mm ²

Material data - contact

Note	WEEE/RoHS-compliant, free of whiskers according to IEC 60068-2-82/ JEDEC JESD 201
Contact material	Cu alloy
Surface characteristics	Tin-plated
Metal surface terminal point (top layer)	Tin (4 - 8 µm Sn)
Metal surface soldering area (top layer)	Tin (4 - 8 µm Sn)

Material data - housing

Housing color	green (6021)
Insulating material	PA
Insulating material group	I
CTI according to IEC 60112	600
Flammability rating according to UL 94	V0
Glow wire flammability index GWFI according to EN 60695-2-12	850
Glow wire ignition temperature GWIT according to EN 60695-2-13	775
Temperature for the ball pressure test according to EN 60695-10-2	125 °C

Dimensions for the product

Length [l]	18.5 mm
Width [w]	7.5 mm
Height [h]	23 mm
Pitch	5 mm
Height (without solder pin)	19.5 mm
Solder pin [P]	3.5 mm
Pin dimensions	0.8 x 0.8 mm
Pin spacing	10 mm

Dimensions for PCB design

Hole diameter	1.2 mm
Pin spacing	10 mm

Packaging information

Type of packaging	packed in cardboard
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Packaging information

Pieces per package	50
Denomination packing units	Pcs.

Ambient conditions

Ambient temperature (storage/transport)	-40 °C ... 70 °C
Ambient temperature (assembly)	-5 °C ... 100 °C
Ambient temperature (operation)	-40 °C

Termination and connection method

Test for conductor damage and slackening	IEC 60999-1:1999-11
	Test passed

Pull-out test

Pull-out test	IEC 60999-1:1999-11
	Test passed
Conductor cross section / conductor type / tensile force	0.2 mm ² solid 10 N > 0.2 mm ² / solid / > 10 N
	0.2 mm ² flexible 10 N > 0.2 mm ² / flexible / > 10 N
	2.5 mm ² flexible 50 N > 2.5 mm ² / flexible / > 50 N
	2.5 mm ² solid 50 N > 2.5 mm ² / solid / > 50 N

Mechanical tests according to standard

Test specification	IEC 60947-7-4
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Air clearances and creepage distances

Insulating material group	I
Comparative tracking index (IEC 60112:2003-01)	CTI 600
Voltage	250 V
Minimum clearance - inhomogeneous field (III/3)	3 mm
Minimum clearance - inhomogeneous field (III/2)	3 mm
Minimum clearance - inhomogeneous field (II/2)	3 mm
Minimum creepage distance value (III/3)	3.2 mm
Minimum creepage distance value (III/2)	3 mm
Minimum creepage distance value (II/2)	3.2 mm

Current carrying capacity / derating curves

Specification	IEC 60947-7-4
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Standards and Regulations

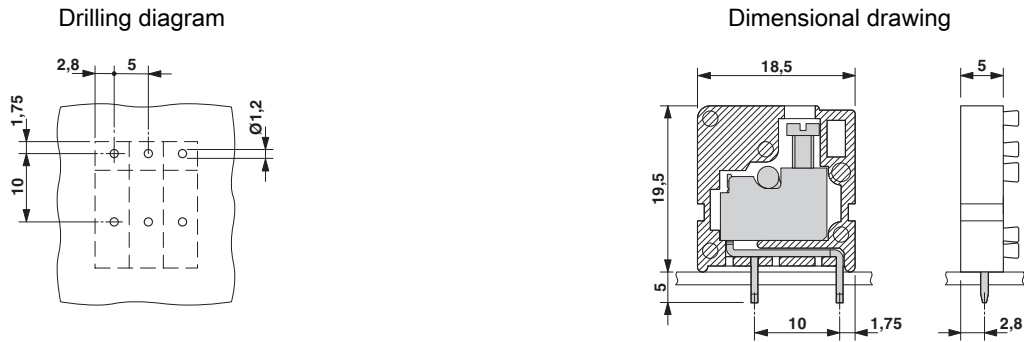
Connection in acc. with standard	EN-VDE
Flammability rating according to UL 94	V0

Environmental Product Compliance

China RoHS	Environmentally friendly use period: unlimited = EFUP-e
	No hazardous substances above threshold values

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Drawings



Approvals

Approvals

Approvals

EAC

Ex Approvals

IECEX / ATEX / EAC Ex

Approval details

EAC		B.01742
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