

gesis[®]RST[®]MINI
Smallest pluggable installation connector
with highest IP rating





RST® MINI connectors

Table of contents

The RST® family Pluggable in many dimensions	4
RST® MINI Optimized for installation in confined spaces	5
RST® plug & play Simple and functional	6 – 7
RST16i3/2 Applications	8 – 9
RST16i3/2 Components	10 – 15
RST16i5/4 Applications	16 – 17
RST16i5/4 Components	18 – 22
RST® MINI Technical data RST16i3/i5	23
RST16 distributors Compact and multiple distributors	24 – 25
RST16 cables Cable assemblies	26
RST® MINI Technical data	27 – 29
Support Service, information, subsidiaries	30 – 31

Overview of the RST® product family

Pluggable in many dimensions

Since its market launch the **RST®** installation system has systematically grown with the needs of the market and now presents itself as a complete electrical installation system. A choice can be made between three series as required:

NEW

RST® MINI

RST MINI Little connectors for extremely confined spaces

2- to 5-pole design,
250V/400V, 16A



RST® CLASSIC

All-rounders with the most comprehensive portfolio

2- to 5-pole design,
250/400V, 20 – 32A



RST® POWER

High-current connectors for large cross-sections

4- and 5-pole design,
250/400V, 50A



Further information can be found in the catalogue with order no. 0690.1 or in our service/download section at www.wieland-electric.com

All installation connectors have one thing in common: They are innately fitter-friendly and adhere strictly to the system philosophy. Complex installations can be built flexibly, and consumers can simply be plugged into the installation. Mechanical codings within the product lines ensure a clear distinction between different circuits. This practically rules out incorrect connections.

The new RST® MINI connector series

Optimized for installation in confined spaces

The new **RST®** MINI series marks a continuation of the story of the **RST®** installation system's success and logically follows the trend towards compact designs.

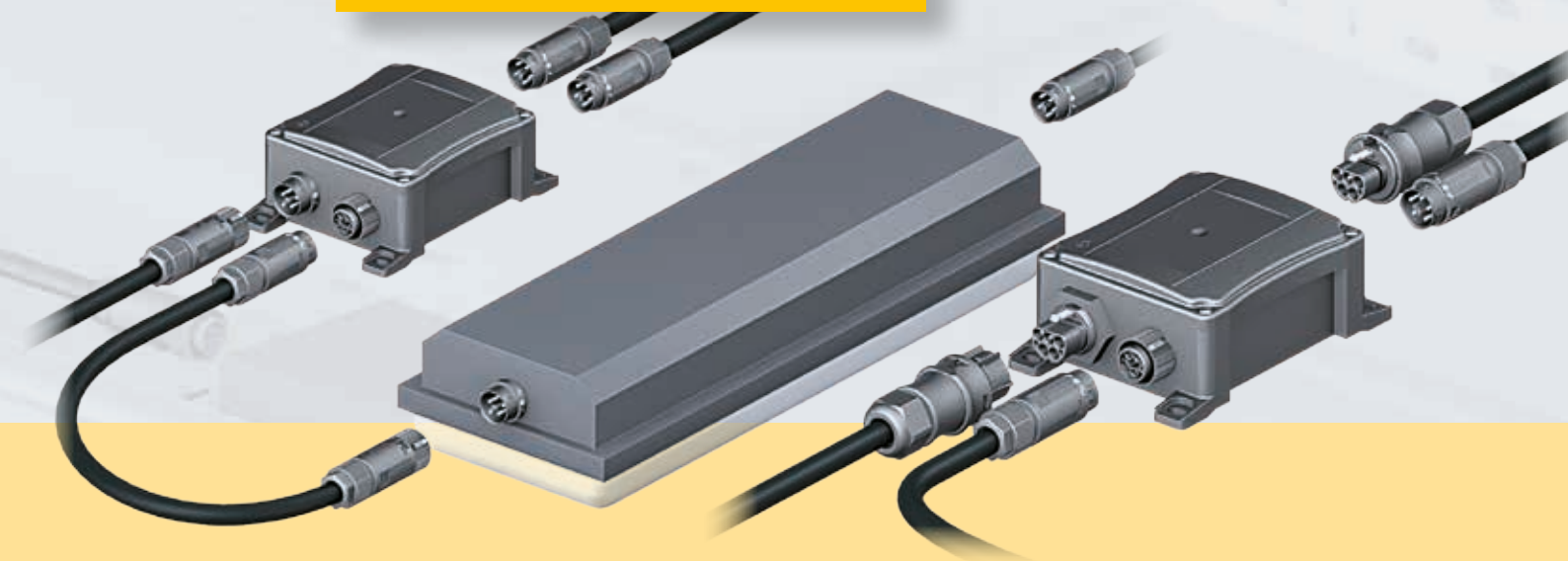
The 2 to 5 pole plug connectors and device connectors have been designed for 250/400V and 16A and are all available in the screw connection technology that electricians trust.

Customized distributors as well as pre-assembled cables round the system off perfectly and offer a huge range of different possible uses, not just in building automation or industry.



Benefits at a glance

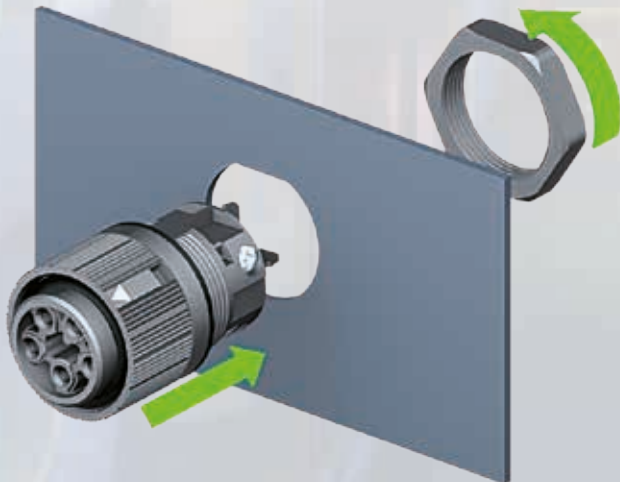
- TWISTLOCK technology
- Compact design
- Color-coded and mechanically coded
- Easy to install
- Save up to 80% of installation time



RST® MINI plug & play Simple and functional

Easy assembly

The housing of the connector has been designed in two parts and geared toward simple assembly right from the outset. The connector dispenses with the common technique of screwing individual parts and relies on an easy-to-use quick fastener.

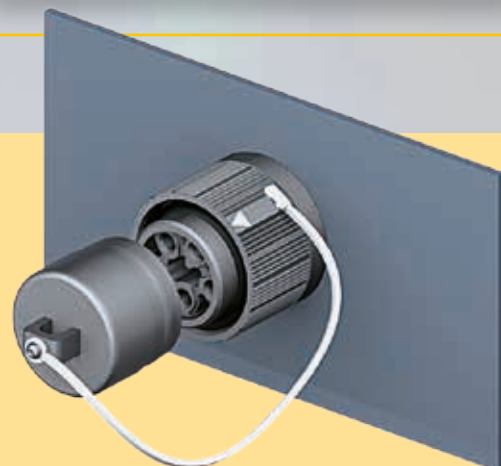


Retrofitting made easy

The device connectors have M20.2 (5/4 pole) or M16 (3/2 pole) threads. This means they can be directly integrated in M20 or M16 housing feed-throughs – taking the tolerances into account. It is therefore easy to switch from traditional cable glands to the convenient pluggable alternative. There is the option of using a flattened top on the thread of the device connector to fix it in position.

Safe and secure

Unused slots must be protected against moisture and dirt penetration. The end caps for unused slots are joined to the connector directly using a strap and are therefore protected against loss.



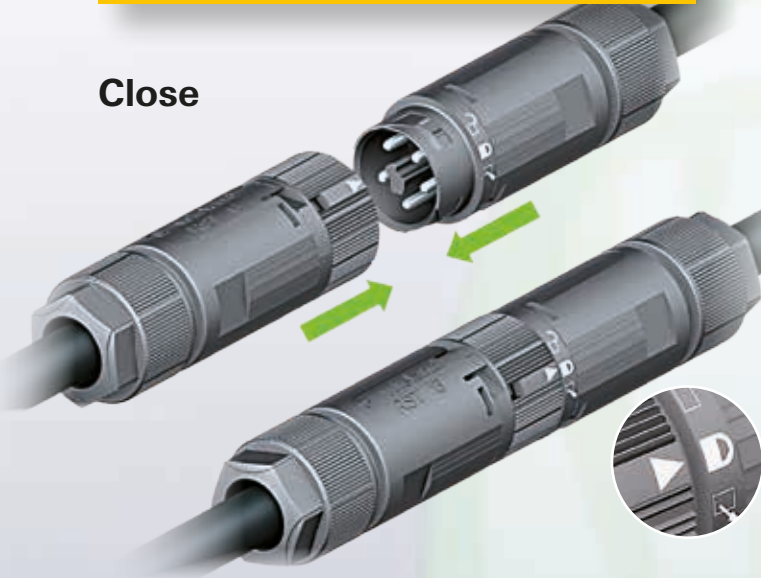
TWISTLOCK technology

With the smart TWISTLOCK locking mechanism, the connectors lock automatically when plugged together and give the user clear feedback on the correct end position. A slight rotation severs the connection easily.

Open



Close



automatic locking mechanism



Close

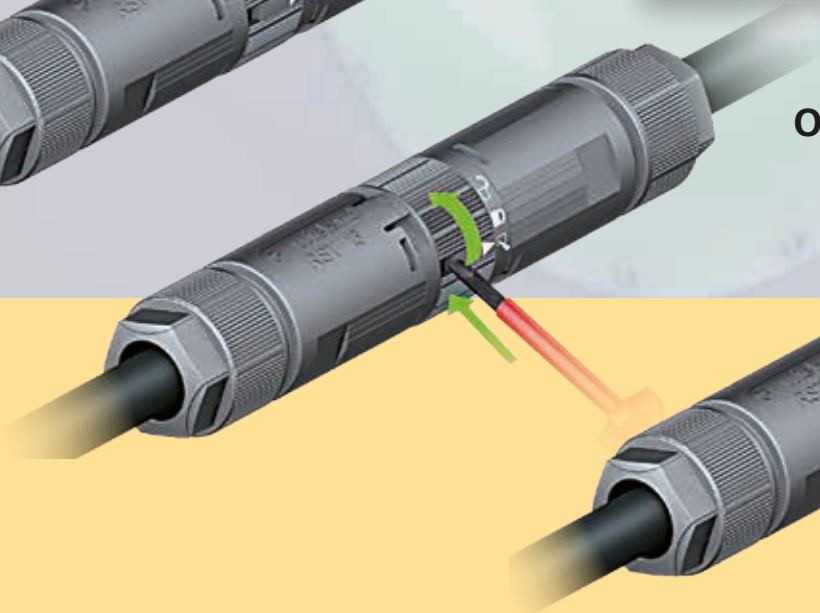
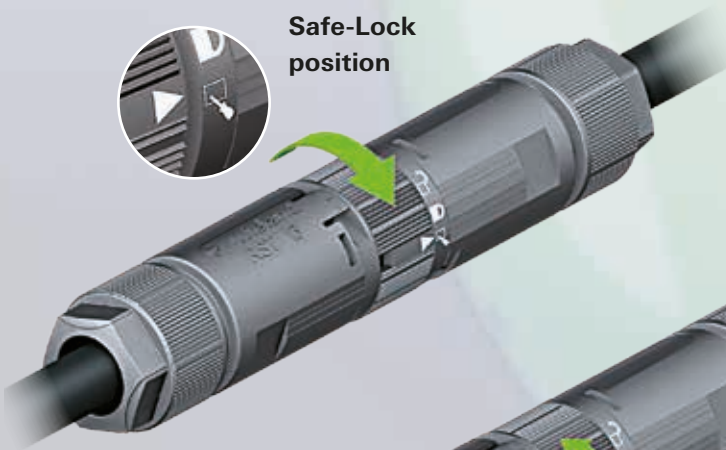
Safe-Lock position

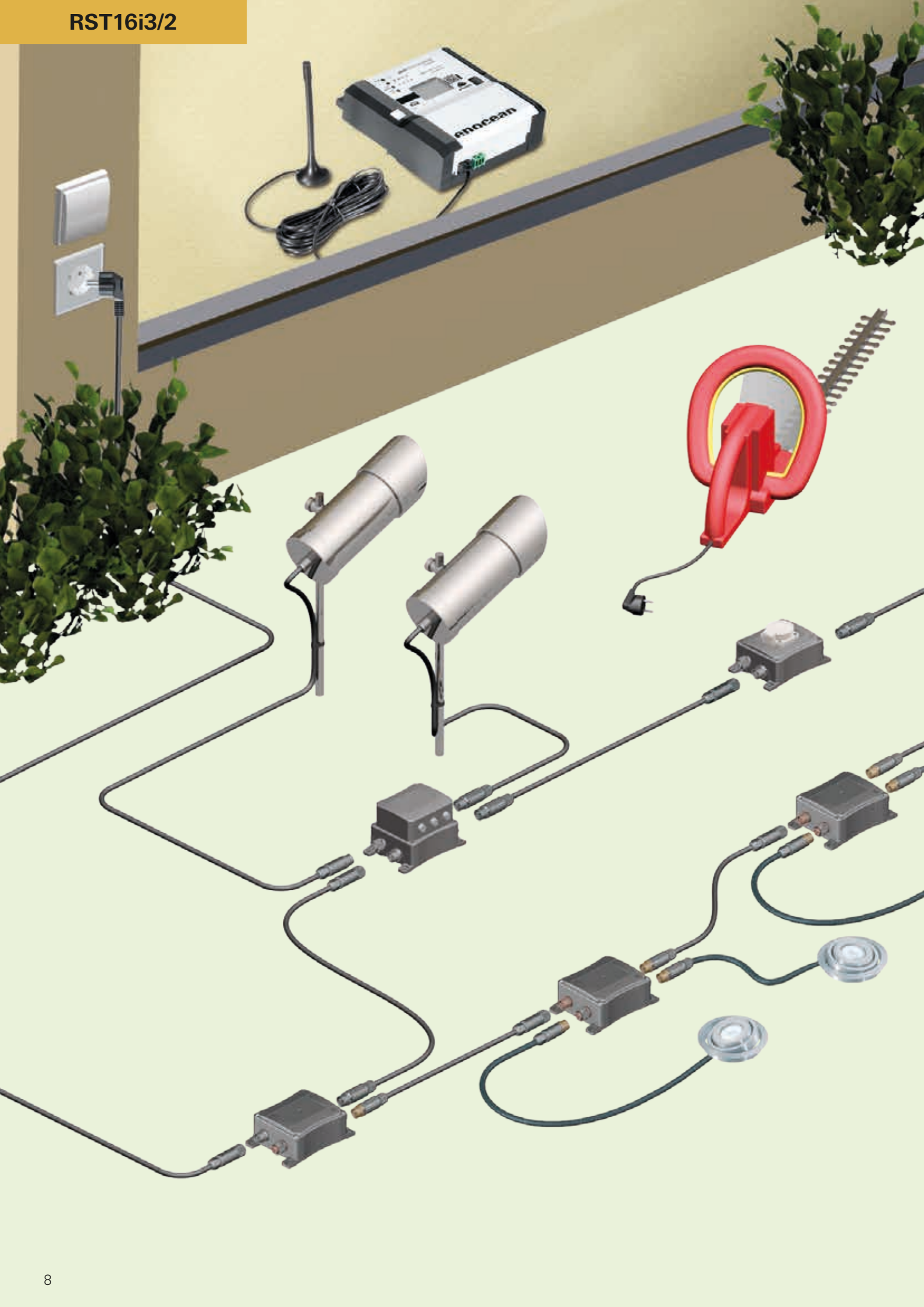


SAFE-LOCK – more safety

For any application that requires a tool to be used to loosen the connection, there is the so-called Safe-Lock position.

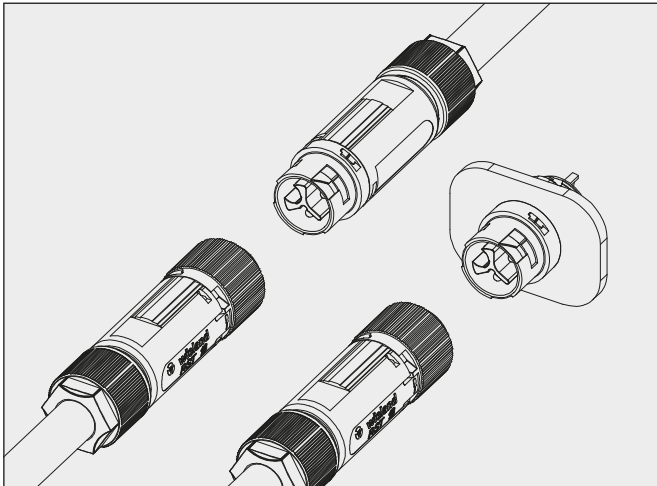
Open





The RST16i3/2 product line –mains connection, lighting installation, DALI, DMX, applications in the extra-low voltage range (LED technology), loudspeaker applications

Application example



General

The 3 pole connectors have five available codings. These cover applications relating to the mains connection of electrical consumers, the connection of LED luminaires in the extra-low voltage range, and also the electrification of DALI, DMX, or loudspeaker systems. The main focus is the mains connection of electrical equipment with a compact design. The mechanical codings have the advantage that only associated pairs of male and female connectors can be connected, with the correct polarity ensured. This gives you the security of a clear distinction.

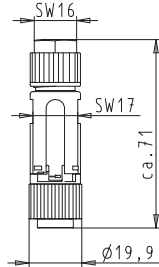
The connectors are also available in a 2 pole variant. This is based on the 3 pole housing, but with one pole not configured.

Coding

	Application	Mains/SKII		250/400V with PE	Extra-low voltage	up to 400V without PE	Dimming
	Mechanical coding, e.g.	L, N, PE		1, 2, PE	1, 2, 3	1, 2, 3	D1, D2, PE
Name	Description	black	light gray	leaf green	signal brown	light blue	turquoise
Connectors		✓	✓	✓	✓	✓	✓
M16 device connectors		✓	✓	✓	✓	✓	✓
Distributors	RST® compact and multiple distributors	✓	✓	✓	✓	✓	✓
	Individual distribution box	Upon request	Upon request	Upon request	Upon request	Upon request	Upon request
Cable assemblies	Device connector cable Male – free end	✓	✓	Upon request	Upon request	Upon request	Upon request
	Connection cable Female – free end	✓	✓	Upon request	Upon request	Upon request	Upon request
	Extension cable Female – male	✓	✓	Upon request	Upon request	Upon request	Upon request

Connectors for Ø 5.0 – 9.5 mm² cables

Female connector

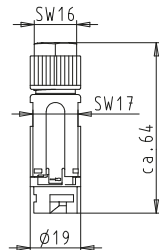


Rated values

Rated voltage	400V
Rated current	16A
Rated cross-section	0.25 to 1.5 mm ² (up to 1.0 mm ² suitable for ferrules)
Approvals	VDE, UL and CSA being prepared

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		L, N, PE	black light gray	46.031.4553.1 46.031.4553.0
SKII		L, N	black light gray	46.031.4554.1 46.031.4554.0
250/400V with PE		1, 2, PE	leaf green	46.031.4555.7
up to 400V without PE		1, 2, 3	light blue	46.031.4553.9
up to 400V without PE ¹⁾		1, 2	light blue	46.031.4554.9
Dimming with PE		D1, D2, PE	turquoise	46.031.4550.6
Dimming ¹⁾		D1, D2	turquoise	46.031.4551.6
Extra-low voltage (60V~120V-)		1, 2, 3	signal brown	46.031.4550.4
Extra-low voltage ¹⁾ (60V~120V-)		1, 2	signal brown	46.031.4551.4

Male connector



Rated values

Rated voltage	400V
Rated current	16A
Rated cross-section	0.25 to 1.5 mm ² (up to 1.0 mm ² suitable for ferrules)
Approvals	VDE, UL and CSA being prepared

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		L, N, PE	black light gray	46.032.4553.1 46.032.4553.0
SKII		L, N	black light gray	46.032.4554.1 46.032.4554.0
250/400V with PE		1, 2, PE	leaf green	46.032.4555.7
up to 400V without PE		1, 2, 3	light blue	46.032.4553.9
up to 400V without PE ¹⁾		1, 2	light blue	46.032.4554.9
Dimming with PE		D1, D2, PE	turquoise	46.032.4550.6
Dimming ¹⁾		D1, D2	turquoise	46.032.4551.6
Extra-low voltage (60V~120V-)		1, 2, 3	signal brown	46.032.4550.4
Extra-low voltage ¹⁾ (60V~120V-)		1, 2	signal brown	46.032.4551.4

¹⁾ One pole not configured (Observe installation instructions!)

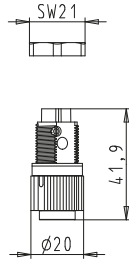
²⁾ Other diameters available upon request

M16 device connectors

Female connector



For housing cut-out see Technical Data



Rated values

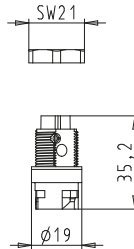
Rated voltage	400V
Rated current	16A
Rated cross-section	0.25 to 1.5 mm ² (up to 1.0 mm ² suitable for ferrules)
Approvals	VDE, UL and CSA being prepared
Wall thicknesses	up to 8 mm

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		L, N, PE	black light gray	46.031.5053.1 46.031.5053.0
SKII		L, N	black light gray	46.031.5054.1 46.031.5054.0
250/400V with PE		1, 2, PE	leaf green	46.031.5055.7
up to 400V without PE		1, 2, 3	light blue	46.031.5053.9
up to 400V without PE ¹⁾		1, 2	light blue	46.031.5054.9
Dimming with PE		D1, D2, PE	turquoise	46.031.5050.6
Dimming ¹⁾		D1, D2	turquoise	46.031.5051.6
Extra-low voltage (60V~120V-)		1, 2, 3	signal brown	46.031.5050.4
Extra-low voltage ¹⁾ (60V~120V-)		1, 2	signal brown	46.031.5051.4

Male connector



For housing cut-out see Technical Data



Rated values

Rated voltage	400V
Rated current	16A
Rated cross-section	0.25 to 1.5 mm ² (up to 1.0 mm ² suitable for ferrules)
Approvals	VDE, UL and CSA being prepared
Wall thicknesses	up to 8 mm

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		L, N, PE	black light gray	46.032.5053.1 46.032.5053.0
SKII		L, N	black light gray	46.032.5054.1 46.032.5054.0
250/400V with PE		1, 2, PE	leaf green	46.032.5055.7
up to 400V without PE		1, 2, 3	light blue	46.032.5053.9
up to 400V without PE ¹⁾		1, 2	light blue	46.032.5054.9
Dimming with PE		D1, D2, PE	turquoise	46.032.5050.6
Dimming ¹⁾		D1, D2	turquoise	46.032.5051.6
Extra-low voltage (60V~120V-)		1, 2, 3	signal brown	46.032.5050.4
Extra-low voltage ¹⁾ (60V~120V-)		1, 2	signal brown	46.032.5051.4

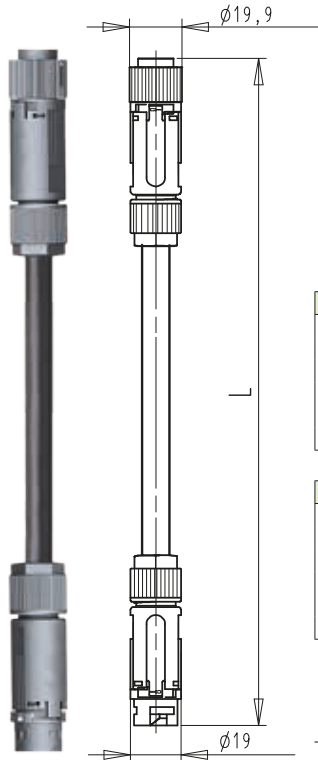
¹⁾ One pole not configured (Observe installation instructions!)

Cable assemblies 1.5 mm², 16 A

Rated values

Wire ends	ultrason. welded
Sheath strip length	35 mm
Wire strip length	9 mm

Connection cables female – male



Mains 250 V
3 pole



Protection class II
2 pole



Extra-low voltage
2 pole

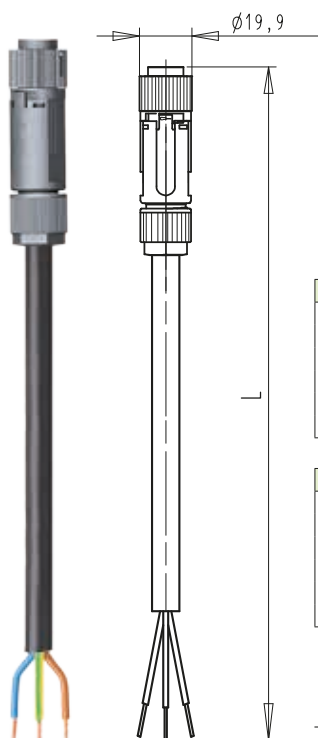


Cable	Length m	Part No.	Part No.	Part No.
PVC cable H05VV-F containing halogen	0.5	46.432.0500.1	46.422.0500.1	46.422.0502.4
	1	46.432.1000.1	46.422.1000.1	46.422.1002.4
	2	46.432.2000.1	46.422.2000.1	46.422.2002.4
	3	46.432.3000.1	46.422.3000.1	46.422.3002.4
	4	46.432.4000.1	46.422.4000.1	46.422.4002.4
5	46.432.5000.1	46.422.5000.1	46.422.5002.4	

Cable	Length m	Part No.	Part No.	Part No.
Rubber-sheathed cable H07RN-F containing halogen	0.5	46.432.0530.1	46.422.0530.1	46.422.0532.4
	1	46.432.1030.1	46.422.1030.1	46.422.1032.4
	2	46.432.2030.1	46.422.2030.1	46.422.2032.4
	3	46.432.3030.1	46.422.3030.1	46.422.3032.4
	4	46.432.4030.1	46.422.4030.1	46.422.4032.4
5	46.432.5030.1	46.422.5030.1	46.422.5032.4	

The 2 pole cables have one pole which is not configured.

Connection cables female – free end



Mains 250 V
3 pole



Protection class II
2 pole



Extra-low voltage
2 pole



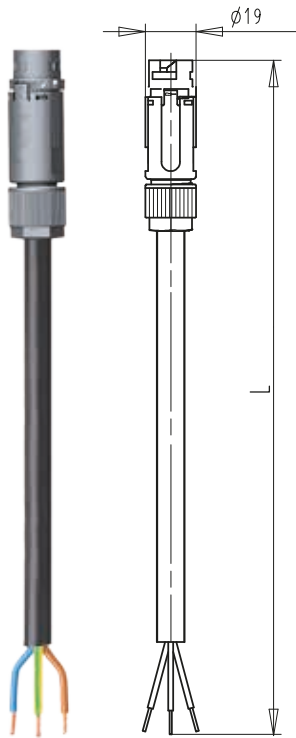
Cable	Length m	Part No.	Part No.	Part No.
PVC cable H05VV-F containing halogen	0.5	46.432.0503.1	46.422.0503.1	46.422.0507.4
	1	46.432.1003.1	46.422.1003.1	46.422.1007.4
	2	46.432.2003.1	46.422.2003.1	46.422.2007.4
	3	46.432.3003.1	46.422.3003.1	46.422.3007.4
	4	46.432.4003.1	46.422.4003.1	46.422.4007.4
5	46.432.5003.1	46.422.5003.1	46.422.5007.4	

Cable	Length m	Part No.	Part No.	Part No.
Rubber-sheathed cable H07RN-F containing halogen	0.5	46.432.0533.1	46.422.0533.1	46.422.0537.4
	1	46.432.1033.1	46.422.1033.1	46.422.1037.4
	2	46.432.2033.1	46.422.2033.1	46.422.2037.4
	3	46.432.3033.1	46.422.3033.1	46.422.3037.4
	4	46.432.4033.1	46.422.4033.1	46.422.4037.4
5	46.432.5033.1	46.422.5033.1	46.422.5037.4	

The 2 pole cables have one pole which is not configured.

Cable assemblies 1.5 mm², 16 A

Connection cables male – free end



Mains 250 V
3 pole



Protection class II
2 pole



Extra-low voltage
2 pole



Cable	Length m	Part No.	Part No.	Part No.
PVC cable H05VV-F containing halogen	0.5	46.432.0504.1	46.422.0504.1	46.422.0508.4
	1	46.432.1004.1	46.422.1004.1	46.422.1008.4
	2	46.432.2004.1	46.422.2004.1	46.422.2008.4
	3	46.432.3004.1	46.422.3004.1	46.422.3008.4
	4	46.432.4004.1	46.422.4004.1	46.422.4008.4
	5	46.432.5004.1	46.422.5004.1	46.422.5008.4

Cable	Length m	Part No.	Part No.	Part No.
Rubber-sheathed cable H07RN-F containing halogen	0.5	46.432.0534.1	46.422.0534.1	46.422.0538.4
	1	46.432.1034.1	46.422.1034.1	46.422.1038.4
	2	46.432.2034.1	46.422.2034.1	46.422.2038.4
	3	46.432.3034.1	46.422.3034.1	46.422.3038.4
	4	46.432.4034.1	46.422.4034.1	46.422.4038.4
	5	46.432.5034.1	46.422.5034.1	46.422.5038.4

The 2 pole cables have one pole which is not configured.

Distributors

RST compact distributor



Rated values

Dimensions (W x L x H)	104 x 162 x 57.2 mm
Input	1
Outputs	3
Pre-wired with	1.5 mm ²
Mounting option	Yes

Application	Coding	Pole marking	Color	Part No.
Mains		L, N, PE	black light gray	46.030.0153.1 46.030.0153.0
SKII		L, N	black light gray	46.030.0154.1 46.030.0154.0
250/400V with PE		1, 2, PE	leaf green	46.030.0155.7
up to 400V without PE		1, 2, 3	light blue	46.030.0153.9
up to 400V without PE ¹⁾		1, 2	light blue	46.030.0154.9
Dimming with PE		D1, D2, PE	turquoise	46.030.0150.6
Dimming ¹⁾		D1, D2	turquoise	46.030.0151.6
Extra-low voltage (60V~120V-)		1, 2, 3	signal brown	46.030.0150.4
Extra-low voltage ¹⁾ (60V~120V-)		1, 2	signal brown	46.030.0151.4

¹⁾ One pole not configured (Observe installation instructions!). For custom solutions, see chapter on Distributors!

Accessories, sample kit

Cover caps

For the safe closure of female and male connectors.

With mounting strap for snapping onto plug connectors and device connectors



	Color	Part No.
Cover cap	black	Z6.561.6953.1
Male connector	light gray	Z6.561.6953.0
Cover cap	black	Z6.561.7253.1
Female connector	light gray	Z6.561.7253.0

Sample case RST16i3

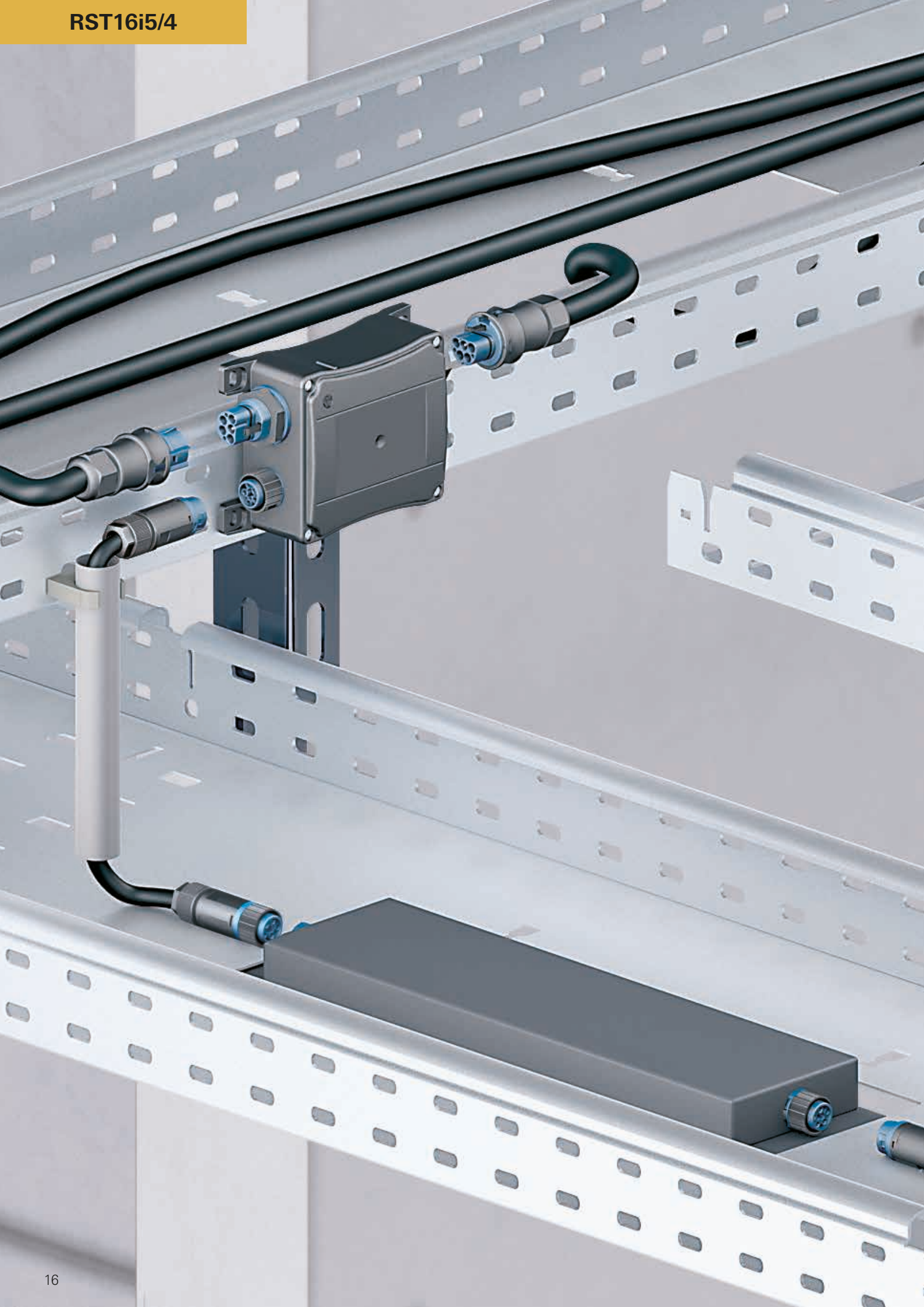


Part No.

99.674.0000.0

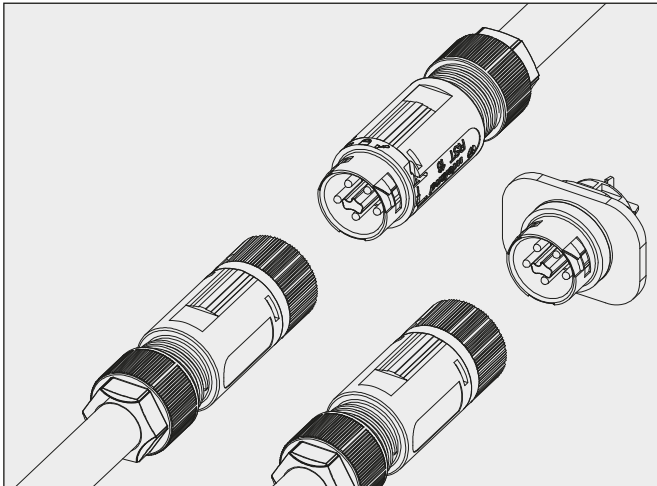
Contents:
Connectors
Device connectors
Contact parts in various codings
Cover caps





The RST16i5/4 product line – general network applications, lighting installation with dimming function, connection of electrical (sunblind) drives, applications in the extra-low voltage range (LED technology)

Application example








General

The **RST16i5/4** product line has a total of four mechanical codings and a wide variety of uses, from general network applications to applications in the extra-low voltage range. The main focus is the connection of dimmable luminaires with a compact design. This series is also tailored for the electrification of RGB or RGB-W/A outdoor spotlights. There are different mechanical codings available for every application. This means that only associated pairs of male and female connectors can be connected, with the correct polarity ensured. This gives you the security of a clear distinction.

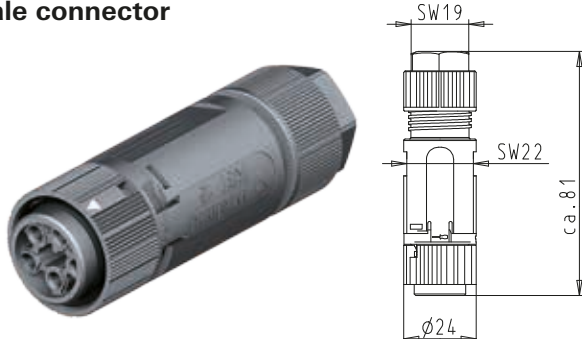
The codings are also available in a 4 pole variant. This is based on the 5 pole housing, but with one pole not configured.

Coding

	Application	Mains		Mains/signal	Extra-low voltage	up to 400V without PE
	Mechanical coding, e.g.	1, 2, 3, N, PE		L, N, PE, 1, 2	1, 2, 3, 4, 5	1, 2, 3, 4, 5
						
Name	Description	black	light gray	turquoise	signal brown	light blue
Connectors		✓	✓	✓	✓	✓
Device connectors M20.2		✓	✓	✓	✓	✓
Distributors	RST® compact and multiple distributors	✓	✓	✓	✓	✓
	Individual distribution box	Upon request	Upon request	Upon request	Upon request	Upon request
Cable assemblies	Device connector cable Male – free end	✓	Upon request	✓	Upon request	Upon request
	Connection cable Female – free end	✓	Upon request	✓	Upon request	Upon request
	Extension cable Female – male	✓	Upon request	✓	Upon request	Upon request

Connectors for Ø 7.1 – 13 mm²⁾ cables

Female connector

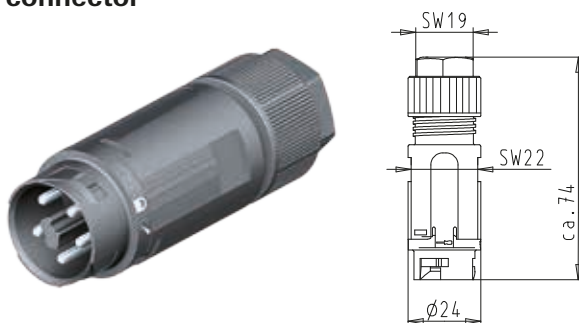


Rated values

Rated voltage	250/400V
Rated current	16A
Rated cross-section	0.25 to 1.5 mm ² (suitable for ferrules)
Approvals	VDE; UL and CSA being prepared

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		1, 2, 3, N, PE	black light gray	46.051.4553.1 46.051.4553.0
Motor connection ¹⁾		1, 2, 3, PE	black light gray	46.051.4554.1 46.051.4554.0
Mains/signal (e.g. dimming)		L, N, PE, 1, 2	turquoise	46.051.4553.6
up to 400V without PE		1, 2, 3, 4, 5	light blue	46.051.4553.9
Extra-low voltage (60V~/120V-)		1, 2, 3, 4, 5	signal brown	46.051.4550.4
Extra-low voltage ¹⁾ (60V~/120V-)		1, 2, 3, 4	signal brown	46.051.4551.4

Male connector



Rated values

Rated voltage	250/400V
Rated current	16A
Rated cross-section	0.25 to 1.5 mm ² (suitable for ferrules)
Approvals	VDE; UL and CSA being prepared

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		1, 2, 3, N, PE	black light gray	46.052.4553.1 46.052.4553.0
Motor connection ¹⁾		1, 2, 3, PE	black light gray	46.052.4554.1 46.052.4554.0
Mains/signal (e.g. dimming)		L, N, PE, 1, 2	turquoise	46.052.4553.6
up to 400V without PE		1, 2, 3, 4, 5	light blue	46.052.4553.9
Extra-low voltage (60V~/120V-)		1, 2, 3, 4, 5	signal brown	46.052.4550.4
Extra-low voltage ¹⁾ (60V~/120V-)		1, 2, 3, 4	signal brown	46.052.4551.4

¹⁾ One pole not configured (Observe installation instructions!)

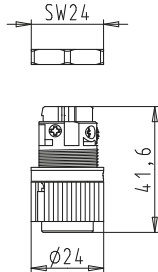
²⁾ Other diameters available upon request

Device connectors M20.2

Female connector



For housing cut-out see Technical Data



Rated values

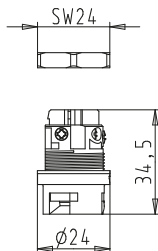
Rated voltage	250/400V
Rated current	16A
Rated cross-section	0.25 to 2.5 mm ² (up to 1.5 mm ² suitable for ferrules)
Approvals	VDE; UL and CSA being prepared
Wall thicknesses	up to 5 mm

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		1, 2, 3, N, PE	black light gray	46.051.5053.1 46.051.5053.0
Motor connection ¹⁾		1, 2, 3, PE	black light gray	46.051.5054.1 46.051.5054.0
Mains/signal (e.g. dimming)		L, N, PE, 1, 2	turquoise	46.051.5053.6
up to 400V without PE		1, 2, 3, 4, 5	light blue	46.051.5053.9
Extra-low voltage (60V~/120V-)		1, 2, 3, 4, 5	signal brown	46.051.5050.4
Extra-low voltage ¹⁾ (60V~/120V-)		1, 2, 3, 4	signal brown	46.051.5051.4

Male connector



For housing cut-out see Technical Data



Rated values

Rated voltage	250/400V
Rated current	16A
Rated cross-section	0.25 to 2.5 mm ² (up to 1.5 mm ² suitable for ferrules)
Approvals	VDE; UL and CSA being prepared
Wall thicknesses	up to 5 mm

Application	Coding	Pole marking	Color	Part No.
with screw connection				
Mains		1, 2, 3, N, PE	black light gray	46.052.5053.1 46.052.5053.0
Motor connection ¹⁾		1, 2, 3, PE	black light gray	46.052.5054.1 46.052.5054.0
Mains/signal (e.g. dimming)		L, N, PE, 1, 2	turquoise	46.052.5053.6
up to 400V without PE		1, 2, 3, 4, 5	light blue	46.052.5053.9
Extra-low voltage (60V~/120V-)		1, 2, 3, 4, 5	signal brown	46.052.5050.4
Extra-low voltage ¹⁾ (60V~/120V-)		1, 2, 3, 4	signal brown	46.052.5051.4

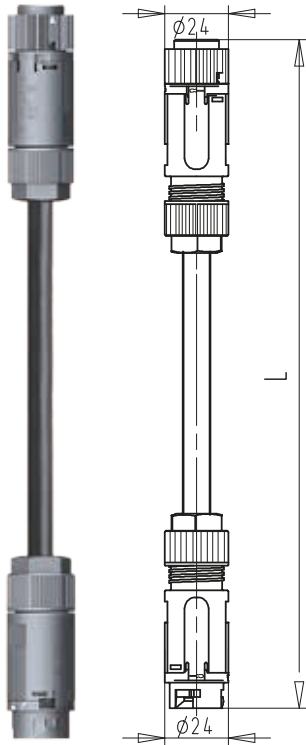
¹⁾ One pole not configured (Observe installation instructions!)

Cable assemblies 1.5 mm², 16 A

Rated values

Wire ends	ultrason. welded
Sheath strip length	35 mm
Wire strip length	9 mm

Connection cables female – male



**Mains 250 V
5 pole**



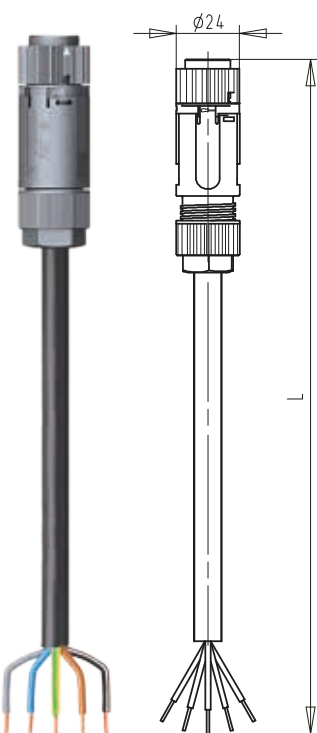
**Mains/signal
5 pole**



Cable	Length m	Part No.	Part No.
PVC cable H05VV-F containing halogen	0.5	46.452.0500.1	46.452.0500.6
	1	46.452.1000.1	46.452.1000.6
	2	46.452.2000.1	46.452.2000.6
	3	46.452.3000.1	46.452.3000.6
	4	46.452.4000.1	46.452.4000.6
5	46.452.5000.1	46.452.5000.6	

Cable	Length m	Part No.	Part No.
Rubber-sheathed cable H07RN-F containing halogen	0.5	46.452.0530.1	46.452.0530.6
	1	46.452.1030.1	46.452.1030.6
	2	46.452.2030.1	46.452.2030.6
	3	46.452.3030.1	46.452.3030.6
	4	46.452.4030.1	46.452.4030.6
5	46.452.5030.1	46.452.5030.6	

Connection cables female – free end



**Mains 250 V
5 pole**



**Mains/signal
5 pole**

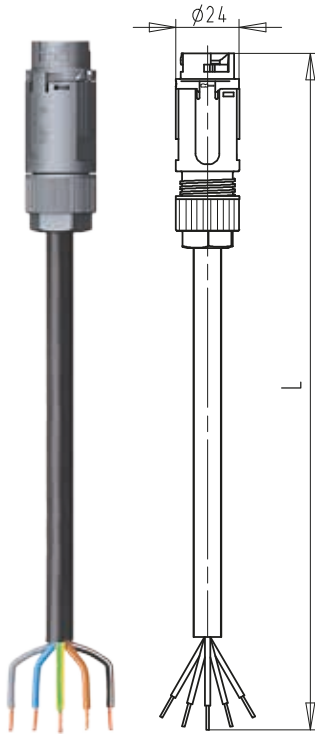


Cable	Length m	Part No.	Part No.
PVC cable H05VV-F containing halogen	0.5	46.452.0503.1	46.452.0503.6
	1	46.452.1003.1	46.452.1003.6
	2	46.452.2003.1	46.452.2003.6
	3	46.452.3003.1	46.452.3003.6
	4	46.452.4003.1	46.452.4003.6
5	46.452.5003.1	46.452.5003.6	

Cable	Length m	Part No.	Part No.
Rubber-sheathed cable H07RN-F containing halogen	0.5	46.452.0533.1	46.452.0533.6
	1	46.452.1033.1	46.452.1033.6
	2	46.452.2033.1	46.452.2033.6
	3	46.452.3033.1	46.452.3033.6
	4	46.452.4033.1	46.452.4033.6
5	46.452.5033.1	46.452.5033.6	

Cable assemblies 1.5 mm², 16 A

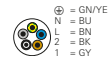
Connection cables male – free end



**Mains 250 V
5 pole**



**Mains/signal
5 pole**



Cable	Length m	Part No.	Part No.
PVC cable H05VV-F containing halogen	0.5	46.452.0504.1	46.452.0504.6
	1	46.452.1004.1	46.452.1004.6
	2	46.452.2004.1	46.452.2004.6
	3	46.452.3004.1	46.452.3004.6
	4	46.452.4004.1	46.452.4004.6
	5	46.452.5004.1	46.452.5004.6

Cable	Length m	Part No.	Part No.
Rubber-sheathed cable H07RN-F containing halogen	0.5	46.452.0534.1	46.452.0534.6
	1	46.452.1034.1	46.452.1034.6
	2	46.452.2034.1	46.452.2034.6
	3	46.452.3034.1	46.452.3034.6
	4	46.452.4034.1	46.452.4034.6
	5	46.452.5034.1	46.452.5034.6

Distributors

RST compact distributor



Rated values

Dimensions (W x L x H)	104 x 162 x 57.2 mm
Input	1
Outputs	3
Pre-wired with	1.5 mm ²
Mounting option	Yes

Application	Coding	Pole marking	Color	Part No.
Mains		1, 2, 3, N, PE	black light gray	46.050.0153.1 46.050.0153.0
Motor connection ¹⁾		1, 2, 3, PE	black light gray	46.050.0154.1 46.050.0154.0
Mains/signal (e.g. dimming)		L, N, PE, 1, 2	turquoise	46.050.0153.6
up to 400V without PE		1, 2, 3, 4, 5	light blue	46.050.0153.9
Extra-low voltage (60V~/120V-)		1, 2, 3, 4, 5	signal brown	46.050.0150.4
Extra-low voltage ¹⁾ (60V~/120V-)		1, 2, 3, 4	signal brown	46.050.0151.4

¹⁾ One pole not configured (Observe installation instructions!). For custom solutions, see chapter on Distributors!

Accessories, sample kit

Cover caps

For the safe closure of female and male connectors.

With mounting strap for snapping onto plug connectors and device connectors



	Color	Part No.
Cover cap	black	Z6.561.6853.1
Male connector	light gray	Z6.561.6853.0
Cover cap	black	Z6.561.7153.1
Female connector	light gray	Z6.561.7153.0

Sample case RST16i5



Part No.
99.675.0000.0
Contents: Connectors Device connectors Contact parts in various codings Cover caps

Technical data RST16i3/2 / RST16i5/4

	RST16i3/2	RST16i5/4
Rated voltage	400V	250/400V
Rated current	16A	16A
Number of poles	3/2	5/4

Connector

temperature range:

- 40°C to 100°C

Material:

Contact parts: brass, surface-treated
Housing parts: Polyamide, halogen-free, V2
Sealing material: NBR

Pollution degree:

3 (when connected)

Protection rating:

IP66/68 (3m; 2h)/69K

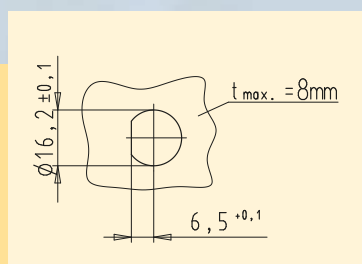
Plugging cycles:

according to IEC 61535
100x without load and
50x under nominal load (cos phi = 0.6)

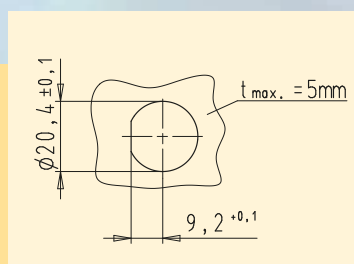
Approvals:

VDE (IEC 61535)
UL (UL 2238 / UL 1977) being prepared
CSA (C22.2 No.182.1 / C22.2 No.182.3) being prepared

Housing cut-out RST16i3/2



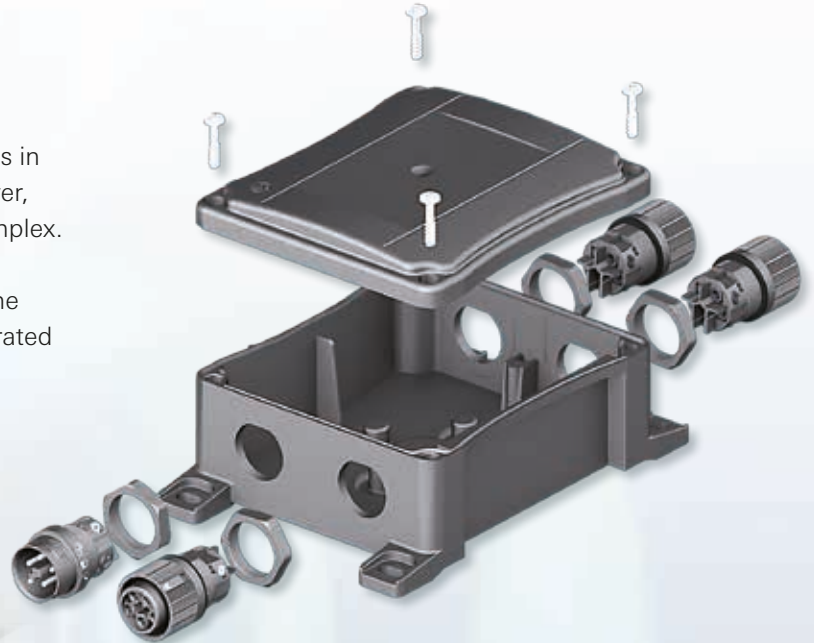
Housing cut-out RST16i5/4



Compact and multiple distributors

Flexibility according to RST® modularity

The pluggable distributors play a major role in power or signal distribution. In their simplest function, they merely have to provide branches in the required locations. Practice shows, however, that the requirements may be much more complex. Examples can be found in rotary A/C current distributors and distributors with integrated fine fuses, all the way through to boxes with integrated electronics, such as constant current sources, voltage sources, or radio actuators.

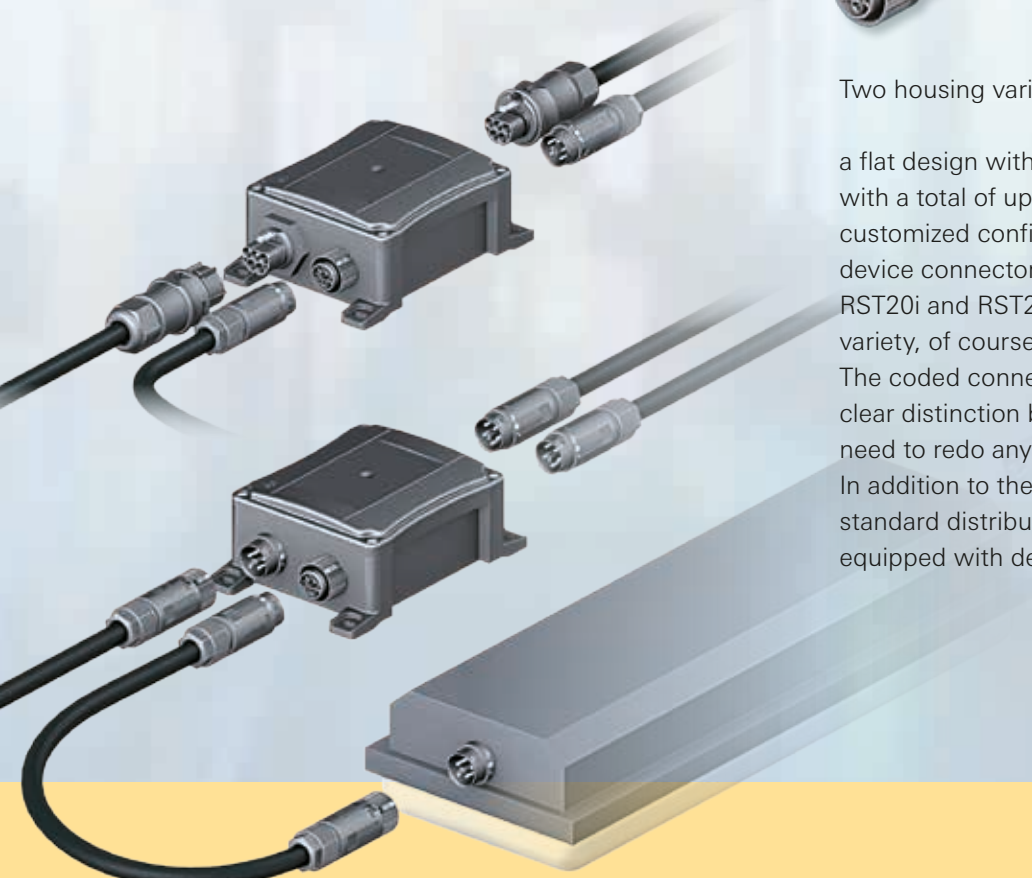


Two housing variations are the basis:

a flat design with up to four slots, and a high design with a total of up to eight slots. Alongside a customized configuration with the new RST16i device connectors, the existing components of the RST20i and RST25i lines can also be used for variety, of course.

The coded connectors give you the security of a clear distinction between different circuits – no need to redo any incorrect connections.

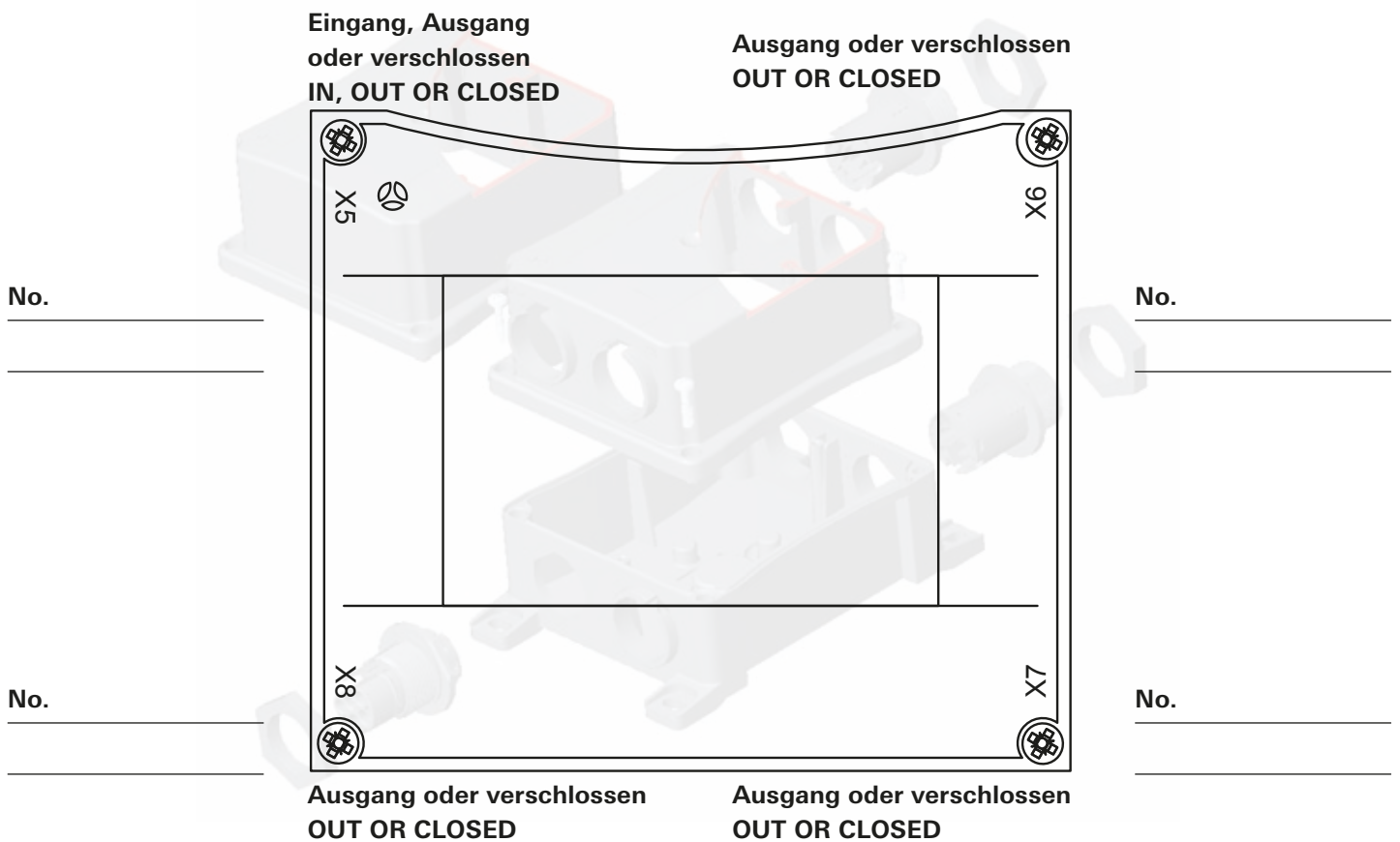
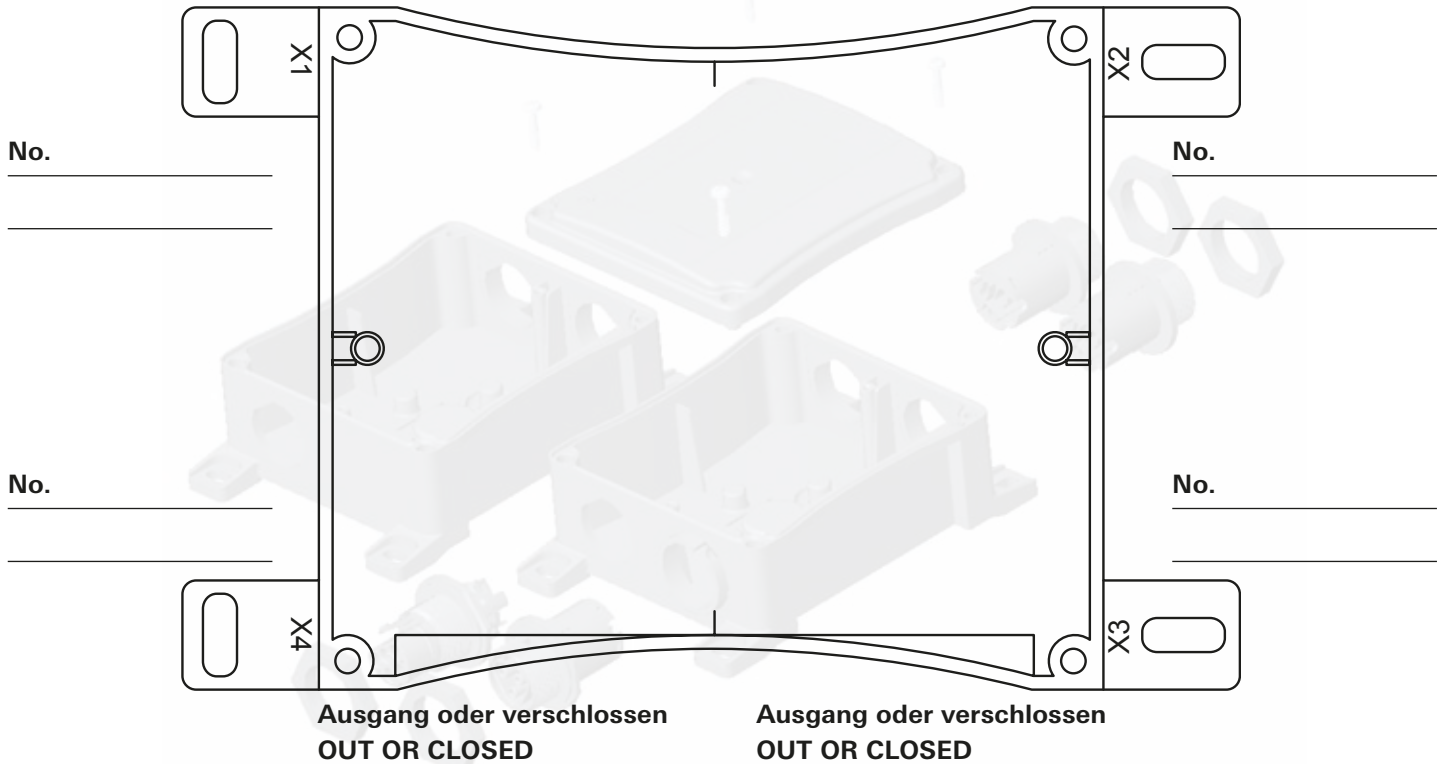
In addition to the compact and multiple distributors, standard distribution boxes can also be custom-equipped with device connectors.



Example



Special variant request – please complete and fax: +49-951-9326-996



Bitte die benötigten Komponenten (Artikelnummer oder Polzahl und Farbe) ergänzen und Verdrahtung einzeichnen.
Please add required components (either article code or number of poles and color) and the wiring scheme.

Cable assemblies

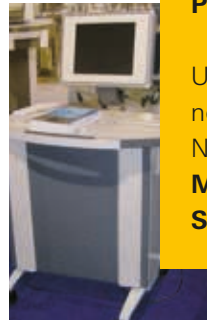
By default, we offer the low-cost H05VV-F cable, but its field of applications is restricted to indoor areas. This cable is not suitable for outdoor areas and constantly humid or wet rooms! Protection from foreign bodies (IP6X) is at the fore here. Temporary wetness for cleaning purposes, however, is allowed. Temporary outdoor installations without special demands can be implemented using H07RN-F rubber-sheathed cables. However, here

too it is essential to check whether or not any additional action, such as laying inside installation pipes, is required. A higher-quality cable is recommended for installations that will be exposed to greater environmental influences for quite some time.

H07RN-F rubber-sheathed cable

Use inside dry, and wet rooms, as well as outdoors, but not directly in the ground.
Limited UV resistance.

Minimum bending radius: 4 x outside diameter
Service temperature: 60 °C



PVC cable H05VV-F

Use inside dry rooms, not outdoors, not directly in the ground.
Not UV resistant.

Minimum bending radius: 4 x outside diameter
Service temperature: 70 °C

Cables for increased requirements (e.g. Ölflex® Black)

Use outdoors, may be laid in the ground, UV-resistant.

Minimum bending radius: 4 x outside diameter
Service temperature: 80 °C



Definition of IP protection degrees (DIN EN 60529-1)

Documentation:

Example: IP69K



	Protection against contact	Protection against ingress of objects
0	no protection	no protection
1	Any large surface of the body (e.g. back of hand)	Large foreign objects (> 50 mm in Ø)
2	Finger	Medium-sized foreign objects (> 12 mm in Ø)
3	Tools and wires (> 2.5 mm in diameter)	Small foreign objects (> 2.5 mm in Ø)
4	Tools and wires (> 1.0 mm in diameter)	Grain-shaped foreign objects (> 12 mm in Ø)
5	Complete protection against contact	Dust deposition
6	Complete protection against contact	Dust ingress
7		
8		
9		

	IP protection ratings against ingress of water
0	no protection
1	Protection against vertically falling water
2	Protection from diagonally (up to 15°) falling water drops
3	Protection against spraying water up to 60° to the vertical
4	Protection from splashing water from any direction
5	Protection against jet spray water
6	Protected against powerful water jets
7	Protection against temporary immersion in water
8	Protection against continuous immersion in water
9K*)	Protection against high pressure, high temperature spray downs

*) according to DIN 400 50

gesis® RST®

As an innovative installation system, Wieland offers a global concept for efficient outdoor installation and industrial application.

In many applications, electrotechnical devices and systems must reliably work for many years under tough environmental conditions. To ensure a reliable function, it is essential to prevent the penetration of humidity or particles (e.g. dust, oil, soot, etc.) in production plants, garages or in outdoor areas. Even an unplanned immersion is possible with the RST® system within the scope of the specified degree of protection.

The system is not designed for permanent operation under water.

It is not possible to lay the components directly in the ground.

According to VDE 0100-520, connectors must be protected using suitable additional facilities and must be accessible for visual inspection, testing, and maintenance.

Refer also to the installation instructions.

Degree of protection achieved:

- IP65** Water jets
- IP66** Powerful water jets
- IP67** Temporary immersion
- IP68** Continuous immersion (for 2 hours at a water depth of 3 m)
- IP69K** High-pressure spray down

Installation instructions for outdoor electrical installations

Outdoor electrical installations are particularly tricky. Constant temperature changes, high UV radiation, high ozone values and, not least, mechanical wear leading to material fatigue, water ingress, and, finally, system failure.

What is crucial is the perfect interaction between the materials used and the very specific environmental conditions. While all connectors and distributors are designed for continuous indoor and outdoor operation, the cables are clearly a different matter. Selection of the appropriate cable plays a major role for continuous operation of the installation.

Installation instructions

A horizontal installation position is preferable in order to ensure that water drains off. In accordance with installation regulation IEC 60364-5-52 (DIN VDE 0100-522.3), cable systems must be designed in such a way that damage caused by the ingress of water is avoided.

Cable systems must satisfy the required degree of protection. If water can accumulate or water condensation can occur, provisions for water drainage must be made! This particularly applies to sealing points in the area of the strain relief.

If abrasion might occur (in flexible installations), wear of the pre-assembled cable must be taken into consideration and must be monitored.

Avoid any bending of the cable in the area of the strain relief.

Control mechanical bending in the area of the strain relief using suitable measures (e.g. cable clamps).

Laying of the system components directly in the ground is not possible. According to VDE 0100-520, connectors must be protected using suitable additional facilities and must be accessible for visual inspection, testing, and maintenance.

The connector system is not designed for continuous operation under water. However, unplanned immersion is possible as foreseen by the specification.

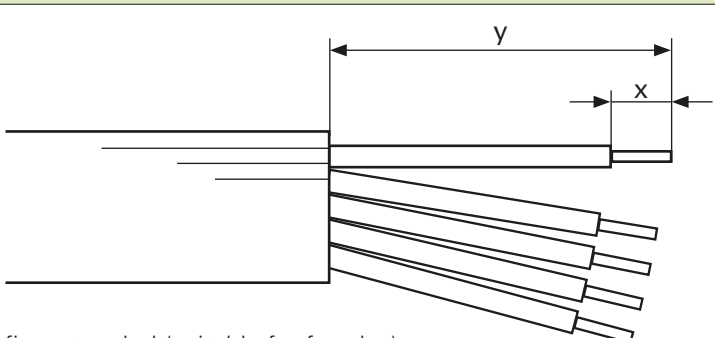


Further information can be found in our White Paper "Installation instructions for outdoor electrical installations", order no. 0693.1



Wire strip lengths Installation instructions

Wire strip lengths

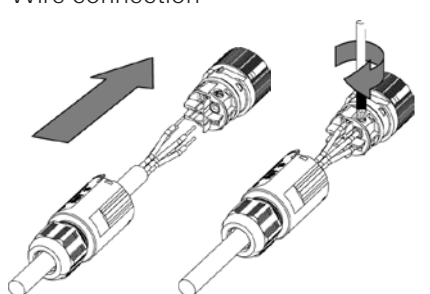


fine-stranded (suitable for ferrules)

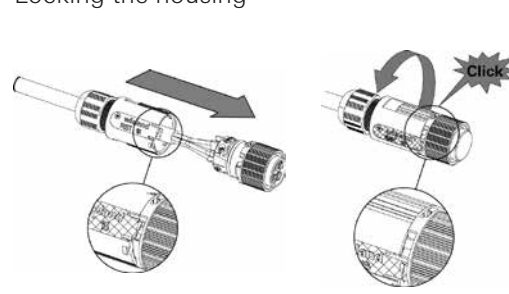
Conductor	PE	N, L, 1, 2, 3
Sheath strip length y (in mm)	33	25
Wire strip length x (mm)	8	8

Installation instructions

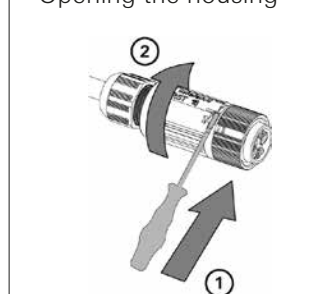
Wire connection



Locking the housing

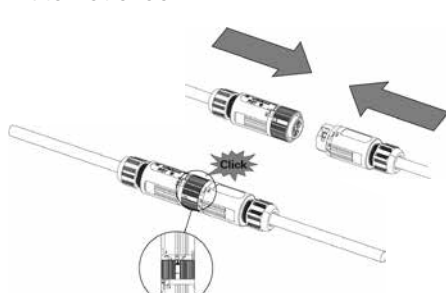


Opening the housing

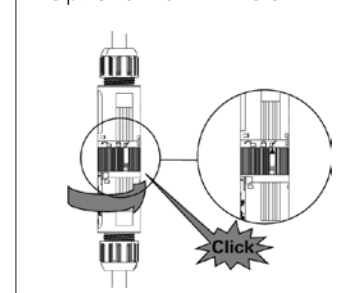


TWISTLOCK – the smart lock

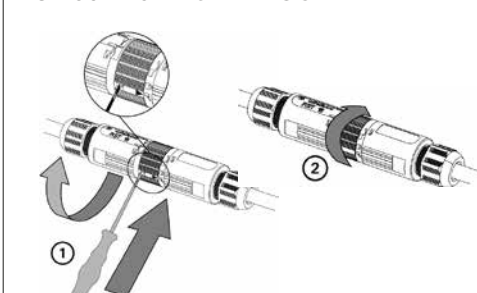
Automatic lock



Optional "SAFE-LOCK"



Unlock from "SAFE LOCK"



Please note that electrical connections and installation shall only be done by trained experts. Observe the included installation instructions!

Detailed installation instructions can be found under <https://eshop.wieland-electric.com>

Pluggable installation solutions from Wieland

Further information

Technical support

Automation technology:

Phone: +49 951 9324- . . .

- Safety technology **safety** -999
e-mail: safety@wieland-electric.com
- **interface:** -995
Power supply, industrial Ethernet switches, timer relays, measuring and monitoring relays, coupling relays, analog modules, remote I/O, surge protection, passive interfaces, remote power distribution **podis**[®]
- DIN rail terminal blocks **fasis**, **selos** -991
Industrial multipole connectors **revos**
PCB terminals and connectors **wiecon**, appliance terminals, european terminal strips, housings for electronic components

Fax: +49 951 9326-991
e-mail: AT.TS@wieland-electric.com

Sales service:

- To contact our sales department regarding availability, delivery schedules, and pricing please call
Phone: +49 951 9324-990

Technical Support

Building services engineering:

Phone: +49 951 9324- . . .

- System connectors for building installation -996
gesis[®]CON, **gesis**[®]RAN, **gesis**[®]ELECTRONIC
 - DIN rail terminal blocks **fasis**^{BIT}, **selos**^{BIT} -991
- Fax: +49 951 9326-996
e-mail: BIT.TS@wieland-electric.com

Additional information for pluggable installation:

gesis [®] INDOOR	Part No. 0670.1
gesis [®] OUTDOOR	Part No. 0690.1
gesis [®] ELECTRONIC	Part No. 0700.1
gesis [®] RAN	Part No. 0409.1
Shop fitting	Part No. 0417.1
Light	Part No. 0407.1

Information about Wieland products in general:

Wieland program overview Part No 0902.1

General information and news:

www.wieland-electric.com
Visit our eShop at
<http://eshop.wieland-electric.com>



Our subsidiaries

... and the addresses of our sales partner worldwide are available at:

www.wieland-electric.com



USA
Wieland Electric Inc.
North American Headquarters
 2889 Brighton Road
 Oakville, Ontario L6H 6C9
 Phone +1 905 8298414
 Fax +1 905 8298413
www.wielandinc.com



CANADA
Wieland Electric Inc.
North American Headquarters
 2889 Brighton Road
 Oakville, Ontario L6H 6C9
 Phone +1 905 8298414
 Fax +1 905 8298413
www.wieland-electric.ca



GREAT BRITAIN
Wieland Electric Ltd.
 Riverside Business Centre,
 Walnut Tree Close
 GB-Guildford/Surrey GU1 4UG
 Phone +44 1483 531213
 Fax +44 1483 505029
sales.uk@wieland-electric.com



FRANCE
Wieland Electric SARL.
 Le Céramê Hall 6
 47, avenue des Genottes
 CS 48313
 95803 Cergy-Pontoise Cedex
 Phone +33 1 30320707
 Fax +33 1 30320714
info.adv@wieland-electric.com



SPAIN
Wieland Electric S.L.
 C/ Maria Auxiliadora 2 bajos
 E-08017 Barcelona
 Phone +34 93 2523820
 Fax +34 93 2523825
ventas@wieland-electric.com



ITALY
Wieland Electric S.r.l.
 Via Edison, 209
 I-20019 Settimo Milanese
 Phone +39 02 48916357
 Fax +39 02 48920685
info.italy@wieland-electric.com



BELGIUM
ATEM-Wieland Electric NV
 Bedrijvenpark De Veert 4
 B-2830 Willebroek
 Phone +32 3 8661800
 Fax +32 3 8661828
info.belgium@wieland-electric.com



DENMARK
Wieland Electric A/S
 Vallørækken 26
 DK-4600 Køge
 Phone +45 70 266635
 Fax +45 70 266637
sales.denmark@wieland-electric.com



SWITZERLAND
Wieland Electric AG
 Harzachstrasse 2b
 CH-8404 Winterthur
 Phone +41 52 2352100
 Fax +41 52 2352119
info.swiss@wieland-electric.com



POLAND
Wieland Electric Sp. Zo.o.
 Św. Antoniego 8
 62-080 Swadzim
 Phone +48 61 2225400
 Fax +48 61 8407166
office@wieland-electric.pl



CHINA
Wieland Electric Trading
 Unit 2703
 International Soho City
 889 Renmin Rd., Huang Pu District
 PRC- Shanghai 200010
 Phone +86 21 63555833
 Fax +86 21 63550090
info-shanghai@wieland-electric.com



JAPAN
Wieland Electric Co, Ltd.
 Nisso No. 16 Bldg. 7F
 3-8-8 Shin-Yokohama,
 Kohoku-ku
 Yokohama 222-0033
 Phone +81 45 473 5085
 Fax +81 45 470 5408
info-japan@wieland-electric.com



◀ Informational material for
 downloading from our websites



Subject to technical modifications! **gesis**®, **RST**®, **GST**®, **GST18**®, **podis**®
 and **samos**® are registered trademarks of Wieland Electric GmbH

Headquarters:
Wieland Electric GmbH
Brennerstraße 10 – 14
96052 Bamberg, Germany

Sales Center:
Wieland Electric GmbH
Benzstraße 9
96052 Bamberg, Germany

Phone +49 951 9324-0
Fax +49 951 9324-198
www.wieland-electric.com
info@wieland-electric.com

Industrial technology

Solutions for the control cabinet

- DIN rail terminal blocks
 - Screw, tension spring or push-in connection technology
 - Wire cross sections up to 300 mm²
 - Numerous special functions
 - Software solutions interfacing to CAE systems
- Safety
 - Safe signal acquisition
 - Safety switching devices
 - Modular safety modules
 - Compact safety controllers
 - Application consulting and training
- Network engineering and fieldbus systems
 - Remote maintenance via VPN industrial router and VPN service portal
 - Industrial Ethernet switches
 - PLC and I/O systems, standard and increased environmental conditions
- Interface
 - Power supply units
 - Overvoltage protection
 - Coupling relays, semiconductor switches
 - Timer relays, measuring and monitoring relays
 - Analog coupling and converter modules
 - Passive interfaces

Solutions for field applications

- Decentralized installation and automation technology
 - Electrical installation for wind tower
 - Fieldbus interfaces and motor starters
- Connectors for industrial applications
 - Rectangular and round connectors
 - Aluminium or plastic housings
 - Degree of protection up to IP 69K
 - Current-carrying capacity up to 100 A
 - Connectors for hazardous areas
 - Modular, application-specific technology

PC board terminals and connectors

- Screw or spring clamp connection technology
- Spacings: 3.5 mm to 10.16 mm
- Reflow or wave soldering process

Building and installation technology

- Building installation systems
 - Main power supply connectors IP 20/IP 65 ... IP 69K
 - Bus connectors
 - Low-voltage connectors
 - Power distribution system with flat cables
 - Distribution systems
 - Room automation with KNX and wireless technology
 - DIN rail terminal blocks for electrical installations
 - Overvoltage protection