CE UL cUL

NEW

ÖLFLEX® SERVO FD 7DSL

Low capacitive hybrid servo cable with PUR outer sheath for highly dynamic power chain application – certified

LAPP KABEL STUTTGART ÖLFLEX® SERVO FD 7DSL CE

Info

- OCS - One Cable Solution
- Suitable for Hiperface DSL® motor-feedback systems
- Extended Line for heavy duty in power chain applications

Benefits

- Allows much faster speed and accelerations which increases the economic efficiency of the machines
- Only one connection line between drive and motor-feedback system. Instead of the encoder cable an integrated DSL pair takes over the signalling.
- Less cables and reduced connection costs
- Space and weight savings thanks to hybrid cable design
- Increased durability under harsh conditions thanks to robust PUR outer sheath
- Resistant to contact with many mineral oil-based lubricants, diluted acids, aqueous alkaline solutions and other chemical media

Application range

- Power drive systems in automation engineering
- Connecting cable between servo controller and motor
- In power chains or moving machine parts
- For use in assembling & pick-and-place machinery
- Particularly in wet areas of machine tools and transfer lines

Product features

- Dynamic power chain performance: Acceleration up to 50 m/s². Travel speeds up to 5 m/s. Travel distances up to 20m.
- Maximum DSL transmission lenght: 100m
- Flammability: UL/CSA: VW-1, FT1 IEC/EN: 60332-1-2
- Halogen-free materials
- Low-capacitance design
- Oil-resistant

Norm references / Approvals

- UL AWM Style 21223 cRU AWM I/II A/B FT1
- UL File No. E63634
- For use in power chains: Please comply with assembly guideline Appendix T3

Product Make-up

- Extra-fine-wire, bare copper conductor (power cores and control pair) and 19-wire, tinned copper conductor (signal pair)
- Core insulation: polypropylene (PP)
- Individual design depending on the item: power cores without or with one screened control pair and one DSL signal pair twisted together
- Non-woven wrapping
- Tinned-copper braiding
- PUR outer sheath, orange (RAL 2003)

Technical data

Classification
ETIM 5.0 Class-ID: EC000104
ETIM 5.0 Class-Description: Control cable

Core identification code
Power cores: black with marking U/L1/C/L+; V/L2; W/L3/D /L-; GN/YE protective conductor
Signal pair: white, blue
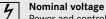Control pair (optional): black with white numbers 5 + 6

Conductor stranding
Extra-fine wire according to VDE 0295, class 6/IEC 60228 class 6
DSL pair: 19-wired

Minimum bending radius
For flexible use:
7.5 x outer diameter
Fixed installation: 5 x outer diameter

Nominal voltage
Power and control:
IEC: U_0/U: 600/1000 V
UL: 1000 V
Signal pair: 300 V

Test voltage
Power and control: 4 kV
Signal pair: 1kV

Protective conductor
G = with GN-YE protective conductor

Alternating bending cycles
10 mio. cycles

Temperature range
Flexing: -40°C to +90°C (UL: +80°C)
Fixed installation: -50°C to +90°C (UL: +80°C)

Article number	Number of cores and mm² per conductor	Outer diameter (mm)	Copper index (kg/km)	Weight (kg/km)
ÖLFLEX® SERVO FD 7DSL				
Hybrid cables for power chain applications				
1023275	4 G 1,5 + (2 x 22AWG)	11,2	115	198
1023276	4 G 2,5 + (2 x 22AWG)	12,6	160	269
1023277	4 G 4 + (2 x 22AWG)	14	218	343
1023274	4 G 1 + (2 x 0,75) + (2 x 22AWG)	11,8	133	202
1023278	4 G 1,5 + (2 x 1,0) + (2 x 22AWG)	13,2	152	256
1023279	4 G 2,5 + (2 x 1,0) + (2 x 22AWG)	14	195	313
1023280	4 G 4 + (2 x 1,0) + (2 x 22AWG)	15,8	268	407

Unless specified otherwise, the shown product values are nominal values. Detailed values (e.g. tolerances) are available upon request.
Please find our standard lengths at: www.lappkabel.de/en/cable-standardlengths
HIPERFACE DSL® is a registered trademark of SICK AG
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Similar products

Accessories

- Protective cable conduit systems and cable carrier systems
- Circular connectors

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