

Data Sheet | Item Number: 254-866

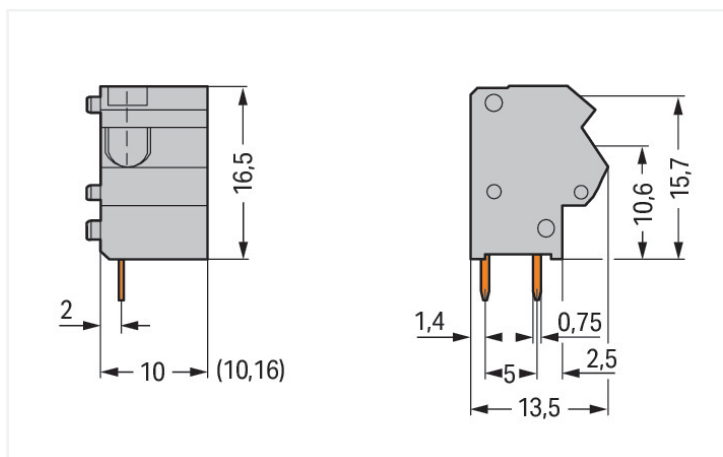
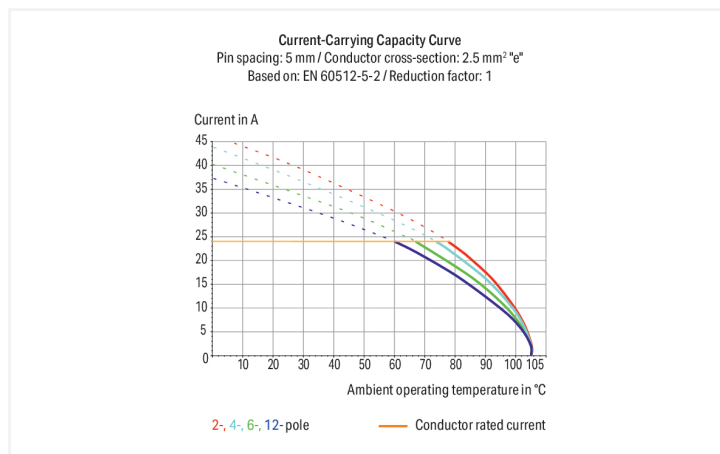
Stackable PCB terminal block; 2.5 mm²; Pin spacing 10/10.16 mm; 1-pole; PUSH WIRE®; orange

<https://www.wago.com/254-866>



Color: ■ orange

Similar to illustration



Dimensions in mm

PCB terminal block, 254 Series, solder pin dimensions 0.5 x 0.75 mm

Our PCB terminal block (item number 254-866) makes connecting wires quick and easy. It is a universal connector that can be used almost anywhere, for example, as a pluggable PCB connector, panel feedthrough header, connector for rail-mount terminal blocks, or a floating connector for different mounting methods. Ensure that the strip lengths are between 10 and 12 mm when connecting conductors to this PCB terminal block. This product features one conductor terminal and utilizes PUSH WIRE®. Our PUSH WIRE® connection uses the stiffness of the conductor to overcome the clamping spring's contact force, allowing you to clamp the conductor in place more quickly and easily. The item's dimensions are (11.7 x 19.7 x 13.5) mm (width x height x depth). This PCB terminal block is suitable for conductor cross sections ranging from 0.5 mm² to 2.5 mm².

Tin is used for coating the contact surfaces. This PCB terminal block is operated with an operating tool. The PCB terminal block is designed for THT soldering. Insert the conductor at an angle of 45°.



Notes	
Variants:	Other colors Versions for Ex i Other versions (or variants) can be requested from WAGO Sales or configured at https://configurator.wago.com/ .

Electrical data						
Ratings per		IEC/EN 60664-1			Approvals per	
		UL 1059				
Overvoltage category	III	III	II		Use group	B C D
Pollution degree	3	2	2		Rated voltage	300 V - 300 V
Nominal voltage	630 V	1000 V	1000 V		Rated current	10 A - 10 A
Rated impulse withstand voltage	8 kV	8 kV	8 kV			
Rated current	24 A	24 A	24 A			

Approvals per		CSA		
Use group	B	C	D	
Rated voltage	300 V	-	300 V	
Rated current	10 A	-	10 A	

Connection data			
Clamping units	1	Connection 1	
Total number of potentials	1	Connection technology	PUSH WIRE®
Number of connection types	1	Actuation type	Operating tool
Number of levels	1	Solid conductor	0.5 ... 2.5 mm² / 20 ... 12 AWG
		Fine-stranded conductor; with insulated ferrule	0.5 ... 1.5 mm²
		Fine-stranded conductor; with uninsulated ferrule	0.5 ... 1.5 mm²
		Note (conductor cross-section)	12 AWG: THHN, THWN
		Strip length	10 ... 12 mm / 0.39 ... 0.47 inches
		Conductor connection direction to PCB	45 °
		Pole number	1

Physical data	
Pin spacing	10/10.16 mm / 0.394/0.4 inches
Width	11.7 mm / 0.461 inches
Height	19.7 mm / 0.776 inches
Height from the surface	15.7 mm / 0.618 inches
Depth	13.5 mm / 0.531 inches
Solder pin length	4 mm
Solder pin dimensions	0.5 x 0.75 mm
Drilled hole diameter with tolerance	1.1 (+0.1) mm



PCB contact		
PCB contact		THT
Solder pin arrangement		within the terminal block (in-line)
Number of solder pins per potential		2

Material data		
Note (material data)		Information on material specifications can be found here
Color		orange
Material group		I
Insulation material (main housing)		Polyamide (PA66)
Flammability class per UL94		V0
Clamping spring material		Chrome-nickel spring steel (CrNi)
Contact material		Electrolytic copper (E _{cu})
Contact Plating		Tin
Fire load		0.03 MJ
Weight		1.6 g

Environmental requirements		
Limit temperature range		-60 ... +105 °C

Commercial data		
Product Group		4 (Printed Circuit Connectors)
PU (SPU)		300 (100) pcs
Packaging type		Box
Country of origin		PL
GTIN		4044918943253
Customs tariff number		85369010000

Product Classification		
UNSPSC		39121409
eCl@ss 10.0		27-44-04-01
eCl@ss 9.0		27-44-04-01
ETIM 9.0		EC002643
ETIM 8.0		EC002643
ECCN		NO US CLASSIFICATION

Environmental Product Compliance		
RoHS Compliance Status		Compliant, No Exemption

Approvals / Certificates		
General approvals		General approvals
		UR Underwriters Laboratories Inc.
		UL 1059
		E45172
Approval	Standard	Certificate Name
CCA DEKRA Certification B.V.	EN 60947	NTR NL 7375
CSA CSA Group	C22.2	70154033



Approvals for marine applications



Approval	Standard	Certificate Name
ABS American Bureau of Ship- ping	-	24-0095975-PDA
DNV DNV GL SE	-	TAE000016Z
PRS Polski Rejestr Statków	-	TE/1095/880590/23

Downloads

Environmental Product Compliance

Compliance Search
Environmental Product Compliance 254-866
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Documentation

Additional Information
Technical Section
03.04.2019
pdf 2027.26 KB
↓

CAD/CAE-Data

CAD data
2D/3D Models 254-866
↓

CAE data
EPLAN Data Portal 254-866
↓
ZUKEN Portal 254-866
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PCB Design
Symbol and Footprint via SamacSys 254-866
↓
Symbol and Footprint via Ultra Librarian 254-866
↓

1 Compatible Products

1.1 Required Accessories

1.1.1 End plate

1.1.1.1 End plate



Item No.: 254-400

End plate; 1 mm thick; snap-fit type; blue



Item No.: 254-200

End plate; 1 mm thick; snap-fit type; dark gray



Item No.: 254-100

End plate; 1 mm thick; snap-fit type; gray



Item No.: 254-300

End plate; 1 mm thick; snap-fit type; light gray



Item No.: 254-700

End plate; 1 mm thick; snap-fit type; light green



Item No.: 254-600

End plate; 1 mm thick; snap-fit type; orange

1.2 Optional Accessories

1.2.1 Ferrule

1.2.1.1 Ferrule



Item No.: 216-241

Ferrule; Sleeve for 0.5 mm² / 20 AWG; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; white



Item No.: 216-141

Ferrule; Sleeve for 0.5 mm² / 20 AWG; un-insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 1/08.92



Item No.: 216-242

Ferrule; Sleeve for 0.75 mm² / 18 AWG; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; gray



Item No.: 216-262

Ferrule; Sleeve for 0.75 mm² / 18 AWG; un-insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; gray



Item No.: 216-142

Ferrule; Sleeve for 0.75 mm² / 18 AWG; un-insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 1/08.92



Item No.: 216-243

Ferrule; Sleeve for 1 mm² / AWG 18; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; red



Item No.: 216-263

Ferrule; Sleeve for 1 mm² / AWG 18; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; red



Item No.: 216-143

Ferrule; Sleeve for 1 mm² / AWG 18; un-insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 1/08.92



Item No.: 216-244

Ferrule; Sleeve for 1.5 mm² / AWG 16; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; black



Item No.: 216-264

Ferrule; Sleeve for 1.5 mm² / AWG 16; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; black



Item No.: 216-284

Ferrule; Sleeve for 1.5 mm² / AWG 16; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; black



Item No.: 216-144

Ferrule; Sleeve for 1.5 mm² / AWG 16; un-insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 1/08.92; silver-colored

1.2.2 Marking

1.2.2.1 Marking strip



Item No.: 210-332/1000-202

Marking strips; as a DIN A4 sheet; MARKED; 1-16 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1016-202

Marking strips; as a DIN A4 sheet; MARKED; 1-16 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1000-204

Marking strips; as a DIN A4 sheet; MARKED; 17-31 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1016-204

Marking strips; as a DIN A4 sheet; MARKED; 17-31 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1000-206

Marking strips; as a DIN A4 sheet; MARKED; 33-48 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white



Item No.: 210-332/1016-206

Marking strips; as a DIN A4 sheet; MARKED; 33-48 (80x); Height of marker strip: 3 mm; Strip length 182 mm; Horizontal marking; Self-adhesive; white

1.2.3 Test and measurement

1.2.3.1 Testing accessories



Item No.: 210-136
Test plug; 2 mm Ø; with 500 mm cable; red

1.2.4 Tool

1.2.4.1 Operating tool



Item No.: 210-658
Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; angled; short; multicoloured



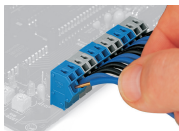
Item No.: 210-720
Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; multicoloured



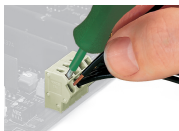
Item No.: 210-657
Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; short; multicoloured

Installation Notes

Conductor termination



Insert solid conductors via push-in termination.



Inserting a tip-bonded conductor via screwdriver.

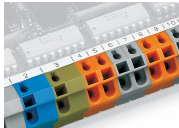


Removing a solid conductor.

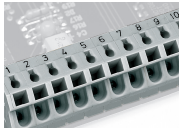


Inserting/removing a ferruled conductor.

Marking

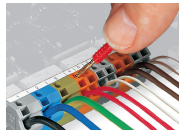


Labeling via self-adhesive marking strips.



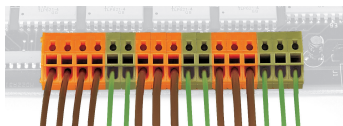
Labeling via factory direct marking.

Testing

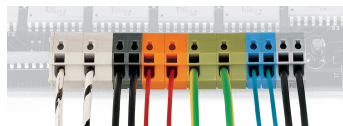


Testing with 2 mm Ø test plug.

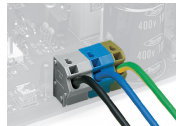
Application



Mixed terminal strips can be assembled using different housing colors for the formation of groups.



Mixed terminal strips can be assembled using different pin spacing and housing colors for the formation of groups.



Application example: field-wiring terminal strip