

8BCR0020.3111A-0

1 General information

- Extremely flexible
- Assembled specifically for use with ACOPOSmulti drive systems and B&R servo motors
- speedtec - Innovative connector system for secure connections

2 Order data

Order number	Short description	Figure
8BCR0020.3111A-0	Resolver cables ACOPOSmulti resolver cable, length 20 m, 3x 2x 0.22, 12-pin female springtec resolver connector, 9-pin male DSUB servo connector	

Table 1: 8BCR0020.3111A-0 - Order data

3 Technical data

Order number	8BCR0020.3111A-0
General information	
Cable cross section	3x 2x 0.22 GN
Durability	Oil resistance per DIN VDE 0281-1 (TM5) (HD 21.1 / DIN EN 60811-1-1/2-1), flame resistance per IEC 60332-1-2 ¹⁾
Certifications	
CE	Yes
UKCA	Yes
UL	cULus E225616 Power conversion equipment
Cable construction	
Signal line	
Quantity	6
Wire insulation	PVC
Wire colors	White/Brown, green/yellow, gray/pink
Variant	Tinned copper stranded wire
Cross section	0.22 mm
Shield	No
Stranding	White with brown, green with yellow, gray with pink
Cable stranding	The 3 pairs together covered by foil shield
Cable shield	Copper braiding, optical coverage ≥90% and foil shield
Outer jacket	
Material	PVC
Color	Green
Connector	
Type	12-pin female speedtec resolver connector
Mating cycles	<500
Contacts	12
Additional connectors	9-pin male DSUB servo connector Mating cycles: <200 Contacts: 9 Degree of protection per EN 60529: IP20 when connected
Degree of protection per EN 60529	IP66/67 when connected
Electrical properties ¹⁾	
Test voltage	
Wire - Wire	1.5 kV
Wire - Shield	0.8 kV
Conductor resistance	
Signal line	≤86 Ω/km
Insulation resistance	≥20 MΩ*km
Ambient conditions ¹⁾	
Temperature	
Moving	-20°C to +80°C
Static	-20°C to +90°C

Table 2: 8BCR0020.3111A-0 - Technical data

Order number	8BCR0020.3111A-0
Mechanical properties ¹⁾	
Dimensions	
Length	20 m
Diameter	6.3 mm ±0.2 mm
Bend radius	
Single bend	≥26 mm
Moving	≥52 mm
Weight	1.1 kg

Table 2: 8BCR0020.3111A-0 - Technical data

1) Values refer to the raw cable being used.

4 Wiring

4.1 Design

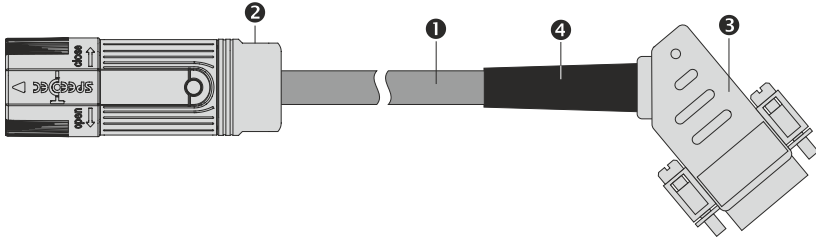
		
Pos.	Description	Note
1	Encoder line	3x 2x 24 AWG
2	12-pin female circular connector	Dimensions: ø 26 x 58 mm
3	DSUB housing 45°, metal-plated, 9-pin	Dimensions: 31 x 15 x 40 mm
4	Kink protection	

Table 3: 8BCR resolver cables - Construction

4.2 Pinout

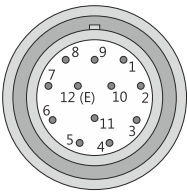
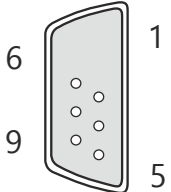
Circular connector	Pin	Description	Function	Pin	DSUB connector
	1	---			
	2	---			
	3	S4	Sine input +	3	
	4	S1	Cosine input -	4	
	5	R2	Reference output +	5	
	6	---			
	7	S2	Sine input -	7	
	8	S3	Cosine input +	8	
	9	R1	Reference output -	9	
	10	---			
	11	---			
	12	---			

Table 4: 8BCR resolver cables - Pinout

4.3 Cable diagram

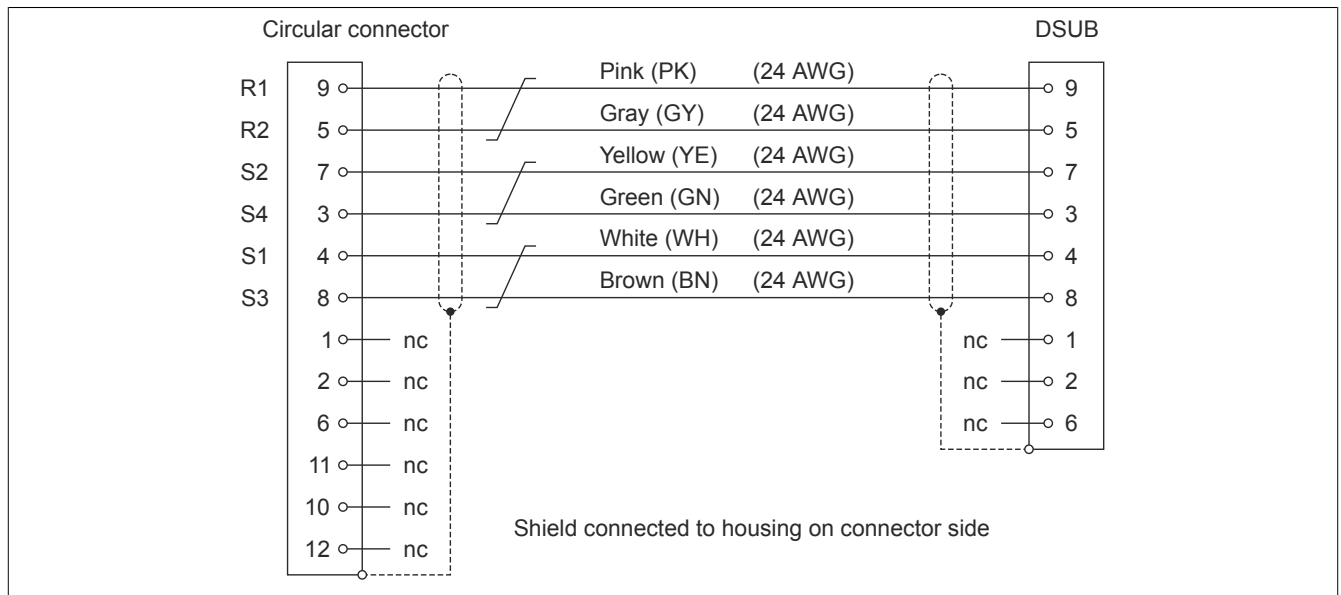


Figure 1: 8BCR resolver cables - Cable diagram