

2200873

https://www.phoenixcontact.com/us/products/2200873

Please be informed that the data shown in this PDF document is generated from our online catalog. Please find the complete data in the user documentation. Our general terms of use for downloads are valid.



Printed circuit board terminal, nominal current: 22 A, rated voltage (III/2): 250 V, nominal cross section: 2.5 mm², number of potentials: 2, number of rows: 1, number of positions per row: 2, product range: FKDSO 2,5/..-R, pitch: 5 mm, connection method: Push-in spring connection, mounting: Wave soldering, conductor/PCB connection direction: 0 °, color: green, Pin layout: Linear pinning, Solder pin [P]: 3.5 mm, number of solder pins per potential: 1, type of packaging: packed in cardboard. Product with pin output on right side

## Your advantages

- · Time saving push-in connection, tools not required
- · Intuitive operation due to color-coded actuating push button
- · Defined contact force ensures that contact remains stable over the long term
- · Push-in technology for quick and easy wiring
- · Orthogonal alignment of the terminal block with the PCB for optimum accessibility in DIN-rail-mounted devices

#### Commercial data

Item number	2200873
Packing unit	50 pc
Minimum order quantity	250 pc
Note	Made to order (non-returnable)
Product key	ACHADA
GTIN	4046356697743
Weight per piece (including packing)	2.482 g
Weight per piece (excluding packing)	2.54 g
Country of origin	PL



https://www.phoenixcontact.com/us/products/2200873



## Technical data

### Product properties

Product type	Printed circuit board terminal
Product family	FKDSO 2,5/R
Туре	PC terminal block can be aligned
Number of positions	2
Pitch	5 mm
Number of connections	2
Number of rows	1
Number of potentials	2
Pin layout	Linear pinning
Solder pins per potential	1

### Electrical properties

#### **Properties**

Nominal current I <sub>N</sub>	22 A
Nominal voltage U <sub>N</sub>	250 V
Rated voltage (III/3)	250 V
Rated surge voltage (III/3)	4 kV
Rated voltage (III/2)	250 V
Rated surge voltage (III/2)	4 kV
Rated voltage (II/2)	630 V
Rated surge voltage (II/2)	4 kV

### Connection data

#### Connection technology

Nominal cross section	2.5 mm²
Conductor connection	
Connection method	Push-in spring connection
Conductor cross-section rigid	0.2 mm² 2.5 mm²
Conductor cross-section flexible	0.2 mm² 2.5 mm²
Conductor cross-section AWG	24 14
Conductor cross-section flexible, with ferrule without plastic sleeve	0.25 mm² 2.5 mm²
Conductor cross-section, flexible, with ferrule, with plastic sleeve	0.25 mm² 2.5 mm²
2 conductors with the same cross section, flexible, with TWIN ferrule with plastic sleeve	0.5 mm² 1.5 mm²
Stripping length	10 mm

## Mounting

Mounting type	Wave soldering
Pin layout	Linear pinning



2200873

https://www.phoenixcontact.com/us/products/2200873

### Material specifications

#### 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

Color (Housing)	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

### Material data – actuating element

Insulating material	PBT GF
Insulating material group	Illa
CTI according to IEC 60112	275
Flammability rating according to UL 94	V0

### Dimensions

Dimensional drawing	ph h
Pitch	5 mm
Width [w]	10.9 mm
Height [h]	14.85 mm
Length [I]	18.8 mm
Solder pin length [P]	3.5 mm
Pin dimensions	0.8 x 1 mm
PCB design	
Hole diameter	1.4 mm

## Mechanical tests



2200873

https://www.phoenixcontact.com/us/products/2200873

Test for	conductor	damada	and	slackening
1621101	COHUUCIOI	ualliaue	anıu	SIACKEIIIIU

Specification	IEC 60999-1:1999-11
Result	Test passed
Pull-out test	
Specification	IEC 60999-1:1999-11
Conductor cross-section/conductor type/tractive force	0.2 mm² / solid / > 10 N
setpoint/actual value	0.2 mm² / flexible / > 10 N
	2.5 mm² / solid / > 50 N
	2.5 mm² / flexible / > 50 N

#### Electrical tests

#### Temperature-rise test

Specification  Requirement temperature-rise test	The sum of ambient temperature and temperature rise of the PCB terminal block shall not exceed the upper limiting
	temperature.
hort-time withstand current	temperature.

#### \_ .\_ .

Specification	IEC 60512-3-1:2002-02
Insulation resistance, neighboring positions	> 5 MΩ

#### Air clearances and creepage distances |

Specification	IEC 60947-1:2007-06 + A1:2010-12
Insulating material group	1
Comparative tracking index (IEC 60112)	CTI 600
Rated insulation voltage (III/3)	250 V
Rated surge voltage (III/3)	4 kV
minimum clearance value - non-homogenous field (III/3)	3 mm
minimum creepage distance (III/3)	3.2 mm
Rated insulation voltage (III/2)	250 V
Rated surge voltage (III/2)	4 kV
minimum clearance value - non-homogenous field (III/2)	3 mm
minimum creepage distance (III/2)	1.25 mm
Rated insulation voltage (II/2)	630 V
Rated surge voltage (II/2)	4 kV
minimum clearance value - non-homogenous field (II/2)	3 mm
minimum creepage distance (II/2)	3.2 mm

### Environmental and real-life conditions

#### Vibration test

VIDICATION COOL		
	Specification	IEC 60068-2-6:2007-12



2200873

https://www.phoenixcontact.com/us/products/2200873

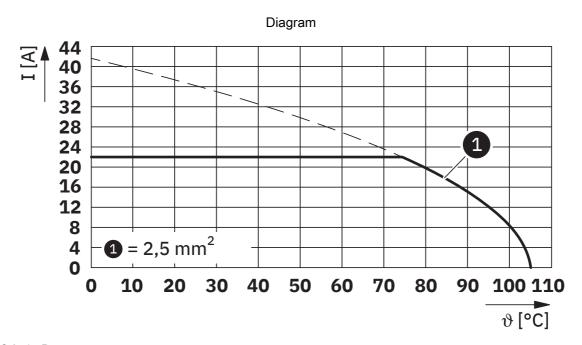
Frequency	10 - 150 - 10 Hz
Sweep speed	1 octave/min
Amplitude	0.35 mm (10 Hz 60.1 Hz)
Acceleration	5g (60.1 Hz 150 Hz)
Test duration per axis	2.5 h
Test directions	X-, Y- and Z-axis
ow-wire test	
Specification	IEC 60695-2-10:2013-04
Temperature	850 °C
Time of exposure	5 s
ing	
Specification	IEC 60947-7-4:2019-01
abient conditions	
Ambient temperature (operation)	-40 °C 105 °C (Depending on the current carrying capacity/derating curve)
Ambient temperature (storage/transport)	-40 °C 55 °C
Ambient temperature (storage/transport) Relative humidity (storage/transport)	-40 °C 55 °C 30 % 70 %



https://www.phoenixcontact.com/us/products/2200873



# Drawings



Type: FKDSO 2.5/...-R



https://www.phoenixcontact.com/us/products/2200873



# **Approvals**

To download certificates, visit the product detail page: https://www.phoenixcontact.com/us/products/2200873

cULus Recognized Approval ID: E60425-20110930				
	Nominal voltage $U_N$	Nominal current I <sub>N</sub>	Cross section AWG	Cross section mm <sup>2</sup>
В				
	300 V	10 A	24 - 14	-
Only rigid conductors	300 V	20 A	24 - 12	-
D				
	300 V	10 A	24 - 14	-
Only rigid conductors	300 V	10 A	24 - 12	-

VDE	VDE report with production monitoring Approval ID: 40033478				
		Nominal voltage U <sub>N</sub>	Nominal current I <sub>N</sub>	Cross section AWG	Cross section mm <sup>2</sup>
keine					
		250 V	22 A	-	0.2 - 2.5



2200873

https://www.phoenixcontact.com/us/products/2200873

# Classifications

### **ECLASS**

	ECLASS-13.0	27460101
	ECLASS-15.0	27460101
ET	IIM	
	ETIM 9.0	EC002643
UN	ISPSC	

U UNSPSC 21.0

39121400



2200873

https://www.phoenixcontact.com/us/products/2200873

# Environmental product compliance

#### EU RoHS

Fulfills EU RoHS substance requirements	Yes, No exemptions
China RoHS	
Environment friendly use period (EFUP)	EFUP-E
	No hazardous substances above the limits
EU REACH SVHC	
REACH candidate substance (CAS No.)	No substance above 0.1 wt%

Phoenix Contact 2025 @ - all rights reserved https://www.phoenixcontact.com

Phoenix Contact USA 586 Fulling Mill Road Middletown, PA 17057, United States (+717) 944-1300 info@phoenixcon.com