

RADOX[®] high-voltage cables

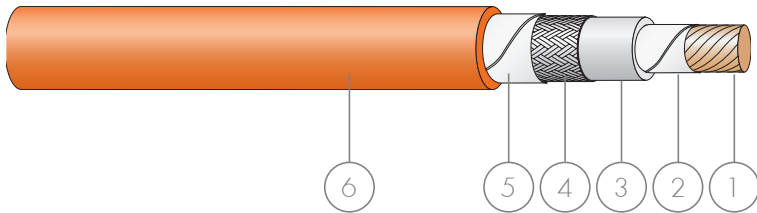


HUBER+SUHNER is one of the first companies to offer a complete range of shielded RADOX power cables for safe and reliable energy transfer in hybrid and electric vehicles. In compliance with ISO 6722, this also includes the intermediate cross sections 8, 12, 20, 30, 40 and 60 mm² (in addition to previous portfolio from 1.5 to 150 mm²).

The cable shielding prevents interference with sensors and electronics by the particularly high currents in the vehicle space. Thanks to electron-beam crosslinked insulation, RADOX high-voltage cables guarantee durable and safe connections.

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Number of conductors	1
Cross section	1.5 to 150 mm ²
Voltage rating	600 / 1000 V AC
Temperature range	-55 to +150 °C (3000 h)
Min. bending radius	4 x cable dia.



Composition of cable

1	Conductor	stranded bare copper
2	Tape	plastic
3	Insulation	RADOX [®] 155S for 1.5, 2.5, 4.0, 6.0 mm ² ; RADOX [®] 155 for > 6 mm ²
4	EMC screen	tin plated copper braid optimised
5	Tape	plastic or aluminium screen (optional)
6	Sheath	RADOX [®] Elastomer S, colour: orange

Characteristics and specialities

- Excellent high and low temperature resistance
- Ozone and weathering resistance
- Outstanding resistance against petrol, diesel, various oils, engine coolant and window washer fluids
- Resistance against humidity, battery acid and brake fluids
- Flame retardant
- Easy to strip and process

Application

Screened power cable for use in hybrid and electrical vehicles.

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Standards

Conductor	General
ISO 6722	ISO 6722 class D, thin wall
DIN EN 13602, Cu-ETP1-A (CW003A)	LV 216

For further technical details please refer to our data sheet.

Extract from our delivery programme

Cross section mm ²	Conductor				Core				Weight kg/100 m nom.
	Number of individual wires guide value	Diameter of individual wires max. mm	Diameter max. mm	Resistance at 20 °C max. Ω/km	Diameter of insula- tion nom. mm	Diameter of screen max. mm	Overall diameter mm	Z _T at < 30MHz nom. m Ω/m	
1.5	19	0.32	1.7	12.700	2.30	2.8	3.90 ± 0.20	150	3.2
2.5	50	0.26	2.0	7.600	2.85	3.3	5.00 ± 0.20	100	4.8
4	56	0.31	2.5	4.710	3.55	4.0	5.80 ± 0.20	110	6.9
6	84	0.31	3.0	3.140	4.15	4.7	6.60 ± 0.30	70	9.7
8	60	0.41	3.8	2.380	5.05	5.6	7.60 ± 0.30	70	12.5
10	78	0.41	4.3	1.820	5.75	6.3	8.40 ± 0.30	70	15.6
12	92	0.41	4.7	1.520	6.10	6.7	8.90 ± 0.30	60	18.0
16	126	0.41	5.4	1.160	6.90	7.5	9.70 ± 0.30	50	23.0
20	154	0.41	6.2	0.955	7.60	8.3	10.60 ± 0.30	50	27.9
25	189	0.41	6.7	0.743	8.20	8.9	11.20 ± 0.30	50	33.0
30	224	0.41	7.4	0.647	9.10	9.8	12.10 ± 0.30	50	38.2
35	273	0.41	7.9	0.527	9.70	10.4	12.70 ± 0.30	40	44.8
40	301	0.41	8.5	0.473	10.40	11.3	13.60 ± 0.30	40	50.9
50	385	0.41	9.4	0.368	11.50	12.6	14.90 ± 0.30	30	63.2
60	294	0.51	10.5	0.315	12.60	13.5	15.90 ± 0.30	30	73.4
70	360	0.51	11.6	0.259	13.70	14.6	17.00 ± 0.30	20	85.0
95	480	0.51	13.5	0.196	16.25	17.4	19.90 ± 0.40	20	114.2
120	589	0.51	15.1	0.153	18.00	19.1	22.60 ± 0.40	20	145.0
150	741	0.51	17.0	0.122	20.00	21.3	24.90 ± 0.50	20	177.4

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HUBER+SUHNER is certified according to EN 9100,
ISO 9001, ISO 14001, ISO/TS 16949 and IRIS.

Waiver

Fact and figures herein are for information only and do not represent any warranty of any kind.