

ÖLFLEX® ROBOT 900 DP

Shielded, abrasion- and oil-resistant PUR robot cable for dynamic bending and torsion motions

ÖLFLEX® ROBOT 900 DP - Screened power and control cable für bending and torsional load in harsh environmental conditions

Info

Simultaneous bending and torsion

Torsion angle up to $\pm 180^\circ/\text{m}$

Copper screening



Supplementary automation components from Lapp



Suitable for outdoor use



Cold-resistant



Mechanical resistance



Oil-resistant



Power chain



Interference signals



Torsion-resistant

Last Update (14.07.2026)

©2026 Lapp Group - Technical changes reserved

Product Management www.lappkabel.de

You can find the current technical data in the corresponding data sheet.

PN 0456 / 02_03.16

ÖLFLEX® ROBOT 900 DP



UV-resistant

Benefits

Space-saving installation due to small cable diameters
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
Wide temperature range for applications in harsh climatic environments
Copper shielding protects against electromagnetic interference

Application range

Industrial machinery and machine tools
Automated handling equipment
Automotive industry
In power chains or moving machine parts
Inside of dresspacks of buckling arm robots and for use for gantry robots

Product features

Abrasion and notch-resistant
Flame-retardant
High oil-resistance
Flexible at low temperatures
Low-adhesive surface

Norm references / Approvals

Designed for up to 5 million torsion cycles
For use in power chains: Please comply with assembly guideline Appendix T3
For travel distances up to 10 m

Product Make-up

Fine or extra-fine strands made of bare copper wire
Core insulation: TPE
Cores twisted in layers
Wrapping of PTFE tape
Spiral shield made of tinned copper wires
PUR outer sheath, black (similar RAL 9005)

Technical Data

Classification ETIM 5:	ETIM 5.0 Class-ID: EC000104 ETIM 5.0 Class-Description: Control cable
Classification ETIM 6:	ETIM 6.0 Class-ID: EC000104 ETIM 6.0 Class-Description: Control cable
Core identification code:	Up to 0.34 mm ² : DIN 47100 cores From 0.5 mm ² : black cores with white numbers
Mutual capacitance:	C/C approx. 100 nF/km C/S approx. 120 nF/km
Inductivity:	approx. 0.7 mH/km
Conductor stranding:	Fine wire or extra-fine wire
Torsion:	Torsion load max. $\pm 180^\circ$ /m

Last Update (14.07.2026)

©2026 Lapp Group - Technical changes reserved

Product Management www.lappkabel.de

You can find the current technical data in the corresponding data sheet.

PN 0456 / 02_03.16

ÖLFLEX® ROBOT 900 DP

Minimum bending radius:	Flexing: 15 x outer diameter Fixed installation: 4 x outer diameter
Nominal voltage:	Up to 0,34 mm ² : 48 V AC From 0.5 mm ² U0/U: 300/500 V
Test voltage:	Up to 0.34 mm ² : 1500 V From 0.5 mm ² : 3000 V
Protective conductor:	G = with GN-YE protective conductor X = without protective conductor
Temperature range:	Flexing: -40 °C to +80 °C Fixed installation: -50 °C to +80 °C

Note

Unless specified otherwise, the shown product values are nominal values at room temperature. Detailed values (e.g. tolerances) are available upon request.

Copper price basis: EUR 150/100 kg. Refer to catalogue appendix T17 for the definition and calculation of copper-related surcharges.

Please find our standard lengths at: www.lappkabel.de/en/cable-standardlengths

Packaging size: coil ≤ 30 kg or ≤ 250 m, otherwise drum

Please specify the preferred type of packaging (e.g. 1 x 500 m drum or 5 x 100 m coils).

Photographs and graphics are not to scale and do not represent detailed images of the respective products.

Prices are net prices without VAT and surcharges. Sale to business customers only.

ÖLFLEX® ROBOT 900 DP

Article number	Number of cores and mm ² per conductor	Outer diameter [mm]	Copper index (kg/km)	Weight (kg/km)
0028100	12 x 0,14	6.7	42.5	69
0028105	3 x 2 x 0,14	6.2	17	44
0028126	25 x 0,25	11.1	103.5	183
0028135	4 x 0,34	5.7	21.3	46
0028136	5 x 2 x 0,34	9.1	64.4	114
Numbered Cores				
0028195	12 G 1,5	14.0	259	395

Last Update (14.07.2026)

©2026 Lapp Group - Technical changes reserved

Product Management www.lappkabel.de

You can find the current technical data in the corresponding data sheet.

PN 0456 / 02_03_16