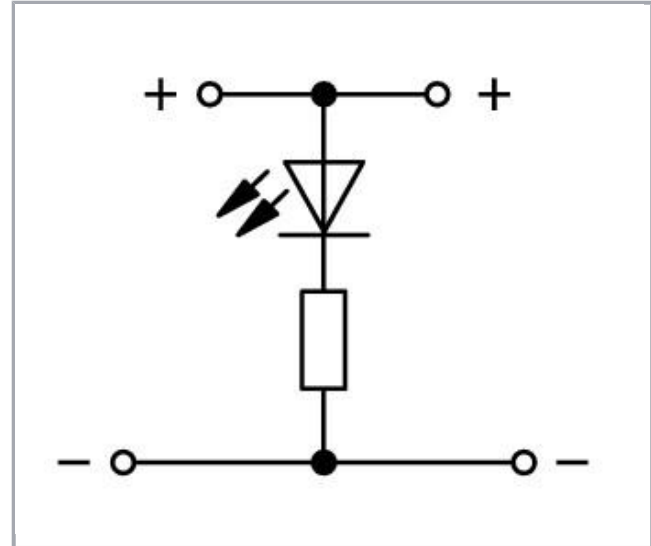
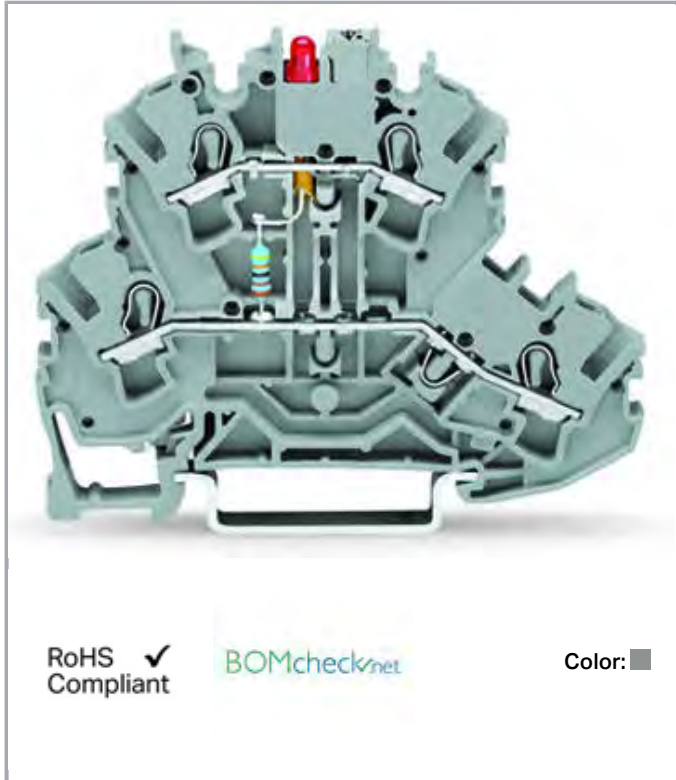


Data sheet | Item number: 2002-2221/1000-413

Component terminal block; double-deck; LED (red); 24 VDC; for DIN-rail 35 x 15 and 35 x 7.5; 2.5 mm²; Push-in CAGE CLAMP®; 2,50 mm²; gray



RoHS
Compliant

BOMcheck.net

Color: ■

Data

Electrical data

Voltage type 1	DC
Nominal voltage	24 V

Ratings per IEC/EN 60664-1

Ratings per	IEC/EN 60947-7-1
Rated current	0.025 A

Connection data

Connection technology	Push-in CAGE CLAMP®
Actuation type	Push-in Open Tool Slot

Subject to changes. Please also observe the further product documentation!



Connectable conductor materials	Copper
Nominal cross-section	2,5 mm ²
Solid conductor	0,25 ... 4 mm ² / 22 ... 12 AWG
Solid conductor; push-in termination	0,75 ... 4 mm ² / 18 ... 12 AWG
Fine-stranded conductor	0,25 ... 4 mm ² / 22 ... 12 AWG
Fine-stranded conductor; with insulated ferrule	1 ... 2,5 mm ² / 18 ... 14 AWG
Fine-stranded conductor; with ferrule; push-in termination	1 ... 2,5 mm ² / 18 ... 14 AWG
Strip length	10 ... 12 mm / 0.39 ... 0.47 inch
Total number of connection points	4
Total number of potentials	2
Number of levels	2
Wiring type	Front-entry wiring
Note (conductor cross-section)	Depending on the conductor characteristic, a conductor with a smaller cross-section can also be inserted via push-in termination.

Geometrical Data

Width	5,2 mm / 0.205 inch
Height from upper-edge of DIN-rail	51,7 mm / 2.035 inch
Depth	69,7 mm / 2.744 inch

Mechanical data

Design	horizontal type
Mounting type	DIN-35 rail
Marking level	Center/side marking

Material Data

Color	gray
Insulation material	Polyamide 66 (PA 66)
Weight	11 g

Commercial data

Product Group	22 (TOPJOB S)
Packaging type	BOX
Country of origin	DE
GTIN	4045454373818
Customs tariff number	85369010000

Subject to changes. Please also observe the further product documentation!

Compatible products

Carrier rail

	Item no.: 210-112 Steel carrier rail; 35 x 7.5 mm; 1 mm thick; 2 m long; slotted; according to EN 60715; "Hole width 25 mm"
	Item no.: 210-113 Steel carrier rail; 35 x 7.5 mm; 1 mm thick; 2 m long; unslotted; according to EN 60715
	Item no.: 210-114 Steel carrier rail; 35 x 15 mm; 1.5 mm thick; 2 m long; unslotted; similar to EN 60715
	Item no.: 210-115 Steel carrier rail; 35 x 7.5 mm; 1 mm thick; 2 m long; slotted; according to EN 60715; "Hole width 18 mm"
	Item no.: 210-118 Steel carrier rail; 35 x 15 mm; 2.3 mm thick; 2 m long; unslotted; according to EN 60715
	Item no.: 210-196 Aluminum carrier rail; 35 x 8.2 mm; 1.6 mm thick; 2 m long; unslotted; similar to EN 60715; silver-colored
	Item no.: 210-197 Steel carrier rail; 35 x 15 mm; 1.5 mm thick; 2 m long; slotted; similar to EN 60715
	Item no.: 210-198 Copper carrier rail; 35 x 15 mm; 2.3 mm thick; 2 m long; unslotted; according to EN 60715; copper-colored
	Item no.: 210-504 Steel carrier rail; 35 x 7.5 mm; 1 mm thick; 2 m long; slotted; galvanized; according to EN 60715
	Item no.: 210-505 Steel carrier rail; 35 x 7.5 mm; 1 mm thick; 2 m long; unslotted; galvanized; according to EN 60715
	Item no.: 210-506 Steel carrier rail; 35 x 15 mm; 1.5 mm thick; 2 m long; unslotted; galvanized; similar to EN 60715
	Item no.: 210-508 Steel carrier rail; 35 x 15 mm; 1.5 mm thick; 2 m long; slotted; galvanized; similar to EN 60715

ferrule

Item no.: 216-241 Ferrule; Sleeve for 0.5 mm ² / 20 AWG; insulated; electro-tin plated; electrolytic copper; gastight
--

Subject to changes. Please also observe the further product documentation!



crimped; acc. to DIN 46228, Part 4/09.90; white



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.: 216-243

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.: 216-244

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.: 216-246

Ferrule; Sleeve for 2.5 mm² / AWG 14; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; blue



Item no.: 216-262

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.: 216-263

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.: 216-264

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.: 216-266

Ferrule; Sleeve for 2.5 mm² / AWG 14; insulated; electro-tin plated; electrolytic copper; gastight crimped; acc. to DIN 46228, Part 4/09.90; blue

Protective Warning Marker



Item no.: 2002-115

Protective warning marker; with high-voltage symbol, black; for 5 terminal blocks; yellow

tools



Item no.: 210-658

Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; angled; short



Item no.: 210-720

Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft

Insulation stop



Item no.: 2002-171

Insulation stop; 0.25 - 0.5 mm²; 5 pieces/strip; light gray



Item no.: 2002-172

Insulation stop; 0.75 - 1 mm²; 5 pieces/strip; dark gray

Push-In type wire jumper



Item no.: 2009-412

Push-in type wire jumper; insulated; 60 mm long; black

Subject to changes. Please also observe the further product documentation!



Item no.: 2009-414
Push-in type wire jumper; 1.5 mm²; insulated; 110 mm long; black



Item no.: 2009-414/000-005
Push-in type wire jumper; 1.5 mm²; insulated; 110 mm long; black



Item no.: 2009-414/000-006
Push-in type wire jumper; insulated; 110 mm long; black



Item no.: 2009-416
Push-in type wire jumper; 1.5 mm²; insulated; 250 mm long; black

Jumper



Item no.: 2002-400
Continuous jumper; 2-way; insulated; light gray



Item no.: 2002-402
Jumper; 2-way; insulated; light gray



Item no.: 2002-402/000-005
Jumper; 2-way; insulated; red



Item no.: 2002-402/000-006
Jumper; 2-way; insulated; blue



Item no.: 2002-403
Jumper; 3-way; insulated; light gray



Item no.: 2002-403/000-005
Jumper; 3-way; insulated; red



Item no.: 2002-403/000-006
Jumper; 3-way; insulated; blue



Item no.: 2002-404
Jumper; 4-way; insulated; light gray



Item no.: 2002-404/000-005
Jumper; 4-way; insulated; red



Item no.: 2002-404/000-006
Jumper; 4-way; insulated; blue



Item no.: 2002-405
Jumper; 5-way; insulated; light gray

Subject to changes. Please also observe the further product documentation!



Item no.: 2002-405/000-005
Jumper; 5-way; insulated; red



Item no.: 2002-405/000-006
Jumper; 5-way; insulated; blue



Item no.: 2002-405/011-000
Star point jumper; 3-way; insulated; light gray



Item no.: 2002-406
Jumper; 6-way; insulated; light gray



Item no.: 2002-406/000-005
Jumper; 6-way; insulated; red



Item no.: 2002-406/000-006
Jumper; 6-way; insulated; blue



Item no.: 2002-406/020-000
Delta jumper; insulated; light gray



Item no.: 2002-407
Jumper; 7-way; insulated; light gray



Item no.: 2002-407/000-005
Jumper; 7-way; insulated; red



Item no.: 2002-407/000-006
Jumper; 7-way; insulated; blue



Item no.: 2002-408
Jumper; 8-way; insulated; light gray



Item no.: 2002-408/000-005
Jumper; 8-way; insulated; red



Item no.: 2002-408/000-006
Jumper; 8-way; insulated; blue



Item no.: 2002-409
Jumper; 9-way; insulated; light gray

Subject to changes. Please also observe the further product documentation!



Item no.: 2002-409/000-005
Jumper; 9-way; insulated; red



Item no.: 2002-409/000-006
Jumper; 9-way; insulated; blue



Item no.: 2002-410
Jumper; 10-way; insulated; light gray



Item no.: 2002-410/000-005
Jumper; 10-way; insulated; red



Item no.: 2002-410/000-006
Jumper; 10-way; insulated; blue



Item no.: 2002-423
Continuous jumper; from 1 to 3; insulated; light gray



Item no.: 2002-423/000-005
Continuous jumper; from 1 to 3; insulated; red



Item no.: 2002-423/000-006
Continuous jumper; from 1 to 3; insulated; blue



Item no.: 2002-433
Jumper; from 1 to 3; insulated; light gray



Item no.: 2002-434
Jumper; from 1 to 4; insulated; light gray



Item no.: 2002-435
Jumper; from 1 to 5; insulated; light gray



Item no.: 2002-436
Jumper; from 1 to 6; insulated; light gray



Item no.: 2002-437
Jumper; from 1 to 7; insulated; light gray



Item no.: 2002-438
Jumper; from 1 to 8; insulated; light gray



Item no.: 2002-439
Jumper; from 1 to 9; insulated; light gray



Item no.: 2002-440
Jumper; from 1 to 10; insulated; light gray

Subject to changes. Please also observe the further product documentation!

**Item no.: 2002-472**

Staggered jumper; 2-way; insulated; light gray

**Item no.: 2002-473**

Staggered jumper; 3-way; insulated; light gray

Item no.: 2002-473/011-000

Staggered jumper; 2-way; from 1 to 3; insulated; light gray

**Item no.: 2002-474**

Staggered jumper; 4-way; insulated; light gray

**Item no.: 2002-475**

Staggered jumper; 5-way; insulated; light gray

Item no.: 2002-475/011-000

Staggered jumper; 3-way; insulated; light gray

**Item no.: 2002-476**

Staggered jumper; 6-way; insulated; light gray

**Item no.: 2002-477**

Staggered jumper; 7-way; insulated; light gray

**Item no.: 2002-477/011-000**

Staggered jumper; insulated; light gray

**Item no.: 2002-478**

Staggered jumper; 8-way; insulated; light gray

**Item no.: 2002-479**

Staggered jumper; 9-way; insulated; light gray

Item no.: 2002-479/011-000

Staggered jumper; insulated; light gray

**Item no.: 2002-480**

Staggered jumper; 10-way; insulated; light gray

**Item no.: 2002-481**

Staggered jumper; 11-way; insulated; light gray

Item no.: 2002-481/011-000

Staggered jumper; insulated; light gray

**Item no.: 2002-482**

Staggered jumper; 12-way; insulated; light gray

Item no.: 2002-492

Subject to changes. Please also observe the further product documentation!



Vertical jumper; insulated; light gray



Item no.: 2002-492/000-012

Vertical jumper; insulated; orange



Item no.: 210-103

Wire commoning chain; insulated; black



Item no.: 210-123

Wire commoning chain; insulated; blue

Marking accessories



Item no.: 2002-121

Adaptor



Item no.: 2002-161

Adaptor



Item no.: 2009-110

Marking strips; on reel; not stretchable; plain; snap-on type; white



Item no.: 2009-115

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; white



Item no.: 2009-115/000-002

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; yellow



Item no.: 2009-115/000-005

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; red



Item no.: 2009-115/000-006

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; blue



Item no.: 2009-115/000-007

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; gray



Item no.: 2009-115/000-012

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; orange



Item no.: 2009-115/000-017

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; light green



Item no.: 2009-115/000-023

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; green

Subject to changes. Please also observe the further product documentation!

**Item no.: 2009-115/000-024**

WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; violet

**Item no.: 2009-135**

WMB-Inline; for Smart Printer; on reel; stretchable 5 - 5.2 mm; plain; snap-on type; white

**Item no.: 2009-145**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; white

**Item no.: 2009-145/000-002**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; yellow

**Item no.: 2009-145/000-005**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; red

**Item no.: 2009-145/000-006**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; blue

**Item no.: 2009-145/000-007**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; gray

**Item no.: 2009-145/000-012**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; orange

**Item no.: 2009-145/000-023**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; green

**Item no.: 2009-145/000-024**

Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; violet

**Item no.: 2009-191**

Group marker carrier

**Item no.: 2009-192**

Group marker carrier

**Item no.: 2009-193**

Group marker carrier

**Item no.: 2009-198**

Adaptor

**Item no.: 248-501**

Miniature WSB Quick marking system; plain; Marker width 5 mm; 10 strips with 10 markers per card

Subject to changes. Please also observe the further product documentation!



Item no.: 248-501/000-002

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; yellow



Item no.: 248-501/000-005

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; red



Item no.: 248-501/000-006

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; blue



Item no.: 248-501/000-007

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; gray



Item no.: 248-501/000-012

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; orange



Item no.: 248-501/000-017

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; light green



Item no.: 248-501/000-023

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; green



Item no.: 248-501/000-024

Mini-WSB marking card; as card; not stretchable; plain; snap-on type; violet



Item no.: 793-501

WMB marking card; as card; not stretchable; plain; snap-on type; white



Item no.: 793-501/000-002

WMB marking card; as card; not stretchable; plain; snap-on type; yellow



Item no.: 793-501/000-005

WMB marking card; as card; not stretchable; plain; snap-on type; red



Item no.: 793-501/000-006

WMB marking card; as card; not stretchable; plain; snap-on type; blue



Item no.: 793-501/000-007

WMB marking card; as card; not stretchable; plain; snap-on type; gray



Item no.: 793-501/000-012

WMB marking card; as card; not stretchable; plain; snap-on type; orange

Subject to changes. Please also observe the further product documentation!

**Item no.: 793-501/000-017**

WMB marking card; as card; not stretchable; plain; snap-on type; light green

**Item no.: 793-501/000-023**

WMB marking card; as card; not stretchable; plain; snap-on type; green

**Item no.: 793-501/000-024**

WMB marking card; as card; not stretchable; plain; snap-on type; violet

**Item no.: 793-5501**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; white

**Item no.: 793-5501/000-002**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; yellow

**Item no.: 793-5501/000-005**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; red

**Item no.: 793-5501/000-006**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; blue

**Item no.: 793-5501/000-007**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; gray

**Item no.: 793-5501/000-012**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; orange

**Item no.: 793-5501/000-014**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; brown

**Item no.: 793-5501/000-017**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; green

**Item no.: 793-5501/000-023**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; light green

**Item no.: 793-5501/000-024**

WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; plain; snap-on type; violet

check



Item no.: 2002-611
TOPJOB®S L-type test plug module; modular; 1-pole; 2,50 mm²; gray



Item no.: 2002-649
TOPJOB®S L-type spacer module; modular; e.g., for bridging commoned terminal blocks; gray



Item no.: 2009-174
Test plug adapter; for 4 mm Ø test plugs; for testing TOPJOB®S rail-mounted terminal blocks; gray



Item no.: 2009-182
Testing tap; for max. 2.5 mm²; tool-free connection for individual test wires 0.08 - 2.5 mm; gray

Downloads

CAD/CAE-Data

CAD data

2D/3D Models 2002-2221/1000-413

CAE data

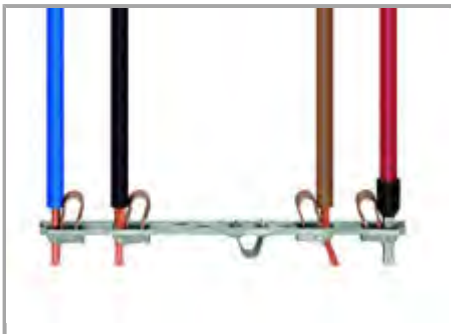
EPLAN Data Portal 2002-2221/1000-413

WSCAD Universe 2002-2221/1000-413

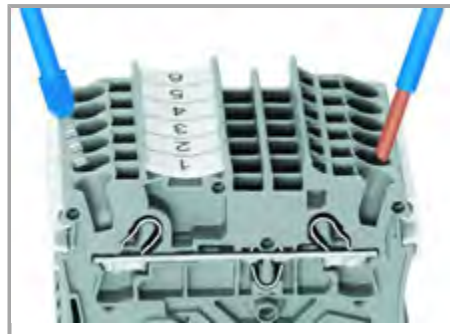
ZUKEN Portal 2002-2221/1000-413

Installation Notes

Conductor termination

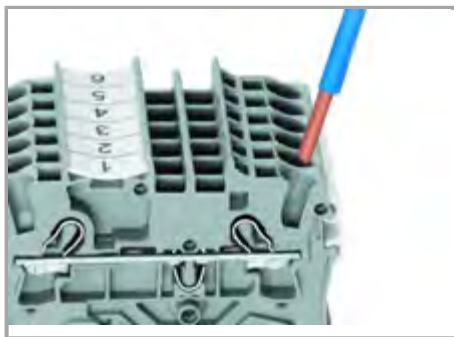


All conductor types at a glance

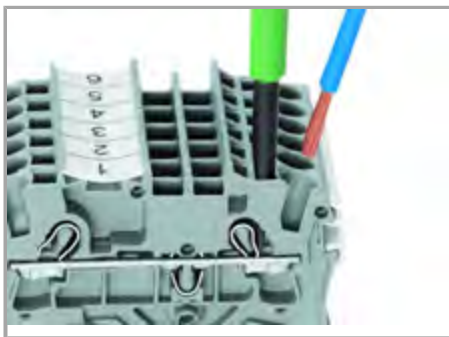


Terminating solid and ferruled conductors via push-in connection.

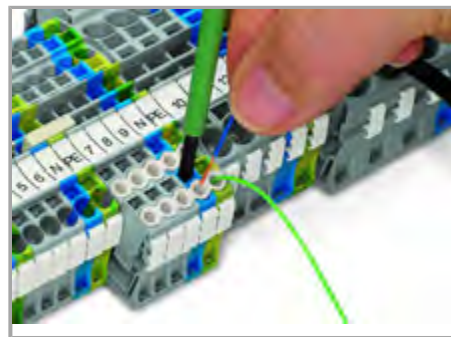
Subject to changes. Please also observe the further product documentation!



Inserting conductors via push-in termination.



Inserting a conductor via operating tool.



Conductor termination – Insulation stop.

Solid conductors with cross-sections from either one size above, or up to two sizes below, the rated cross-section can be simply pushed in – no tools needed.

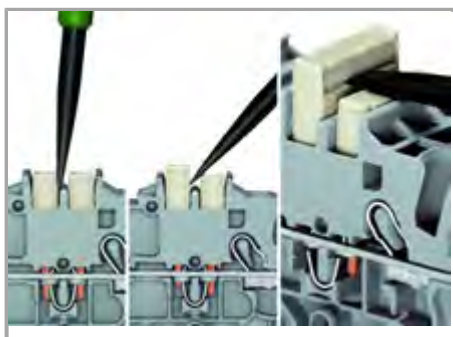
Connecting fine-stranded conductors without ferrules, or small cross-sectional conductors that cannot be pushed in, is performed similarly to the original CAGE CLAMP® – just use an operating tool.

The smart feature:

To open the clamp, the operating tool is inserted vertically. The conductor entry is less than 15 degrees for easier wiring.

Commoning

Subject to changes. Please also observe the further product documentation!



Removing a push-in type jumper bar.

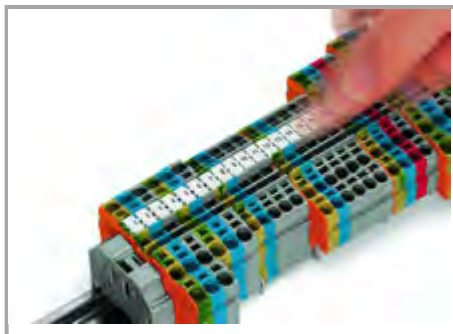
Insert the operating tool between the jumper and the partition wall of the dual jumper slots, then lift up the jumper.

Place the operating tool in the center of jumpers up to five contacts (see above), or alternately on both sides for jumpers with more than five contacts.

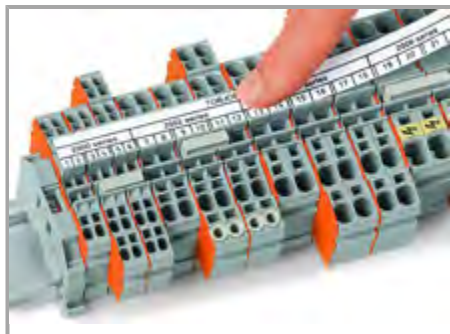


The push-in type jumper bar system is based on the common plug and socket principle. Each terminal block is spring-loaded with a double socket and a resilient CrNi steel spring. The jumper contact material is pure electrolytic copper, which allows for an extremely small design capable of carrying the full-rated current of the terminal block. Ground terminal blocks can also be commoned using the same jumper system. Custom jumpers are created by breaking and removing jumper contacts (2000, 2001, 2002, 2004 Series).

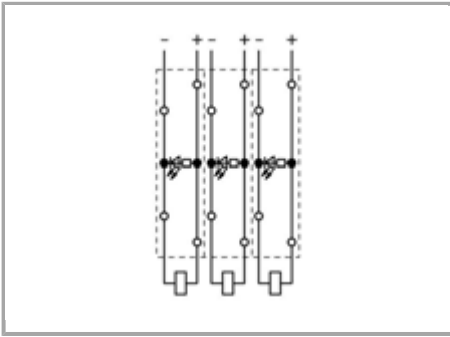
Marking



Snapping WMB Inline markers into marker slots.



Subject to changes. Please also observe the further product documentation!



Circuit-related voltage indications can be created using the following terminal blocks:

2002-2221/1000-434 or 2002-2221/1000-413

Product family

TOPJOB® S

TOPJOB® S: In various industrial applications and modern building installations, WAGO's wide and versatile range of rail-mount terminal blocks provides more than just reliable electrical connections.

[Show all products from the family](#)

Subject to changes. Please also observe the further product documentation!