

M23 SERVO CABLE

specification: 6FX8002-5CA01-1BA0

Power cable for SINAMICS S120 and Motors with M23 connection

Female straight - pre-wired terminals

M23, 6-pole

4-pole used

shielded

Further cable lengths on request.

Plastic housings with good resistance against chemicals and oils.

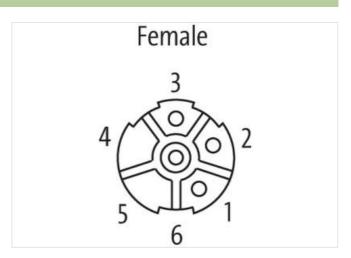
The resistance to aggressive media should be individually tested for your application. Further details on request.

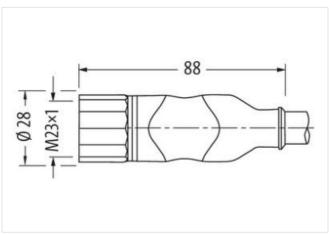
Power cores: 12 A (1.5 mm²), 15 A (2.5 mm²); brake cores: 5 A (1.5 mm²)

Link to Product

Illustration







Product may differ from Image

Cable length	10 m	
Side 1		
Tightening torque	2 Nm	
Family construction form	M23	
Thread	M23 x 1	



stay connected

suitable for corrugated tube (internal Ø)	16 mm	
Width across flats	SW27	
Commercial data		
ECLASS-6.0	27279218	
ECLASS-6.1	27279218	
ECLASS-7.0	27279218	
ECLASS-8.0	27279218	
ECLASS-9.0	27060327	
ECLASS-10.1	27060311	
ECLASS-11.1	27060311	
ECLASS-12.0	27060327	
ETIM-5.0	EC001855	
customs tariff number	85444290	
GTIN	4048879507851	
Packaging unit	1	
Electrical data Supply		
Operating voltage AC max.	630 V	
Operating voltage DC max.	630 V	
Device protection Electrical		
Degree of protection (EN IEC 60529)	IP65, IP67	
Additional condition protection degree	inserted, screwed	
Pollution Degree	3	
Rated surge voltage	6 kV	
Material group (IEC 60664-1)	I	
Mechanical data Material data		
Coating locking	nickel plated	
Material housing	PUR	
Locking material	Brass	
Mechanical data Mounting data		
Mounting method	inserted, screwed, Shaking protection	
Environmental characteristics Climatic		
Operating temperature min.	-25 °C	
Operating temperature max.	85 °C	
Additional condition temperature range	depending on cable quality	
Important installation notes		
Note on strain relief	Protect the connectors by suitable measures from mechanical loads, e.g. by the usage of cable ties.	
Note on bending radius	Attention: Observe the permissible bending radii when laying cables, as the IP protection class can be endangered by excessive bending forces.	
Installation Cable		
wire arrangement	black W/L3/D/L-, black U/L1/C/L+, black V/L2, green-yellow	
Cable identification	854	
Jacket Color	orange	
Type of Certificate	cURus	
Amount stranding	1	
Stranding	4 wires with Filler twisted	
Cable shielding (type)	copper braid, tinned	
Cable shielding (coverage)	85 %	
Banding	Fiber tape, Fleece	
Filler	yes	
wire arrangement	black W/L3/D/L-, black U/L1/C/L+, black V/L2, green-yellow	

The information in this Product-PDF has been compiled with the utmost care. Liability for the correctness completeness and topicality of the information is restricted to gross negligence. Version: 2024-05-20



stay connected

Material jacket	TMPU
Freedom from ingredients (jacket)	lead-free, CFC-free, halogen-free, silicone-free
Outer-diameter (jacket)	8,6 mm
Tolerance outer diameter (sheath)	±5%
Material wire insulation (Power)	TPM
Outer diameter wire insulation (Power)	2,4 mm
Tolerance outer diameter wire insulation (Power)	±5 %
Ingredient freeness wire insulation (Power)	lead-free, CFC-free, halogen-free, silicone-free
Printing colour wire insulation (Power)	white (isolation black)
Amount wires (Power)	4
Amount strands wire (Power)	84
Diameter of single wires (Power)	0,15 mm
Wire conductor cross section (Power)	1,5 mm²
Material conductor wire (Power)	Stranded copper wire, bare
Conductor type wire (Power)	strand class 6
Max. rated voltage (conductor - conductor)	1000 V
Max. rated voltage (conductor - ground)	600 V
Current load capacity (standard)	to DIN VDE 0298-4
Current carrying capacity min. wire (Power)	14,4 A
Electrical resistance coating wire (Power)	13,7 Ω/km @20 °C
AC withstand voltage (wire - wire)	4 kV @ 300 s
Electrical capacity line constant (wire - wire)	90000 pF/km
Electrical capacity line constant (wire - shield)	160000 pF/km
Power frequency withstand voltage (wire - jacket)	4 kV @ 300 s
AC withstand voltage (wire - shield)	4 kV @ 300 s
Isolation resistance	2500 MΩ × km
Electrical capacity line constant (wire - shield) (power)	200000 pF/km
Electrical capacity line constant (wire - wire) (power)	120000 pF/km
AC withstand voltage power (wire - shield)	4 kV @ 300 s
Power frequency withstand voltage power (wire - jacket)	4 kV @ 300 s
AC withstand voltage power (wire - wire)	4 kV @ 300 s
Min. operating temperature (static)	-30 °C
Max. operating temperature (fixed)	80 °C
Operating temperature min. (dynamic)	-30 °C
Operating temperature max. (dynamic)	80 °C
Flame resistance	UL 1581 § 1090 IEC 60332-2-2 UL 1581 § 1100 FT2
chemical resistance	Good, application-related testing
Gasoline resistance	Good, application-related testing
Oil resistance	DIN EN 60811-404 Good, application-related testing
Bending radius (fixed)	4 x Outer diameter
Bending radius (dynamic)	7,5 x Outer diameter
No. of bending cycles (C-track)	10 Mio. @ 25 °C
Traversing distance (C-track)	50 m @ 25 °C horizontal
Travel speed (C-track)	5 m/s @ 25 °C
Torsion stress	± 30 °/m