

M40 Power

Plug-in connector RLS

DOK-CONNEC-RLS40XX****-DA01-EN-P

R911424871
Edition 01

1 RLS40x1 Technical data

Technical data



Designation	Symbol	Unit	RLS4001/ CM01	RLS4001/ CM02	RLS4011/ CM04	RLS4011/ CM06	RLS4031/ CM03	RLS4041/ CM05
Material number (accessory)			R911388426	R911388427	R911388428	R911388429	R911380332	R911377410
Type			Cable connector					
Connector size			M40					
Mode of locking			SpeedCon					
Cable type			REL0105	REL0106	REL0108	REL0109	REL0107	-
Clamping range ØA	D	mm	9 ... 14.5		14.0 ... 20.5		12.5 ... 17.0	6.5 ... 9.5
Coding			Bosch specific pole pattern					
Number of poles plug-in connectors			3+PE+5					
Contacts (amount and size)			4x (1.0 ... 2.5) + 5x (0.75 ... 1.5)		4x (2,5 ... 4.0) + 5x (0.75 ... 1.5)	4x (6,0 ... 10.0) + 5x (0.75 ... 1.5)	4x (1.0 ... 2.5) + 5x (0.75 ... 1.5)	4x (1.0 ... 2.5)
Maximum rated current plug-in connector power ¹⁾	I _{NP}	A	40 A (CSA) 65 A (UL)					
Maximum rated current plug-in connector signal ²⁾	I _{NS}	A	20 A (CSA) 30 A (UL)					
Mass	m	kg	0.410		0.390		0.410	
Contact design			Socket					
Connection design			Crimp					
Rated voltage power contact	U _{NP}	V	600					
Rated voltage signal contact	U _{NS}	V	125					
Overvoltage category			III					
Resistor	R	mOhm	< 3					
Temperature range	T _a	°C	-40 ... 125					
Installation altitude	h	m	3000					
Pollution degree			3					
Housing material			GD-Zn nickel-plated					
Contact material			CuZn, gold-plated 0.2 µm					
Mating cycles			100					
Contact carrier material			PA66					
Sealings			FKM					
Protection mode (locked)			IP67					
UL/CSA Approvals			cURus					
E-file number			E153698					
RoHS (EU)			Compliant with Directive 2011/65/EU					
RoHS (China)			according to directive SJ/T 11364, EFUP 50					
Identification "B"			Black					

1) 2) Related to the maximum possible contact size within the respective plug-in connector size. Observe reducing factors, like smaller contacts, cable cross-sections, temperature, local regulations.

Latest amendment: 2024-04-22

Table 1: Cable connector

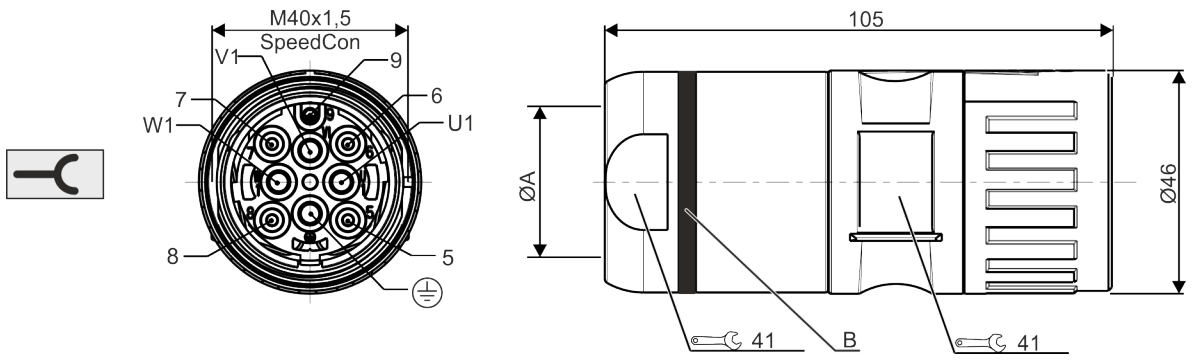


Fig. 1: RLS4031/CM03, RLS4041/CM05
 ØA Clamping range see "Technical data"
 B Identification see "Technical data"

2 RLS40x2 Technical data

Technical data



Designation	Symbol	Unit	RLS4002/ CM01	RLS4002/ CM02	RLS4012/ CM04	RLS4012/ CM06	RLS4032/ CM03	RLS4042/ CM05
Material number (accessory)			R911388430	R911388431	R911388432	R911388433	R911380334	R911378241
Type			Cable coupling					
Connector size			M40					
Mode of locking			SpeedCon					
Cable type			REL0105	REL0106	REL0108	REL0109	REL0107	-
Clamping range ØA	D	mm	9 ... 14.5		14.0 ... 20.5		12.5 ... 17.0	6.5 ... 9.5
Coding			Bosch specific pole pattern					
Number of poles plug-in connectors			3+PE+5					
Contacts (amount and size)			4x (1.0 ... 2.5) + 5x (0.75 ... 1.5)		4x (2,5 ... 4.0) + 5x (0.75 ... 1.5)		4x (1.0 ... 2.5) + 5x (0.75 ... 1.5)	
Maximum rated current plug-in connector power ¹⁾	I _{NP}	A	40 A (CSA) 65 A (UL)					
Maximum rated current plug-in connector signal ²⁾	I _{NS}	A	20 A (CSA) 30 A (UL)					
Mass	m	kg	0.450			0.440		
Contact design			Pin					
Connection design			Crimp					
Rated voltage power contact	U _{NP}	V	600					
Rated voltage signal contact	U _{NS}	V	125					
Overtoltage category			III					
Resistor	R	mOhm	< 3					
Temperature range	T _a	°C	-40 ... 125					
Installation altitude	h	m	3000					
Pollution degree			3					
Housing material			GD-Zn nickel-plated					
Contact material			CuZn, gold-plated 0.2 µm					
Mating cycles			100					
Contact carrier material			PA66					
Sealings			FKM					
Protection mode (locked)			IP67					
UL/CSA Approvals			cURus					
E-file number			E153698					
RoHS (EU)			Compliant with Directive 2011/65/EU					
RoHS (China)			according to directive SJ/T 11364, EFUP 50					
Identification "B"			Black					

1) 2) Related to the maximum possible contact size within the respective plug-in connector size. Observe reducing factors, like smaller contacts, cable cross-sections, temperature, local regulations.

Latest amendment: 2024-04-22

Table 2: Cable coupling

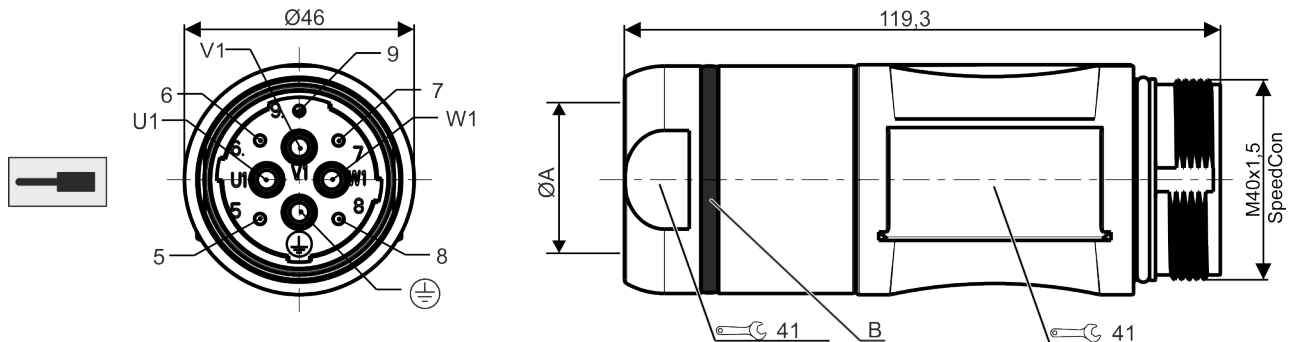


Fig. 2: RLS4032/CM03, RLS4042/CM05

ØA Clamping range / cable diameter see "Technical data"

B Identification see "Technical data"

3 RLS40x3 Technical data

Technical data



Designation	Symbol	Unit	RLS4003/C03	RLS4003/C06
Material number (accessory)			R911383818	R911383819
Type			Flange socket	
Connector size			M40	
Mode of locking			SpeedCon	
Cable type			REL0107	REL0109
Clamping range ØA	D	mm	-	
Coding			Bosch specific pole pattern	
Number of poles plug-in connectors			3+PE+5	
Contacts (amount and size)			4x (1.0 ... 2.5) + 5x (0.75 ... 1.5)	4x (4,0 ... 6.0) + 5x (0.75 ... 1.5)
Maximum rated current plug-in connector power ¹⁾	I _{NP}	A	40 A (CSA) 65 A (UL)	
Maximum rated current plug-in connector signal ²⁾	I _{NS}	A	20 A (CSA) 30 A (UL)	
Mass	m	kg	0.110	
Contact design			Pin	
Connection design			Crimp	
Rated voltage power contact	U _{NP}	V	600	
Rated voltage signal contact	U _{NS}	V	125	
Overvoltage category			III	
Resistor	R	mOhm	< 3	
Temperature range	T _a	°C	-40 ... 125	
Installation altitude	h	m	3000	
Pollution degree			3	
Housing material			GD-Zn nickel-plated	
Contact material			CuZn, gold-plated 0.2 µm	
Mating cycles			100	
Contact carrier material			PA66	
Sealings			FKM	
Protection mode (locked)			IP67	
UL/CSA Approvals			cURus	
E-file number			E153698	
RoHS (EU)			Compliant with Directive 2011/65/EU	
RoHS (China)			according to directive SJ/T 11364, EFUP 50	
Identification "B"			Black	

1) 2) Related to the maximum possible contact size within the respective plug-in connector size. Observe reducing factors, like smaller contacts, cable cross-sections, temperature, local regulations.

Latest amendment: 2018-12-19

Table 3: Flange socket

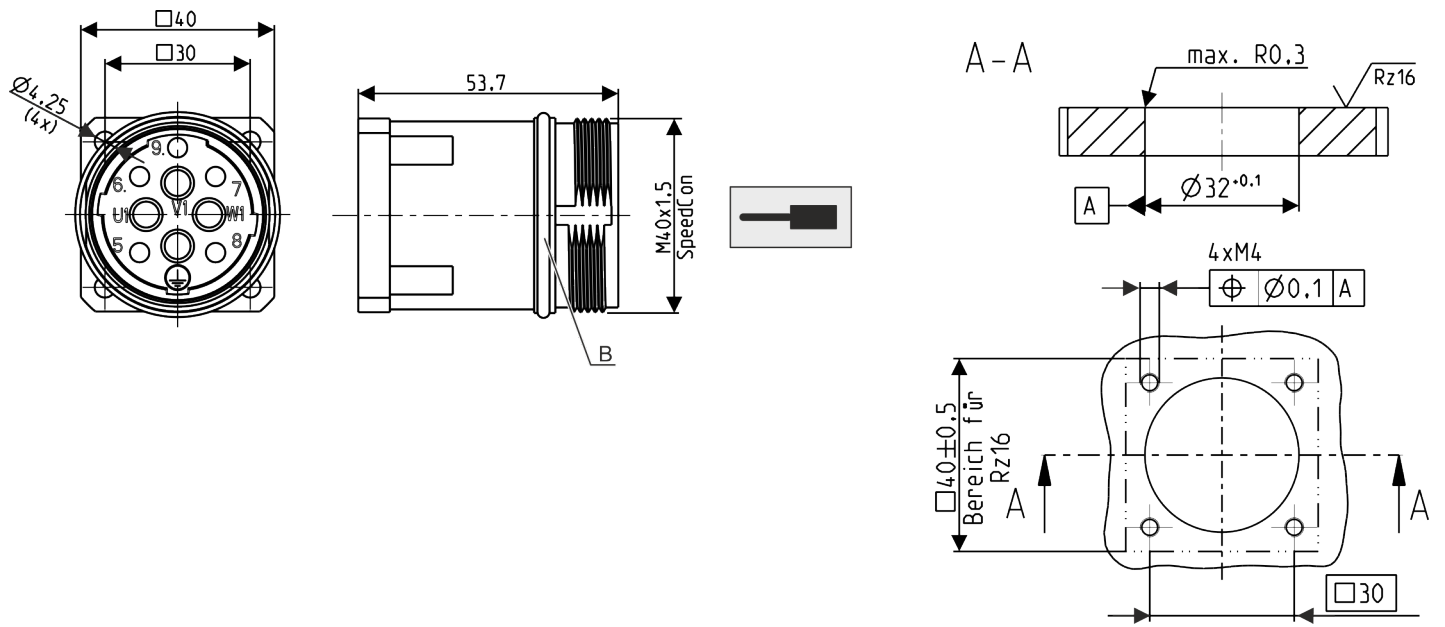


Fig. 3: RLS4003/CM03, RLS4003/CM06
 B Identification see "Technical data"

4 RLS40xx Square mounting flange

Technical data

Designation	Connector accessories
Material number (accessory)	R911388659
Square mounting flange, 4x Ø4.2 for assembly on	RLS40x1/xxxx RLS40x2/xxxx

Table 4: Square mounting flange

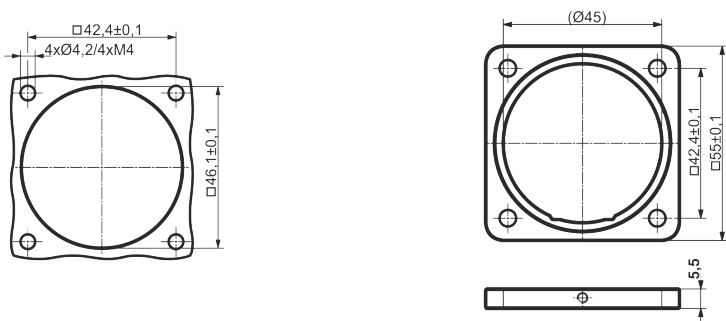


Fig. 4: Square mounting flange

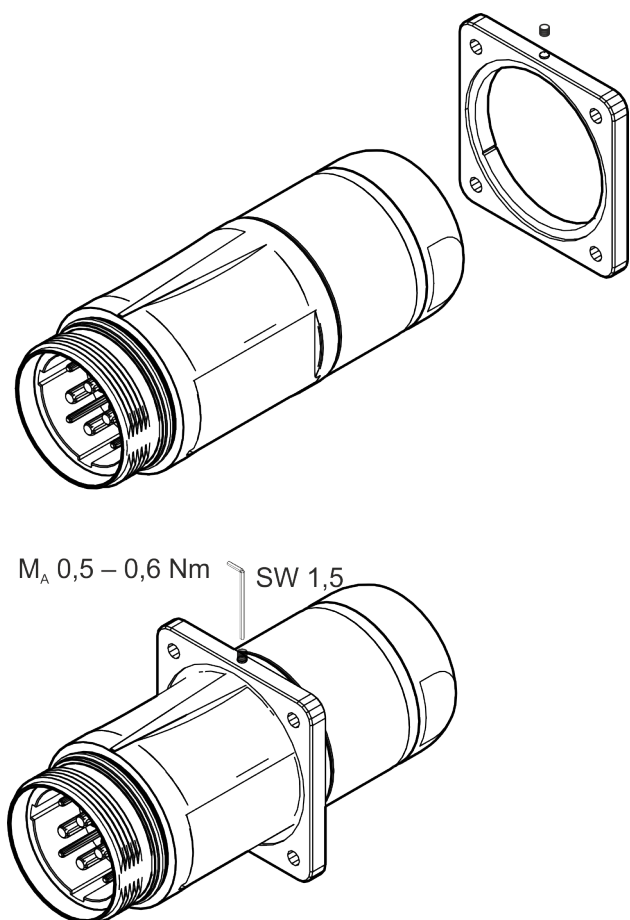


Fig. 5: Assembly square mounting flange