

RST[®] CLASSIC TECHNICAL DATA

	RST20i2/i3	RST25i3	RST20i4/i5	RST25i5	RST20i6/i7
Rated voltage	250/400 V	250 V	250/400 V	250/400 V	250/400 V
Rated current	20 A	25 A 32 A (at 6.0 mm ²)	20 A	25 A 32 A (at 6.0 mm ²)	20 A (3x20 A; 4x5 A) no pole specification
Number of poles	2- or 3-pole	3-pole	4- or 5-pole	5-pole	6- or 7-pole
Connectable cable diameter*	6.0 - 10.0 mm; 10.0 - 14.0 mm; 13.0 - 18.0 mm				
Temperature range:	Connector - 40 °C to 100 °C Cable H05VV max 70 °C, H07RN-F max. 60 °C, H07 RN-F enhanced 90 °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) /69, barrier seal for RST20i6/7 optional Cable assembly as a shrink hose variant IP66/ 68 (3m; 2h) The installation instructions must be followed (refer also to the White Paper "Electrical installation for outdoor areas" Order No. 0693.1)				
IK code	IK 07 (2 joules)				
Glow-wire test	RST20i2-i5/RST25i3/i5: at 850 °C, 30 s RST20i6/i7: at 960 °C, 30 s for connectors, distributors, cable assemblies and device connectors				
Mating cycles	100 x without load and 50 x under nominal load (cos w = 0.6) to IEC 61535 Up to 5,000 mating cycles for RST20i2/3 / RST25i3 and 3,000 mating cycles for RST20i4/5 / RST25i5 are possible without load. After approx. 600 mating cycles, the seal should however be tested and re-greased with a suitable lubricant (e.g. Berulub FR 43 UV) if required.				
Certificates / approvals	VDE; TÜV Rheinland; LR; GL / DNV; RINA; BV; ATEX; IECEX; cULus; CSA***; UL** (Observe conditions of acceptability) ** No cable assemblies in shrink hose design and connectors in spring force design *** No cable assemblies in shrink hose design				
Directives	IEC 61535 (VDE 0606); DIN EN 61984 (VDE 0627); VDE 0110/IEC 60999: UL 2238; CSA: C22.2 No.182.2-M1987; LR Type Approval System2 PFG 1915				

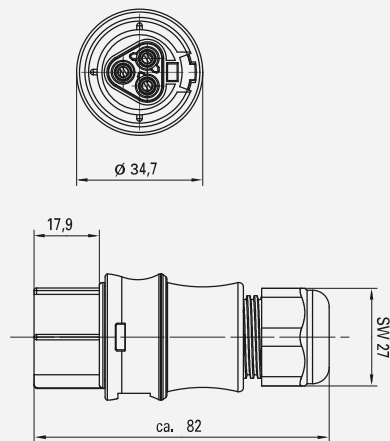
*Other diameters on request

RST[®] CLASSIC DIMENSIONS

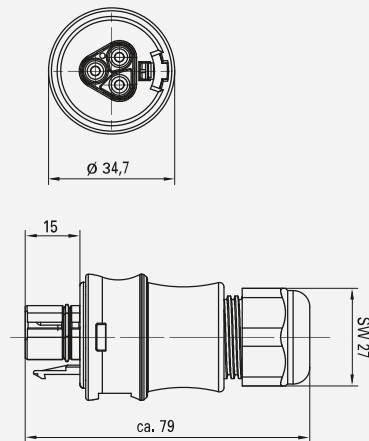
RST20i2 – i7

CONNECTORS

female

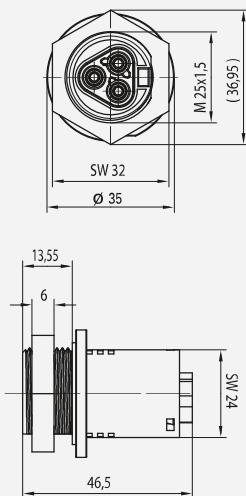


male

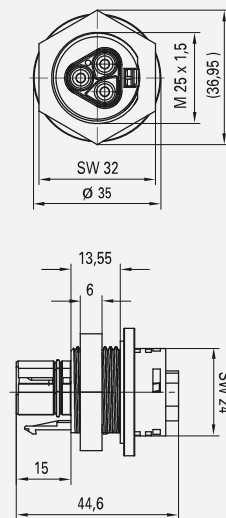


DEVICE CONNECTOR

female

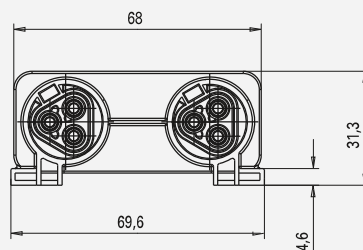
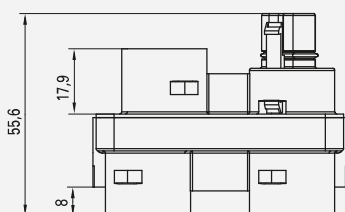


male



DISTRIBUTORS

1E / 3A



NOTE: Example illustration based on RSTi3 version.

The drawing for your product can be found in the download area of the relevant Art.No. at eshop.wieland-electric.com



RST® CLASSIC CABLE PREPARATION

Connectable cable cross-sections

	Solid	Fine-wired, no cable end sleeve	Fine-wired, with cable end sleeve	Multi-stranded	ultrason. welded
RST20i2/i3/25i3					
Screw connection	0.75 - 6 mm ²	0.75 - 6 mm ²	0.75 - 4 mm ²	0.75 - 6 mm ² / AWG 20 - 14	-
Crimp connection ¹⁾	-	0.75 - 4.0 mm ²	-	AWG 10 - 16	-
Spring force	0.5 - 2.5 mm ² / AWG 20 - 14	-	0.5 - 1.5 mm ² / AWG 20 - 16	0.75 - 1.5 mm ² / AWG 20 - 16	0.75 - 2.5 mm ²
RST20i4/i5/25i5					
Screw connection	0.75 - 4 mm ² / AWG 14 - 18	0.75 - 4 mm ²	0.75 - 2.5 mm ²	0.75 - 4 mm ² / AWG 14 - 18	-
Crimp connection ¹⁾	-	0.75 - 4 mm ²	-	AWG 12 - 18	-
RST20i6/i7					
Screw connection	Connectors 0.2 - 1.5 mm ² Device connector 0.2 - 2.5 mm ²	0.2 - 2.5 mm ²	0.2 - 1.5 mm ²	0.2 - 2.5 mm ² / AWG 14 - 20	-
Crimp connection ¹⁾	-	0.2 - 2.5 mm ²	-	-	-

For spring forces, please use the following cable end sleeves. These can be found in RST® CLASSIC accessories.

Cable cross-section	Ferrule
0.5 mm ²	DIN 46228-E0.5-10
0.75 mm ² / AWG 20	DIN 46228-E0.75 -12
1 mm ² / AWG 18	DIN 46228-E1.0 -12
1.5 mm ² / AWG 16	DIN 46228-E1.5 -12

i RST® terminals with screw clamping allow the connection of conductors without special preparation according to EN 60999-1.

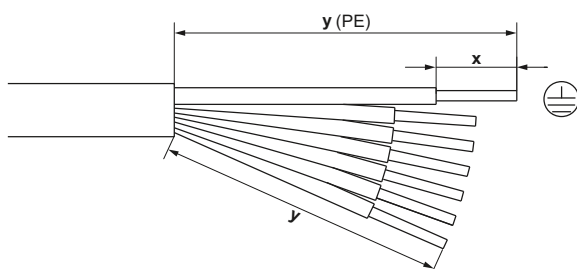
1) Crimp contacts must always be ordered separately to the connector. The range of crimp contacts can be found in RST® CLASSIC accessories.

RST20i7/i6:

2) Restriction of the connection section range for fine-wired cables, when using connectors with the following strain reliefs.
 - Double connection: 0.2 - 0.75 mm²
 - straight, for cables Ø 6 - 10 mm and Ø 10 - 14 mm: 0.2 - 1.5 mm²

Sheath strip and wire strip lengths

RST20i2/i3/25i3	straight Ø 6 - 10 mm, Ø 10 - 14 mm		straight Ø 13 - 18 mm		square Ø 6 - 10 mm, Ø 10 - 14 mm		splitter connector Ø 6 - 10 mm, Ø 10 - 14 mm, Ø 13 - 18 mm		
	y (PE)	y	y (PE)	y	y (PE)	y	y	y (PE)	y
Cable									
Screw connection	31.5 mm	26.5 mm	42 mm	37 mm	31.5 mm	26.5 mm	42 mm	45.5 mm	40.5 mm
Spring connection	40 mm	35 mm	-	-	40 mm	35 mm	-	55 mm	50 mm
Crimp connection	42 mm	37 mm	57 mm	52 mm	42 mm	37 mm	-	-	-
RST20i4/i5/25i5									
Cable									
Screw connection	31.5 mm	26.5 mm	42 mm	37 mm	31.5 mm	26.5 mm	45.5 mm	40.5 mm	
Crimp connection	42 mm	37 mm	49 mm	44 mm	42 mm	37 mm	-	-	
RST20i6/i7									
Cable									
Screw connection	30 mm	25 mm	42 mm	37 mm	30 mm	25 mm	45 mm	40 mm	
Crimp connection	37 mm	32 mm	44 mm	39 mm	37 mm	32 mm	-	-	

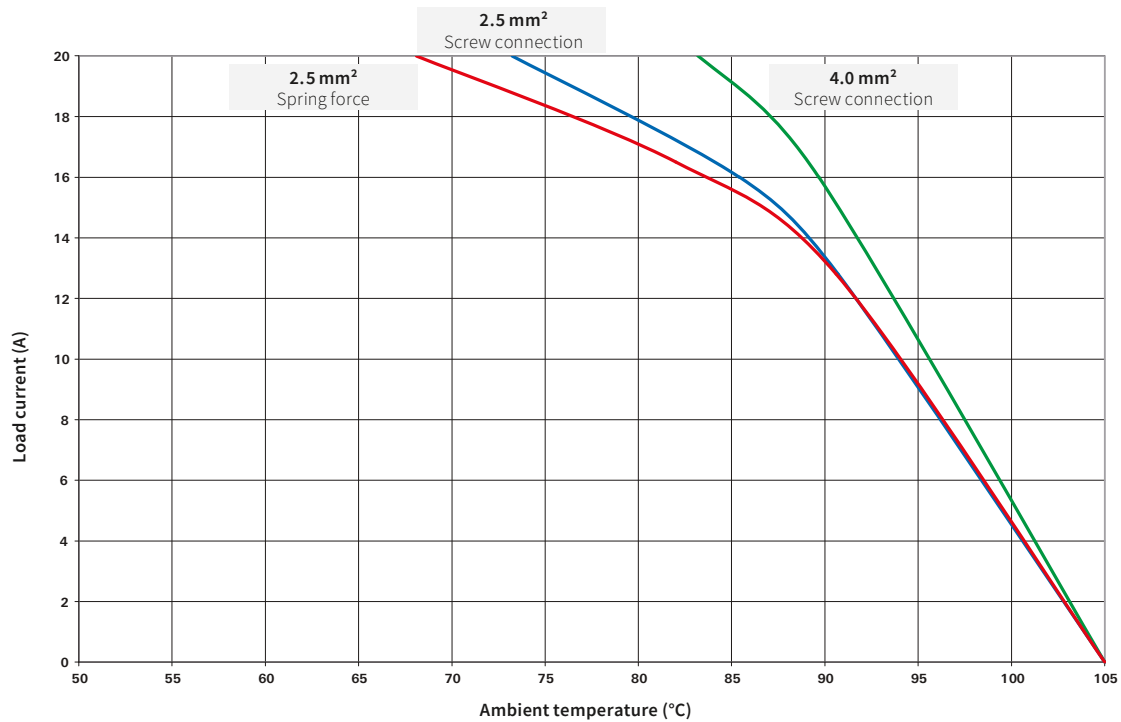




RST[®] CLASSIC DERATING CURVES

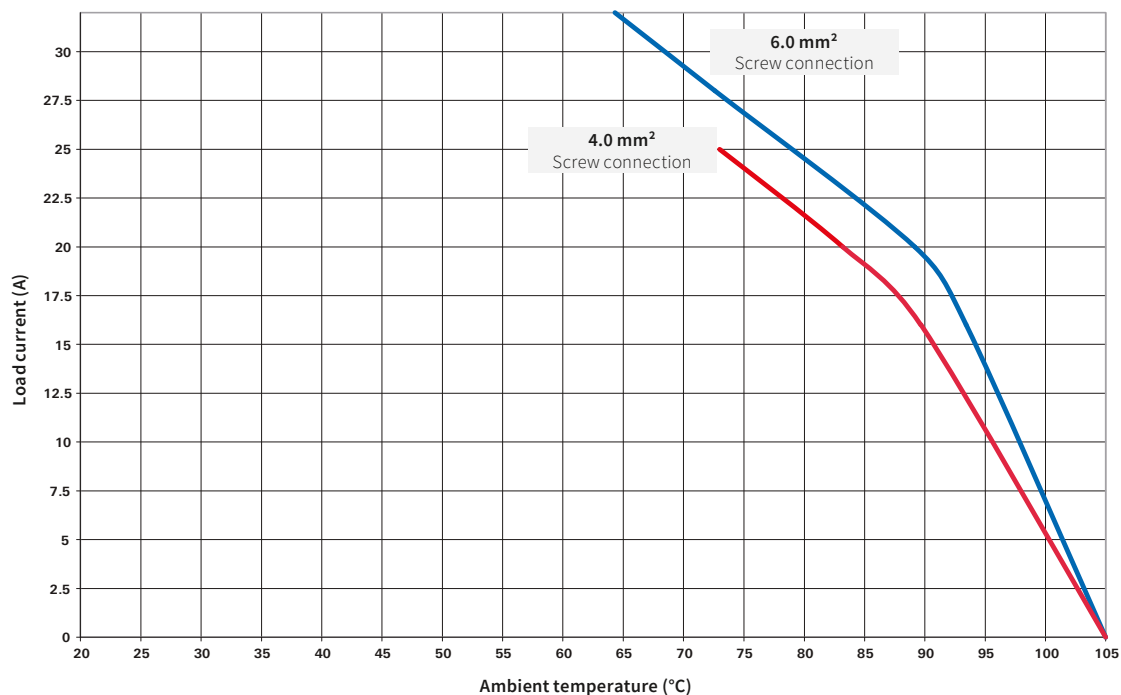
RST20i3 (Screw connection - spring force)

Derating curve to IEC 61984 Edition 2 dated 10/2008 Sec. 7.3.8



RST25i3 (screw connection)

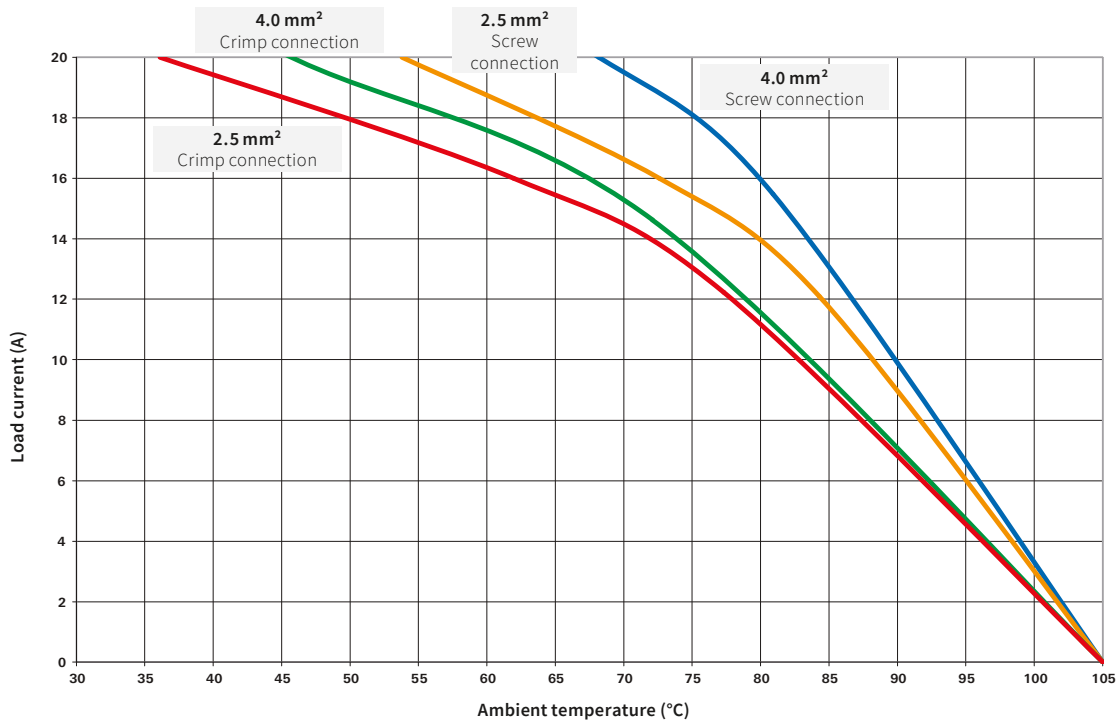
Derating curve to IEC 61984 Edition 2 dated 10/2008 Sec. 7.3.8



RST[®] CLASSIC DERATING CURVES

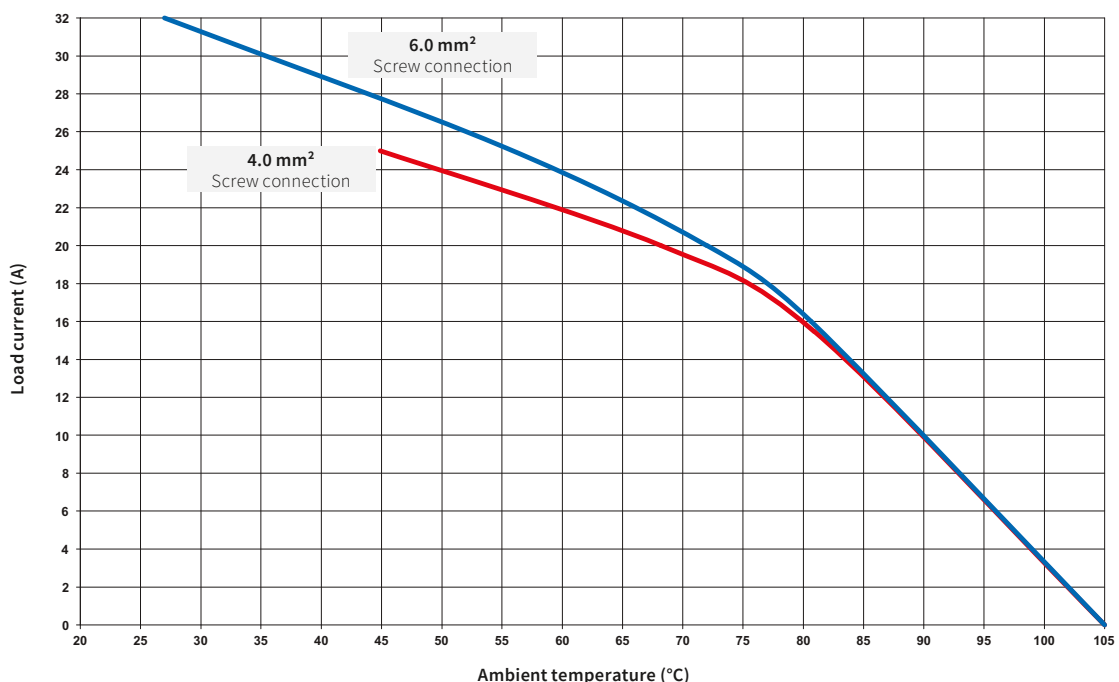
RST20i5 (screw connection – crimp connection)

Derating curve to IEC 61984 Edition 2 dated 10/2008 Sec. 7.3.8



RST25i5 (screw connection)

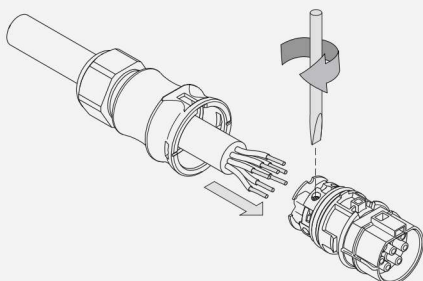
Derating curve to IEC 61984 Edition 2 dated 10/2008 Sec. 7.3.8



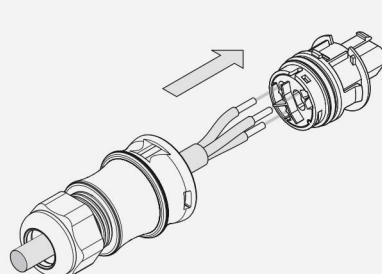
RST[®] CLASSIC ASSEMBLY INSTRUCTION

CABLE ASSEMBLY

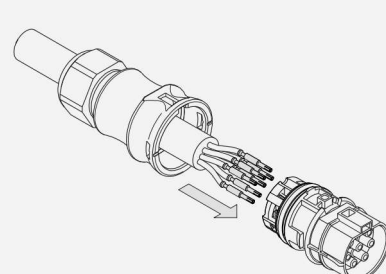
Screw connection



Spring force

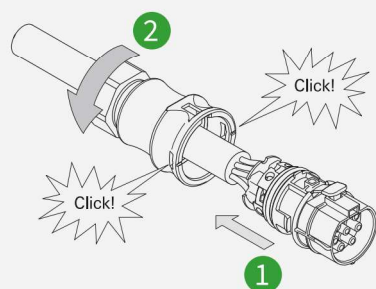


Crimp connection



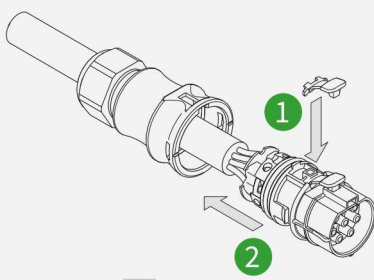
Number of poles	Torque	Screwdriver
RST20i2/i3	0.8 - 1 Nm	PZ1
RST20i4/i5	0.5 - 7 Nm	PZ1
RST20i6/i7	Type 0.5 Nm	DIN 5264 A, ground 0.8 × 3.0 mm

CLOSING THE CONNECTOR



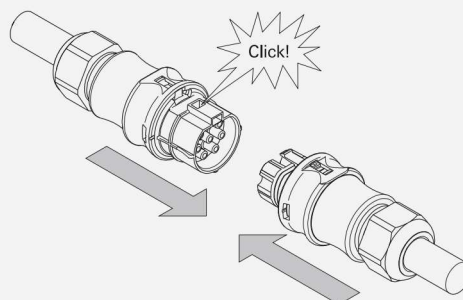
Tightening torque
typ. 4+1 Nm

OPTIONAL: USE THE MANUAL UNLOCKING FUNCTION



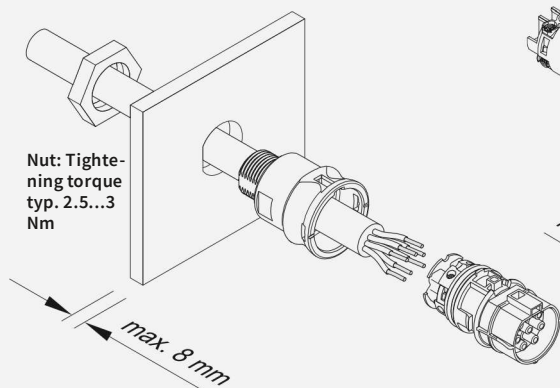
Manual
unlocking seat

INSERT AND LOCK

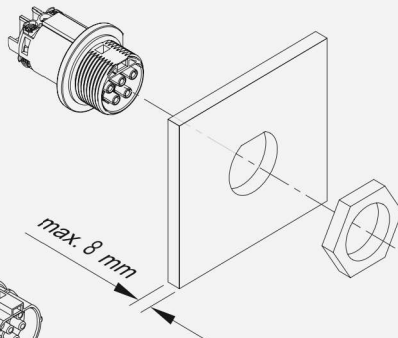


DEVICE CONNECTOR

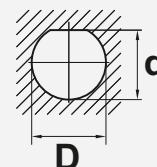
Modular with M16, M20, M25 cable feed through



One-piece with M25 cable feed through

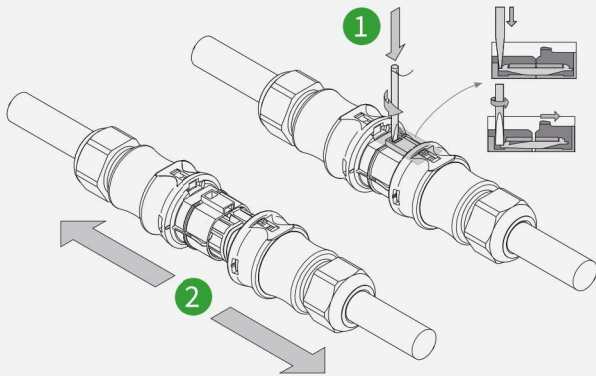


Dimension drawing of the opening for housing installation when anti-twist protection is required

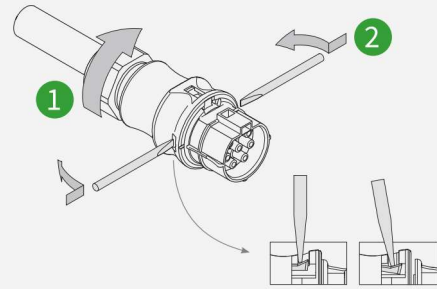


	D (mm)	d (mm)
M16	16.4 ^{-0.2}	15.0 ^{-0.2}
M20	20.4 ^{-0.2}	19.0 ^{-0.2}
M25	25.4 ^{-0.2}	23.9 ^{-0.2}

UNLOCK AND DISCONNECT

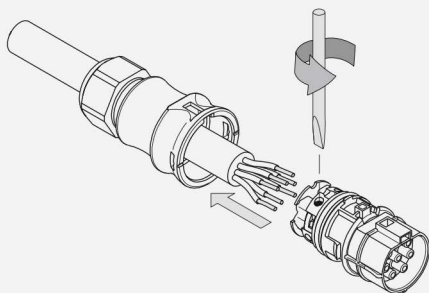


OPENING THE CONNECTOR

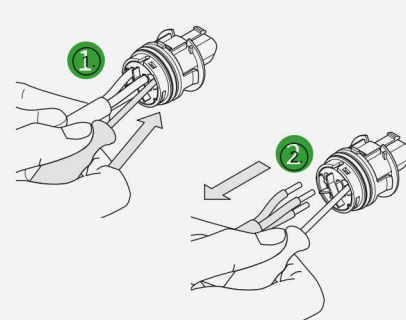


CABLE REMOVAL

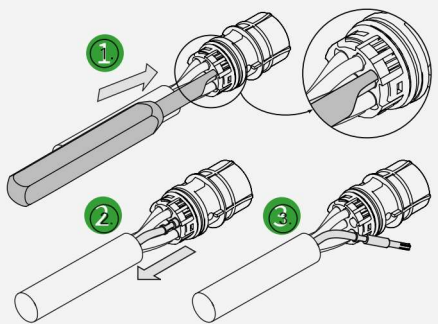
Screw connection



Spring force



Crimp connection



i Proceed in the same way for 2 to 7-pole connectors.
Observe the pole configuration.



NOTE: Please note that electrical connections and installations must be carried out only by appropriately trained specialists.
The Assembly instructions accompanying the product must be observed! The relevant Assembly instruction can be found online
in the download area of the product concerned: eshop.wieland-electric.com