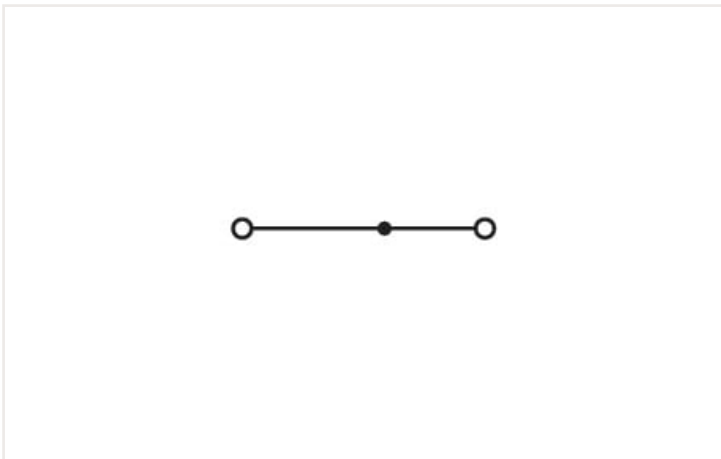
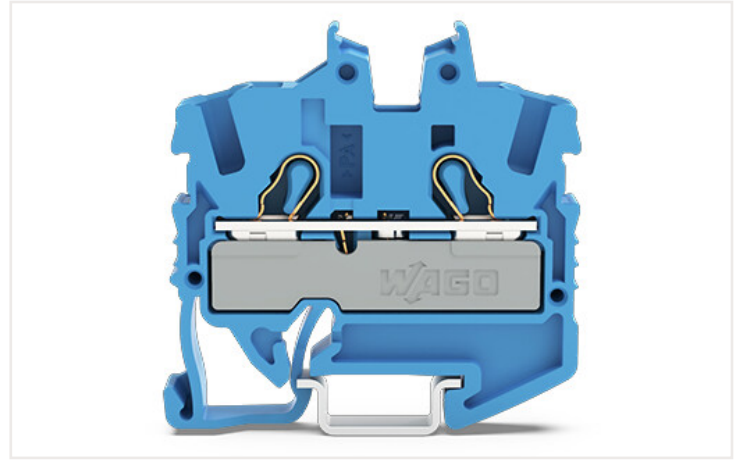
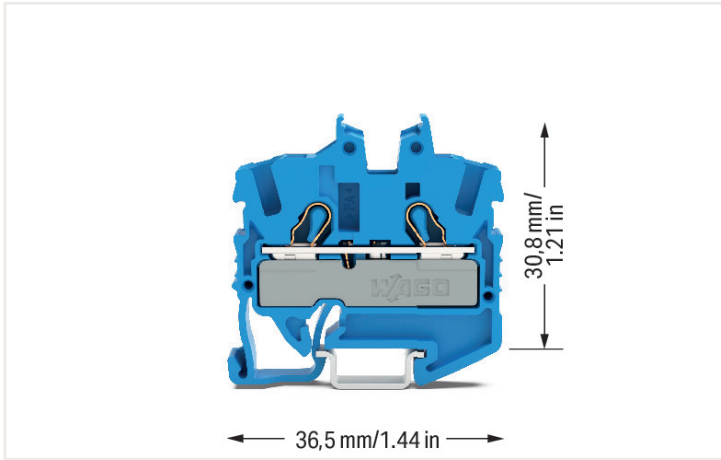


Data sheet | Item number: 2052-1204

2-conductor miniature through terminal block; with operating slots; 2.5 mm²; with test port; side and center marking; for DIN-15 rail; Push-in CAGE CLAMP®; 2,50 mm²; blue



Electrical data

Ratings per IEC/EN	
Ratings per	IEC/EN 60947-7-1
Nominal voltage (III/3)	800 V
Rated impulse voltage (III/3)	8 kV
Rated current	24 A
Rated current 2	32 A
Legend (ratings)	(III / 3) ≙ Overvoltage category III / Pollution degree 3

Ratings per UL	
Approvals per	UL 1059
Rated voltage UL (Use Group B)	600 V
Rated current UL (Use Group B)	20 A
Rated voltage UL (Use Group C)	600 V
Rated current UL (Use Group C)	20 A

Ratings per CSA

Approvals per	CSA 22.2 No 158
Rated voltage CSA (Use Group B)	600 V
Rated current CSA (Use Group B)	20 A
Rated voltage CSA (Use Group C)	600 V
Rated current CSA (Use Group C)	20 A

Ex information

Reference hazardous areas	See Downloads – Documentation – Additional Information: Technical Section; Technical explanations
Ratings per	ATEX: PTB 20 ATEX 1013 U / IECEx: PTB 20.0029U (Ex eb IIC Gb)
Rated voltage EN (Ex e II)	550 V
Rated current (Ex e II)	22 A
Rated current (Ex e II) with jumper	20 A

Power loss

Power loss, per pole (potential)	0.7661 W
Rated current I_N for specified power loss	24 A
Resistance value for specified, current-dependent power loss	0.00133 Ω

Connection data

Total number of connection points	2
Total number of potentials	1
Number of levels	1
Number of jumper slots	1

Connection 1

Connection technology	Push-in CAGE CLAMP®
Actuation type	Push-in Operating tool
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	1 ... 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
Note (conductor cross-section)	Depending on the conductor characteristic, a conductor with a smaller cross-section can also be inserted via push-in termination.
Strip length	10 ... 12 mm / 0.39 ... 0.47 inches
Wiring direction	Front-entry wiring

Physical data

Width	5.2 mm / 0.205 inches
Height	36.5 mm / 1.437 inches
Depth from upper-edge of DIN-rail	30.8 mm / 1.213 inches

Mechanical data

Mounting type	DIN-15 rail
Marking level	Center/side marking

Material data

Note (material data)	Information on material data can be found here
Color	blue
Material group	I
Insulation material	Polyamide (PA66)
Flammability class per UL94	V0
Fire load	0.093 MJ
Weight	4.3 g

Environmental requirements

Processing temperature	-35 ... +85 °C
Continuous operating temperature	-60 ... +105 °C

Commercial data

ETIM 8.0	EC000897
ETIM 7.0	EC000897
PU (SPU)	100 Pieces
Country of origin VKOrg Germany	DE
GTIN	4055144094503
Customs tariff number VKOrg Germany	85369010000

Approvals and certificates

Ex-Approvals



Approval	Standard	Certificate name
AEx Underwriters Laboratories Inc.	UL 60079	E185892 (AEx eb IIC resp. Ex eb IIC)
ATEX Physikalisch Technische Bundesanstalt	EN IEC 60079-0	PTB 20 ATEX 1013 U (II 2 G Ex eb IIC Gb bzw. I M 2 Ex eb I Mb)
IECEX Physikalisch Technische Bundesanstalt	IEC 60079	IECEX PTB 20.0029 U (Ex eb IIC Gb resp. Ex eb I Mb)

Country specific Approvals



Approval	Standard	Certificate name
CCA DEKRA Certification B.V.	EN 60947	NTR NL 7884
CCA DEKRA Certification B.V.	EN 60998	NTR NL 7885
CSA DEKRA Certification B.V.	C22.2	80058059
KEMA/KEUR DEKRA Certification B.V.	EN 60947	71-119664
KEMA/KEUR DEKRA Certification B.V.	EN 60998	71-119680

UL-Approvals



Approval	Standard	Certificate name
UL Underwriters Laboratories Inc.	UL 1059	E45172

Downloads

Environmental Product Compliance

Compliance Search

Environmental Product
Compliance 2052-1204



Documentation

Additional Information		
Technical Section	pdf 2142.18 KB	

CAD/CAE-Data

CAD data		
2D/3D Models 2052-1204		

CAE data		
EPLAN Data Portal 2052-1204		
ZUKEN Portal 2052-1204		

1 Compatible products

1.1 Required accessories

1.1.1 End plate

1.1.1.1 End plate



[Item no.: 2052-1291](#)
End plate; gray

1.2 Optional accessories

1.2.1 DIN-rail

1.2.1.1 Mounting accessories



[Item no.: 210-296](#)
Aluminum carrier rail; 15 x 5.5 mm; 1 mm thick; 2 m long; unslotted; similar to EN 60715; silver-colored



[Item no.: 210-111](#)
Steel carrier rail; 15 x 5.5 mm; 1 mm thick; 2 m long; slotted; according to EN 60715; silver-colored



[Item no.: 210-295](#)
Steel carrier rail; 15 x 5.5 mm; 1 mm thick; 2 m long; unslotted; according to EN 60715; silver-colored

1.2.2 Ferrule

1.2.2.1 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.: 216-242](#)
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; 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.: 216-263](#)
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.: 216-244](#)
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.: 216-246](#)
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

1.2.2.1 Ferrule



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

1.2.3 Installation

1.2.3.1 Mounting accessories



Item no.: 709-169

Cover carrier; Type 3; gray



Item no.: 709-156

Cover; Type 3; suitable for cover carrier, type 3; 1 m long; transparent



Item no.: 249-101

Screwless end stop; 6 mm wide; for WMB markers; gray

1.2.4 Insulation stop

1.2.4.1 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

1.2.5 Jumper

1.2.5.1 Jumper



Item no.: 2002-400

Continuous jumper; 2-way; insulated; light gray



Item no.: 2002-423/000-006

Continuous jumper; from 1 to 3; 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.: 2002-406/020-000

Delta jumper; insulated; light gray



Item no.: 2002-410/000-006

Jumper; 10-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.: 2002-402/000-006

Jumper; 2-way; insulated; blue



Item no.: 2002-402

Jumper; 2-way; insulated; light gray



Item no.: 2002-402/000-005

Jumper; 2-way; insulated; red



Item no.: 2002-403/000-006

Jumper; 3-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.: 2002-404/000-006

Jumper; 4-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.: 2002-405/000-006

Jumper; 5-way; insulated; blue



Item no.: 2002-405

Jumper; 5-way; insulated; light gray



Item no.: 2002-405/000-005

Jumper; 5-way; insulated; red



Item no.: 2002-406/000-006

Jumper; 6-way; insulated; blue



Item no.: 2002-406

Jumper; 6-way; insulated; light gray



Item no.: 2002-406/000-005

Jumper; 6-way; insulated; red



Item no.: 2002-407/000-006

Jumper; 7-way; insulated; blue



Item no.: 2002-407

Jumper; 7-way; insulated; light gray



Item no.: 2002-407/000-005

Jumper; 7-way; insulated; red



Item no.: 2002-408/000-006
































Jumper; 8-way; insulated; blue



Item no.: 2002-408




Jumper; 8-way; insulated; light gray

1.2.5.1 Jumper









 Item no.: 2002-408/000-005 Jumper; 8-way; insulated; red	 Item no.: 2002-409/000-006 Jumper; 9-way; insulated; blue	 Item no.: 2002-409 Jumper; 9-way; insulated; light gray	 Item no.: 2002-409/000-005 Jumper; 9-way; insulated; red
 Item no.: 2002-440 Jumper; from 1 to 10; insulated; light gray	 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.: 2002-480 Staggered jumper; 10-way; insulated; light gray	 Item no.: 2002-481 Staggered jumper; 11-way; insulated; light gray	 Item no.: 2002-482 Staggered jumper; 12-way; insulated; light gray	 Item no.: 2002-473/011-000 Staggered jumper; 2-way; from 1 to 3; insulated; light gray
 Item no.: 2002-472 Staggered jumper; 2-way; insulated; light gray	 Item no.: 2002-473 Staggered jumper; 3-way; insulated; light gray	 Item no.: 2002-475/011-000 Staggered jumper; 3-way; 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.: 2002-476 Staggered jumper; 6-way; insulated; light gray	 Item no.: 2002-477 Staggered jumper; 7-way; 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.: 2002-477/011-000 Staggered jumper; insulated; light gray	 Item no.: 2002-479/011-000 Staggered jumper; insulated; light gray	 Item no.: 2002-481/011-000 Staggered jumper; insulated; light gray
 Item no.: 2002-405/011-000 Star point jumper; 3-way; insulated; light gray	 Item no.: 210-103 Wire commoning chain; insulated; black	 Item no.: 210-123 Wire commoning chain; insulated; blue	

1.2.6 Marking

1.2.6.1 Group marker carrier

 Item no.: 2009-191 Group marker carrier; gray	 Item no.: 2009-192 Group marker carrier; gray	 Item no.: 2009-193 Group marker carrier; gray
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1.2.6.2 Marker

 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.: 2009-145/000-023 Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; green	 Item no.: 2009-145/000-012 Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; orange
 Item no.: 2009-145/000-005 Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; red	 Item no.: 2009-145/000-024 Mini-WSB Inline; for Smart Printer; 1700 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; violet	 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

1.2.6.2 Marker



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.: 248-501/000-023
Mini-WSB marking card; as card; not stretchable; plain; snap-on type; green



Item no.: 248-501/000-017
Mini-WSB marking card; as card; not stretchable; plain; snap-on type; light green



Item no.: 248-501/000-012
Mini-WSB marking card; as card; not stretchable; plain; snap-on type; orange



Item no.: 248-501/000-005
Mini-WSB marking card; as card; not stretchable; plain; snap-on type; red



Item no.: 248-501/000-024
Mini-WSB marking card; as card; not stretchable; plain; snap-on type; violet



Item no.: 248-501
Mini-WSB marking card; as card; not stretchable; plain; snap-on type; white



Item no.: 248-501/000-002
Mini-WSB marking card; as card; not stretchable; plain; snap-on type; yellow



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.: 793-5501/000-014
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.: 793-5501/000-007
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.: 793-5501/000-023
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.: 793-5501/000-017
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.: 793-5501/000-012
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.: 793-5501/000-005
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.: 793-5501/000-024
WMB marking card; as card; for terminal block width 5 - 17.5 mm; stretchable 5 - 5.2 mm; 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.: 793-501/000-006
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.: 793-501/000-023
WMB marking card; as card; not stretchable; plain; snap-on type; green



Item no.: 793-501/000-017
WMB marking card; as card; not stretchable; plain; snap-on type; light green



Item no.: 793-501/000-012
WMB marking card; as card; not stretchable; plain; snap-on type; orange



Item no.: 793-501/000-005
WMB marking card; as card; not stretchable; plain; snap-on type; red



Item no.: 793-501/000-024
WMB 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.: 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.: 2009-115/000-023
WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; green



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.: 2009-115/000-012
WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; orange



Item no.: 2009-115/000-005
WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; red



Item no.: 2009-115/000-024
WMB-Inline; for Smart Printer; 1500 pieces on roll; stretchable 5 - 5.2 mm; plain; snap-on type; violet



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

1.2.6.3 Marker carrier



Item no.: 2002-161

Adaptor; gray

Item no.: 2009-198

Adaptor; gray

1.2.6.4 Marking strip



Item no.: 2009-110

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

1.2.7 Protective warning marker

1.2.7.1 Cover



Item no.: 2002-115

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

1.2.8 Push-in type wire jumper

1.2.8.1 Jumper



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.: 2009-416

Push-in type wire jumper; 1.5 mm²; insulated; 250 mm long; black



Item no.: 2009-414/000-006

Push-in type wire jumper; insulated; 110 mm long; black



Item no.: 2009-412

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

1.2.9 Test and measurement

1.2.9.1 Testing accessories



Item no.: 2009-174

Test plug adapter; for 4 mm Ø test plugs; for testing TOPJOB®S rail-mounted terminal blocks; gray



Item no.: 210-136

Test plug; 2 mm Ø; with 500 mm cable; red



Item no.: 2009-182

Testing tap; for max. 2.5 mm²; tool-free connection for individual test wires 0.08 - 2.5 mm; gray



Item no.: 2002-649

TOPJOB®S L-type spacer module; modular; e.g., for bridging commoned terminal blocks; gray



Item no.: 2002-611

TOPJOB®S L-type test plug module; modular; 1-pole; 2,50 mm²; gray

1.2.10 Tool

1.2.10.1 Operating tool



Item no.: 210-658

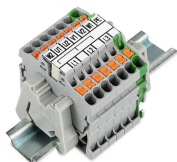
Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; angled; short; multicoloured

Item no.: 210-720

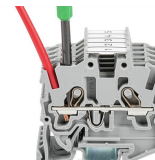
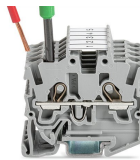
Operating tool; Blade: 3.5 x 0.5 mm; with a partially insulated shaft; multicoloured

Installation notes

Installation



Conductor termination



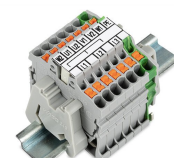
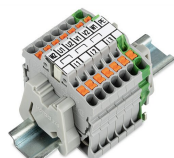
Insert solid conductors via push-in termination.

Insert ferruled conductors via push-in termination.

Insert fine-stranded conductors via operating tool.

Remove all conductors via operating tool.

Commoning



Insert a delta jumper and push down until it hits the backstop (example shows terminal blocks with push-buttons).

Marking strip (2009-110) inserted in the marking slot with jumper symbols of the inserted jumper (delta jumper) (example shows terminal blocks with push-buttons)

Insert a star point jumper and push down until it hits the backstop (example shows terminal blocks with push-buttons).

Marking strip (2009-110) inserted in the marking slot with jumper symbols of the inserted jumper (2000-405/011-000 Delta Jumper) (example shows terminal blocks with push-buttons)

Testing



Testing with a 2 mm Ø 210-136 Test Plug (max. 42 V).

Marking



Snapping a marking strip into the marker slot.

Snapping a marking strip (2009-110) into a marker slot.