PCB terminal block - MKDSP 10HV/ 2-12,7 - 1929533

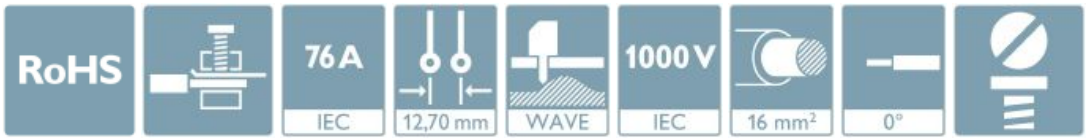
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PCB terminal block, nominal current: 76 A, rated voltage (III/2): 1000 V, nominal cross section: 16 mm², Number of potentials: 2, Number of rows: 1, Number of positions per row: 2, product range: MKDSP 10HV, pitch: 12.7 mm, connection method: Screw connection with tension sleeve, mounting: Wave soldering, conductor/PCB connection direction: 0 °, color: green, Pin layout: Linear double pinning, Solder pin [P]: 5 mm, type of packaging: packed in cardboard. The article can be aligned to create different nos. of positions!

Your advantages

- Well-known connection principle allows worldwide use
- Low temperature rise, thanks to maximum contact force
- Allows connection of two conductors
- Quick and convenient testing using integrated test option
- The latching on the side enables various numbers of positions to be combined
- Integrated protective guide prevents incorrect insertion of the conductor underneath the tension sleeve



Key Commercial Data

Packing unit	1 pc
Minimum order quantity	50 pc
GTIN	4 017918 819651
GTIN	4017918819651
Weight per Piece (excluding packing)	18.400 g
Custom tariff number	85369010
Country of origin	Poland

Technical data

Item properties

Brief article description	PCB terminal block
Range of articles	MKDSP 10HV
Pitch	12.7 mm

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Technical data

Item properties

Number of positions	2
Drive form screw head	Slotted (L)
Screw thread	M4
Mounting type	Wave soldering
Pin layout	Linear double pinning
Number of levels	1
Number of connections	2
Number of potentials	2

Electrical parameters

Nominal current	76 A
Nom. voltage	1000 V
Rated voltage (III/3)	1000 V
Rated voltage (III/2)	1000 V
Rated voltage (II/2)	1000 V
Rated surge voltage (III/3)	8 kV
Rated surge voltage (III/2)	8 kV
Rated surge voltage (II/2)	6 kV

Connection capacity

Connection method	Screw connection with tension sleeve
pluggable	Yes
Conductor cross section solid	0.5 mm² ... 16 mm²
Conductor cross section flexible	0.5 mm² ... 16 mm²
Conductor cross section AWG / kcmil	20 ... 6
Conductor cross section flexible, with ferrule without plastic sleeve	0.5 mm² ... 16 mm²
Conductor cross section, flexible, with ferrule, with plastic sleeve	0.5 mm² ... 16 mm²
2 conductors with same cross section, solid	0.5 mm² ... 4 mm²
2 conductors with same cross section, flexible	0.5 mm² ... 4 mm²
2 conductors with same cross section, flexible, with ferrule without plastic sleeve	0.5 mm² ... 2.5 mm²
2 conductors with the same cross section, flexible, with TWIN ferrule with plastic sleeve	0.5 mm² ... 6 mm²
Stripping length	10 mm
Torque	1.2 Nm ... 1.5 Nm

Material data - contact

Note	WEEE/RoHS-compliant, free of whiskers according to IEC 60068-2-82/ JEDEC JESD 201
Contact material	Cu alloy

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Technical data

Material data - contact

Surface characteristics	Tin-plated
Metal surface terminal point (top layer)	Tin (5 - 7 µm Sn)
Metal surface terminal point (middle layer)	Nickel (2 - 3 µm Ni)
Metal surface soldering area (top layer)	Tin (5 - 7 µm Sn)
Metal surface soldering area (middle layer)	Nickel (2 - 3 µm Ni)

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

Caption	Schematische Abbildung - weitere Details siehe Produktfamilienzeichnung im Download Center
Length [l]	22 mm
Width [w]	22.86 mm
Height [h]	35.8 mm
Pitch	12.7 mm
Height (without solder pin)	30.8 mm
Solder pin [P]	5 mm
Pin dimensions	1 x 0.9 mm

Dimensions for PCB design

Hole diameter	1.5 mm

Packaging information

Type of packaging	packed in cardboard
Pieces per package	50
Denomination packing units	Pcs.

Processing notes

Process	Wave soldering
Specification	Following IEC 61760-1:2006-04
	Following IEC 60068-2-54:2006-04

Ambient conditions

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Technical data

Ambient conditions

Ambient temperature (storage/transport)	-40 °C ... 70 °C
Ambient temperature (assembly)	-5 °C ... 100 °C
Ambient temperature (operation)	-40 °C ... 100 °C (Depending on the current carrying capacity/derating curve)

Termination and connection method

Test for conductor damage and slackening	IEC 60998-2-1:1990-04
	Test passed

Pull-out test

Pull-out test	IEC 60998-2-1:1990-04
Conductor cross section / conductor type / tensile force	0.5 mm² / solid / > 30 N
	0.5 mm² / flexible / > 30 N
	16 mm² / solid / > 100 N
	10 mm² / flexible / > 90 N

Mechanical tests according to standard

Test specification	IEC 60998-2-1 (in parts)

Electrical tests

Rated current	76 A
Conductor cross section	16 mm²
Rated voltage (III/2)	1000 V
Rated surge voltage (III/2)	8 kV

Air clearances and creepage distances

Clearances and creepage distances	IEC 60664-1:2007-04
Specification	IEC 60664-1:2007-04
Minimum clearance - inhomogeneous field (III/3)	8 mm
Minimum clearance - inhomogeneous field (III/2)	8 mm
Minimum clearance - inhomogeneous field (II/2)	5.5 mm
Minimum creepage distance value (III/3)	12.5 mm
Minimum creepage distance value (III/2)	5 mm
Minimum creepage distance value (II/2)	5 mm

Temperature-rise test

Specification	IEC 60998-2-1:1990-04
Requirement temperature-rise test	Increase in temperature ≤ 45 K

Vibration test

Specification	IEC 60068-2-6:1995-03
Frequency	10 - 150 - 10 Hz

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Technical data

Vibration test

Sweep speed	1 octave/min
Amplitude	0.35 mm (10 - 60.1 Hz)
Acceleration	5 g (60.1 - 150 Hz)
Test duration per axis	2.5 h

Insulation resistance

Specification	IEC 60998-2-1:1990-04
Result	Test passed
Insulation resistance, neighboring positions	10^9 Ω

Glow-wire test

Specification	IEC 60998-2-1:1990-04
Temperature	850 °C
Time of exposure	5 s

Mechanical strength/tumbling barrel test

Specification	IEC 60998-2-1:1990-04
Number of drop cycles	50

Standards and Regulations

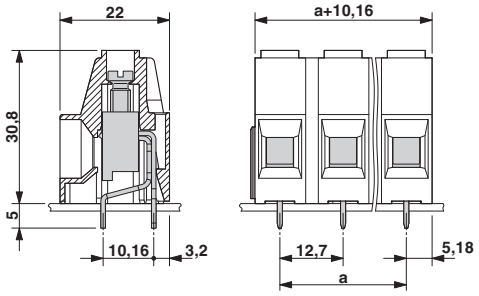
Connection in acc. with standard	EN-VDE
	CUL
Flammability rating according to UL 94	V0

Environmental Product Compliance

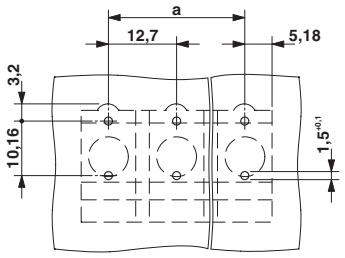
REACh SVHC	Lead 7439-92-1
China RoHS	Environmentally Friendly Use Period = 50 years
	For details about hazardous substances go to tab “Downloads”, Category “Manufacturer's declaration”

Drawings

Dimensional drawing



Drilling diagram



PCB terminal block - MKDSP 10HV/ 2-12,7 - 1929533

Classifications

eCl@ss

eCl@ss 10.0.1	27440401
eCl@ss 11.0	27460101
eCl@ss 4.0	27141100
eCl@ss 4.1	27141100
eCl@ss 5.0	27141100
eCl@ss 5.1	27261100
eCl@ss 6.0	27261100
eCl@ss 7.0	27440401
eCl@ss 8.0	27440401
eCl@ss 9.0	27440401

ETIM

ETIM 3.0	EC001121
ETIM 4.0	EC002643
ETIM 5.0	EC002643
ETIM 6.0	EC002643
ETIM 7.0	EC002643

UNSPSC

UNSPSC 6.01	30211801
UNSPSC 7.0901	39121432
UNSPSC 11	39121432
UNSPSC 12.01	39121432
UNSPSC 13.2	39121432
UNSPSC 18.0	39121432
UNSPSC 19.0	39121432
UNSPSC 20.0	39121432
UNSPSC 21.0	39121432

Approvals

Approvals

Approvals

IECEE CB Scheme / SEV / EAC / cULus Recognized

Ex Approvals

PCB terminal block - MKDSP 10HV/ 2-12,7 - 1929533

Approvals

Approval details

IECEE CB Scheme		http://www.iecee.org/	CH-10724-A1

Nominal voltage UN	1000 V
Nominal current IN	57 A
mm²/AWG/kcmil	16

SEV		https://www.eurofins.ch/de/	IK-4486-A1

Nominal voltage UN	1000 V
Nominal current IN	57 A
mm²/AWG/kcmil	16

EAC		B.01687

cULus Recognized		http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	E60425-19770427

	B	C
Nominal voltage UN	600 V	600 V
Nominal current IN	60 A	60 A
mm²/AWG/kcmil	20-6	20-6

Accessories

Accessories

Crimping tool

PCB terminal block - MKDSP 10HV/ 2-12,7 - 1929533

Accessories

Crimping pliers - CRIMPFOX 6 - 1212034



Crimping pliers, for ferrules without insulating collar according to DIN 46228 Part 1 and ferrules with insulating collar according to DIN 46228 Part 4, 0.25 mm² ... 6.0 mm², lateral entry, trapezoidal crimp

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Crimping pliers - CRIMPFOX 16 S - 1207983



Crimping pliers for ferrules up to 16 mm²

Insulating sleeve

Insulating sleeve - MPS-IH WH - 0201663

Insulating sleeve, color: white



Insulating sleeve - MPS-IH RD - 0201676

Insulating sleeve, color: red



Insulating sleeve - MPS-IH BK - 0201731

Insulating sleeve, color: black



PCB terminal block - MKDSP 10HV/ 2-12,7 - 1929533

Accessories

Insulating sleeve - MPS-IH GY - 0201728



Insulating sleeve, color: gray

Insulating sleeve - MPS-IH GN - 0201702



Insulating sleeve, color: green

Insulating sleeve - MPS-IH BU - 0201689



Insulating sleeve, color: blue

Insulating sleeve - MPS-IH BU - 0201689



Insulating sleeve, color: blue

Pitch spacer

Pitch spacer - RZ-MKDSP 10 HV-2,54 - 1929672



Pitch spacer, raises the pitch by 2.54 mm, interlocks with terminal block, color: green

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PCB terminal block - MKDSP 10HV/ 2-12,7 - 1929533

Accessories

Screwdriver tools

Screwdriver - SZS 0,6X3,5 - 1205053



Actuation tool, for ST terminal blocks, insulated, also suitable for use as a bladed screwdriver, size: 0.6 x 3.5 x 100 mm, 2-component grip, with non-slip grip

Terminal marking

Marker strip - SK 5,0 WH:REEL - 0805221



Marker strip, Roll, white, unlabeled, can be labeled with: THERMOMARK ROLL 2.0, THERMOMARK ROLL, THERMOMARK ROLL X1, THERMOMARK ROLLMASTER 300/600, THERMOMARK X1.2, mounting type: adhesive, for terminal block width: 5 mm, lettering field size: continuous x 5#mm, Number of individual labels: 90000

Test plug terminal block

Reducing plug - RPS - 0201647



Reducing plug, color: gray

Test plugs - MPS-MT - 0201744



Test plugs, with solder connection up to 1 mm² conductor cross section, color: gray

Additional products

PCB terminal block - MKDSP 10HV/ 2-12,7 - 1929533

Accessories

PCB terminal block - MKDSP 10HV/ 3-12,7 - 1929546



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