



Traction cable

RADOX TENUIS-TW 600V MM S

Product description:

RADOX TENUIS-TW 600V MM S multicore cables, screened (overall screen)
 Nominal voltage: 600 / 1000 V AC
 Hazard level: M (extra low temperature, extra oil and extra fuel resistant)

General features:

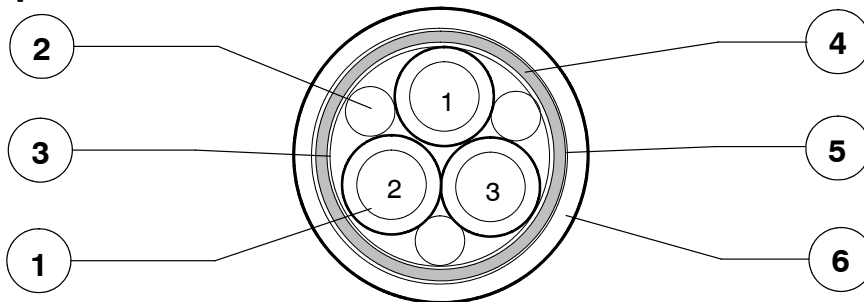
Halogen free, electrom- beam cross- linked cables with improved behaviour in case of fire, easy to strip, soldering iron resistant and flexible.

Application:

The cables are intended for permanent installation in rail vehicles or for applications in which a limited alternating bending stress occur during service.

Guidelines for selection and installation are described in the standards EN 50355 and EN 50343.

General composition of cable:



- | | |
|---|---|
| <ol style="list-style-type: none"> 1. Twisted cores
RADOX TENUIS-TW 600V 2. Filler (optional) 3. Separator (optional) 4. EMC- screen 5. Separator 6. Sheath | <p>Conductor: stranded tin plated copper, acc. to EN 50306- 2
 Insulation: RADOX EI 303
 Colours: white, black numbered
 other colours on request</p> <p>RADOX 125 REC
 Tape
 Tin plated copper braid
 Tape
 RADOX EM 104, acc. to EN 50264- 1
 Colour : black, yellow marked</p> |
|---|---|

Marking:

[a] HUBER+SUHNER RADOX TENUIS- TW 600V [b] MM S [c]- [d] [e] [f]

[a]	Meter marking (in m)	example: = 1234 = m
[b]	Construction	3X1.5
[c]	Part number	12345678
[d]	Batch number	1234567
[e]	Production week and year	03- 2017
[f]	Production place (only if China)	CN

Copyright 2018 HUBER+SUHNER AG. This document may not be amended and its content is confidential. It may not be passed on to third party which are not bound by confidentiality.

The product fulfils the test and specification requirements described in this document for the stated areas of application and operating conditions. HUBER+SUHNER AG does not expressly or implicitly guarantee performance under additional or changed conditions. Deviations are to be agreed upon in writing.

HUBER+SUHNER AC
Low Frequency Division
 CH- 8330 Pfäffikon
 +41 (0)44 952 22 11
 +41 (0)44 952 26 40
www.hubersuhner.com



Traction cable

RADOX TENUIS-TW 600V MM S

Technical data:

Voltage rating cond.- earth	.....	U_0	.....	600	.....	V AC
Voltage rating cond.- cond.	.....	U	.....	1000	.....	V AC
maximum permissible Voltage rating AC cond.- earth	.....		.....	720	.....	V AC
maximum permissible Voltage rating AC cond.- cond.		U_m	.....	1200	.....	V AC
maximum permissible Voltage rating DC cond.- earth		V_0	.....	900	.....	V DC
maximum permissible Voltage rating DC cond.- cond.	.....		.....	1500	.....	V DC
Test voltage	.....		.....	3500	.....	V AC
Temperature range	.....		.....	-50 ... + 120	.....	°C

Min. bending radius

fixed installation	.....	cable diameter \leq 12 mm	.....	3 x D
		cable diameter $>$ 12 mm	.....	4 x D
sporadic movement	.....	cable diameter \leq 12 mm	.....	4 x D
		cable diameter $>$ 12 mm	.....	5 x D

NB:

The upper temperature limit is determined by long term ageing according to EN 50305 Par. 7 and extrapolation to 20,000 hours.

The lower temperature limit is determined by bending and elongation tests according to EN60811- 1- 4 Par. 8, respectively low temperature behaviour tests according to GOST 20.57.406- 81, method 204- 1 and GOST 17491- 80.

The specified bending radii require a careful and proper handling using proven fastening technologies.



Traction cable

RADOX TENUIS-TW 600V MM S

The cables are in conformity with:

Fire protection on railway vehicles, category	la, lb, ll	BS 6853, GM/RT 2130
Vertical flame spread	$50 < L \leq 540$ mm	EN 60332- 1- 2
Vertical flame spread, bunched	$L \leq 2.5$ m	EN 50266, BS 6853 An. D.8.7
Smoke density	$A_0 \leq$ BS 6853	BS 6853 An. D.8.7
Toxicity	$R \leq 1.0$	BS 6853 An. B.1
Fire protection on railway vehicles, hazard level	HL1 - HL3	EN 45545
Vertical flame spread	$50 < L \leq 540$ mm	EN 60332- 1- 2
Vertical flame spread, bunched, $D \leq 6$ mm	$L \leq 1.5$ m	EN 50305, 9.1.2
Vertical flame spread, bunched, $6 < D < 12$ mm	$L \leq 2.5$ m	EN 50305, 9.1.1 (EN 60332-3- 25)
Vertical flame spread, bunched, $D \geq 12$ mm	$L \leq 2.5$ m	EN 60332- 3- 24
Smoke density	$T \geq 70$ %	EN 61034- 2
Toxicity	$ITC \leq 6$	EN 50305, 9.2
Fire protection on railway vehicles, level of protection	1 - 4	DIN 5510
Vertical flame spread	$50 < L \leq 540$ mm	EN 60332- 1- 2
Vertical flame spread, bunched, $D \leq 6$ mm	$L \leq 1.5$ m	EN 50305, 9.1.2
Vertical flame spread, bunched, $6 < D < 12$ mm	$L \leq 2.5$ m	EN 60332- 3- 25
Vertical flame spread, bunched, $D \geq 12$ mm	$L \leq 2.5$ m	EN 60332- 3- 24
Smoke density	$T \geq 60$ %	EN 61034- 2
Corrosivity of combustion gases	$pH \geq 4.3, C \leq 10$ μ S/mm	EN 50267- 2- 2
Amount of halogen acid gas	$HCl + HBr \leq 0.5$ %	EN 50267- 2- 1
Content of fluorine	$HF \leq 0.1$ %	EN 60684- 2, 45.2
Toxicity, insulation	$ITC \leq 6$	EN 50305, 9.2
Toxicity, filler and sheath	$ITC \leq 3$	EN 50305, 9.2
Fire protection on railway vehicles, category	A1, A2, B	NF F16- 101
Fire protection on railway vehicles, class	C / F0	NF F16- 101
Vertical flame spread	$50 < L \leq 540$ mm	NF C32- 070, 2.1
Vertical flame spread, bunched	$L \leq 300$ mm	NF C32- 070, 2.2
Smoke index	$I.F. \leq 5$	X10- 702- 2, NF X70- 100- 1
Fire protection on railway vehicles	Fulfilled	NFPA 130
Vertical flame spread, bunched	$L \leq 1.5$ m	UL 1685, 12 (FT4 exp.)
Smoke density	$TSR \leq 150$ m ² , $PSRR \leq 0.40$ m ² /s	UL 1685, 12 (FT4 exp.)
Fire protection on railway vehicles, hazard level	LR1 - LR4	UNI CEI 11170
Vertical flame spread	$50 < L \leq 540$ mm	EN 60332- 1- 2
Vertical flame spread, bunched, $D \leq 6$ mm	$L \leq 1.5$ m	EN 50305, 9.1.2
Vertical flame spread, bunched, $6 < D < 12$ mm	$L \leq 2.5$ m	EN 60332- 3- 25
Vertical flame spread, bunched, $D \geq 12$ mm	$L \leq 2.5$ m	EN 60332- 3- 24
Smoke density	$T \geq 70$ %	EN 61034- 2
Corrosivity of combustion gases	$pH \geq 4.3, C \leq 10$ μ S/mm	EN 50267- 2- 2
Amount of halogen acid gas	$HCl + HBr \leq 0.5$ %	EN 50267- 2- 1
Toxicity, insulation	$ITC \leq 6$	EN 50305, 9.2
Toxicity, filler and sheath	$ITC \leq 3$	EN 50305, 9.2
Requirement of hazard level Code M	(according to EN 50264- 1 or EN 50306- 1)	
Extra low temperature	- 40°C	
Extra oil resistance	IRM 902, 72h, 100°C	
Extra fuel resistance	IRM 903, 168h, 70°C	

Applicable Documents:

581998 current rating for multi core cables



Traction cable

RADOX TENUIS-TW 600V MM S

Construction ¹⁾ n x mm ²	Conductor Dia. _{nom.} mm	Core ²⁾ Dia. nom. mm	Cable Dia. mm	R ₂₀ ³⁾ max. Ω/km	C ⁴⁾ core/ core/ core/ screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
2x0.25	0.6	1.17	4.45 ± 0.3	88.5	110	180	279	1.1	3.2	85 032 996
3x0.25	0.6	1.17	4.25 ± 0.3	88.5	110	180	245	1.3	3.0	85 075 937
10x2x0.25	0.6	1.17	11.1 ± 0.4	88.5	70	120	1438	7.8	17.4	85 070 661
24x2x0.25	0.6	1.17	16.3 ± 0.5	88.5	70	120	3045	15.8	35.4	85 067 930

Construction ¹⁾ n x mm ²	Conductor Dia. _{nom.} mm	Core ²⁾ Dia. nom. mm	Cable Dia. mm	R ₂₀ ³⁾ max. Ω/km	C ⁴⁾ core/ core/ core/ screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
2x0.34	0.75	1.3	4.7 ± 0.3	54.7	120	200	304	1.4	3.7	85 070 508
3x0.34	0.75	1.3	4.9 ± 0.3	54.7	120	200	325	1.8	4.2	85 024 293
4x0.34	0.75	1.3	5.25 ± 0.3	54.7	110	180	368	2.2	4.9	85 070 510
24x0.34	0.75	1.3	10.5 ± 0.4	54.7	80	140	1423	11.4	20.5	85 073 629

Construction ¹⁾ n x mm ²	Conductor Dia. _{nom.} mm	Core ²⁾ Dia. nom. mm	Cable Dia. mm	R ₂₀ ³⁾ max. Ω/km	C ⁴⁾ core/ core/ core/ screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
2x0.5	0.9	1.42	4.8 ± 0.3	40.1	130	220	315	1.6	3.9	12 568 117
3x0.5	0.9	1.42	5.3 ± 0.3	40.1	130	220	380	2.1	4.9	12 568 118
4x0.5	0.9	1.42	5.4 ± 0.3	40.1	110	190	380	2.7	5.4	12 568 119
5x0.5	0.9	1.42	6.2 ± 0.3	40.1	100	170	527	3.7	7.2	12 581 351
6x0.5	0.9	1.42	6.5 ± 0.3	40.1	100	160	590	4.4	8.2	12 568 120
7x0.5	0.9	1.42	7.2 ± 0.3	40.1	90	160	751	5.0	9.7	12 583 138
8x0.5	0.9	1.42	7.5 ± 0.3	40.1	90	150	831	5.7	10.9	12 581 352
9x0.5	0.9	1.42	7.9 ± 0.3	40.1	90	150	813	6.2	11.4	12 581 450
10x0.5	0.9	1.42	7.9 ± 0.3	40.1	90	150	839	6.6	11.9	84 112 800
12x0.5	0.9	1.42	8.1 ± 0.3	40.1	90	150	882	7.6	13.0	12 581 353
15x0.5	0.9	1.42	9.0 ± 0.3	40.1	90	150	1114	9.3	16.0	12 582 036
16x0.5	0.9	1.42	9.1 ± 0.3	40.1	90	150	1123	9.8	16.4	12 583 727
20x0.5	0.9	1.42	10.6 ± 0.4	40.1	90	140	1544	12.9	22.2	84 123 311
22x0.5	0.9	1.42	10.9 ± 0.4	40.1	90	140	1670	13.9	23.7	85 003 491
24x0.5	0.9	1.42	11.3 ± 0.4	40.1	90	140	1686	14.8	24.9	84 141 106
25x0.5	0.9	1.42	11.3 ± 0.4	40.1	90	140	1708	15.3	25.4	12 582 037
30x0.5	0.9	1.42	12.3 ± 0.4	40.1	90	140	1992	19.3	31.0	12 582 909
36x0.5	0.9	1.42	13.3 ± 0.4	40.1	90	140	2365	23.0	36.7	12 582 038



Traction cable

RADOX TENUIS-TW 600V MM S

Construction 1) n x mm ²	Conductor Dia. _{nom.} mm	Core 2) Dia. nom. mm	Cable Dia. mm	R ₂₀ 3) max. Ω/km	C 4) core/ core/ core screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
42x0.5	0.9	1.42	14.3 ± 0.4	40.1	90	140	2565	25.2	41.2	12 582 039
2x2x0.5	0.9	1.42	7.2 ± 0.3	40.1	110	190	625	3.6	8.0	12 568 121
3x2x0.5	0.9	1.42	8.1 ± 0.3	40.1	100	160	802	4.8	10.3	12 581 451
4x2x0.5	0.9	1.42	9.3 ± 0.3	40.1	90	150	1076	6.1	13.6	12 568 122
5x2x0.5	0.9	1.42	10.3 ± 0.4	40.1	90	150	1338	7.9	17.0	12 582 041
6x2x0.5	0.9	1.42	11.1 ± 0.4	40.1	90	150	1592	9.3	19.8	12 582 042
8x2x0.5	0.9	1.42	13.5 ± 0.4	40.1	90	150	2422	13.8	29.3	12 583 728
10x2x0.5	0.9	1.42	13.7 ± 0.4	40.1	90	140	1996	15.7	29.0	84 104 571
12x2x0.5	0.9	1.42	13.0 ± 0.3	40.1	90	140	1770	17.5	28.3	12 581 358

Construction 1) n x mm ²	Conductor Dia. _{nom.} mm	Core 2) Dia. nom. mm	Cable Dia. mm	R ₂₀ 3) max. Ω/km	C 4) core/ core/ core screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.	
2x(2x0.5)	0.9	1.42	11.8 ± 0.4	40.1	-	-	1887	8.8	22.5	12 582 040	
5x(3x0.5)	0.9	1.42	14.1 ± 0.4	40.1	-	-	2882	11.3	31.9	12 583 566	6)
6x(3x0.5)	0.9	1.42	14.6 ± 0.3	40.1	-	-	3134	13.6	35.0	12 584 344	5)
2x(6x0.5)	0.9	1.42	15.5 ± 0.5	40.1	-	-	3611	8.8	32.9	85 022 107	5)
2x0.5 + 3x0.75	0.9 1.1	1.42 1.62	7.7 ± 0.3	40.1 26.7	-	-	750	4.9	10.0	85 065 402	7)

5) without additional overall screen

6) without additional overall screen, Tripelmarking 10,20,30,40,50

7) Colour of sheath: violet , 2x0.5 (numbered: 4...5) 3x0.75 (numbered: 1...3)



Traction cable

RADOX TENUIS-TW 600V MM S

Construction 1)	Conductor Dia. nom. mm	Core 2) Dia. nom. mm	Cable Dia. mm	R ₂₀ 3) max. Ω/km	C 4)		Fireload nom. kJ/m	Weight nom.		H + S Part No.
					core/ core	core/ screen		Copper	Cable	
n x mm ²	mm	mm	mm	Ω/km	pF/m	pF/m	kJ/m	kg / 100m	kg / 100m	
2x0.75	11	1.62	5.0 ± 0.3	26.7	150	250	330	2.1	4.6	12 568 514
3x0.75	1.1	1.62	5.4 ± 0.3	26.7	150	250	370	3.0	5.6	12 568 515
3G0.75	1.1	1.62	5.4 ± 0.3	26.7	150	250	370	3.0	5.6	12 583 993
4x0.75	1.1	1.62	6.0 ± 0.3	26.7	120	210	474	4.2	7.4	12 568 516
4G0.75	1.1	1.62	6.0 ± 0.3	26.7	120	210	474	4.2	7.4	12 583 994
5x0.75	1.1	1.62	6.7 ± 0.3	26.7	110	190	611	5.2	9.2	85 063 744
6x0.75	1.1	1.62	7.2 ± 0.3	26.7	110	180	721	6.0	10.6	12 568 517
7x0.75	1.1	1.62	8.0 ± 0.3	26.7	100	170	909	7.0	12.7	12 581 578
8x0.75	1.1	1.62	8.4 ± 0.3	26.7	100	170	1024	7.9	14.2	12 582 045
10x0.75	1.1	1.62	8.7 ± 0.3	26.7	100	170	986	9.3	15.5	12 582 046
12x0.75	1.1	1.62	9.0 ± 0.3	26.7	100	160	1053	10.8	17.2	12 581 354
14x0.75	1.1	1.62	9.8 ± 0.3	26.7	100	160	1235	13.1	20.6	12 584 333
16x0.75	1.1	1.62	10.5 ± 0.4	26.7	100	160	1426	15.0	23.6	12 582 047
18G0.75	1.1	1.62	11.0 ± 0.4	26.7	100	160	1605	16.4	26.0	85 001 068
20x0.75	1.1	1.62	11.1 ± 0.4	26.7	100	160	1495	17.6	27.0	85 111 580
24x0.75	1.1	1.62	12.8 ± 0.4	26.7	100	160	2034	23.3	35.5	12 582 049
25x0.75	1.1	1.62	12.8 ± 0.4	26.7	100	160	2059	23.4	35.6	85 063 741
27x0.75	1.1	1.62	13.2 ± 0.4	26.7	90	160	2198	25.4	38.4	84 114 908
30x0.75	1.1	1.62	13.7 ± 0.4	26.7	90	160	2372	27.6	41.4	84 122 437
37x0.75	1.1	1.62	15.7 ± 0.5	26.7	90	160	3130	33.3	51.7	84 122 439
2x2x0.75	1.1	1.62	8.2 ± 0.3	26.7	120	210	859	4.9	10.7	12 582 050
3x2x0.75	1.1	1.62	9.0 ± 0.3	26.7	110	180	952	6.6	13.0	12 581 579
4x2x0.75	1.1	1.62	10.5 ± 0.4	26.7	100	170	1327	9.0	18.2	12 584 787
4x3x0.75	1.1	1.62	11.3 ± 0.4	26.7	100	160	1570	11.9	22.0	84 147 685
6x2x0.75	1.1	1.62	12.8 ± 0.4	26.7	100	160	1760	14.1	25.4	85 022 422
8x2x0.75	1.1	1.62	15.2 ± 0.5	26.7	100	160	2980	16.4	36.1	12 585 078
12x2x0.75	1.1	1.62	15.7 ± 0.5	26.7	100	160	2400	24.1	40.6	85 084 909
6x(2x0.75)	1.1	1.62	19.5 ± 0.5	26.7	-	-	5073	24.8	61.6	12 584 429
5x(4x0.75)	1.1	1.62	18.3 ± 0.5	26.7	-	-	4700	20.6	53.8	12 583 090 ⁸⁾

8) Quad- core no.: 1,4,2,3/ 5,8,6,7/ 9,12,10,11/ 13,16,14,15/ 17,20,18,19



Traction cable

RADOX TENUIS-TW 600V MM S

Construction 1) n x mm ²	Conductor Dia.nom. mm	Core 2) Dia. nom. mm	Cable Dia. mm	R ₂₀ 3) max. Ω/km	C 4) core/ core/ core/ screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
2x1	1.2	1.77	5.6 ± 0.3	20.0	160	260	410	2.6	5.6	12 568 162
3x1	1.2	1.77	6.0 ± 0.3	20.0	160	260	478	4.1	7.4	12 568 163
4x1	1.2	1.77	6.5 ± 0.3	20.0	130	220	553	5.2	8.9	12 568 164
5x1	1.2	1.77	7.0 ± 0.3	20.0	120	200	656	6.3	10.5	12 583 729
6x1	1.2	1.77	7.8 ± 0.3	20.0	110	190	839	7.5	12.8	12 568 165
7x1	1.2	1.77	8.5 ± 0.3	20.0	110	180	1015	8.6	14.9	12 583 999
8x1	1.2	1.77	8.9 ± 0.3	20.0	110	180	1140	9.6	16.5	12 581 449
12x1	1.2	1.77	9.9 ± 0.3	20.0	100	170	1226	14.1	21.6	12 581 355
16x1	1.2	1.77	11.2 ± 0.4	20.0	100	170	1607	18.2	27.9	12 584 811
20x1	1.2	1.77	12.7 ± 0.4	20.0	100	170	2088	23.8	36.2	84 143 022
22x1	1.2	1.77	13.3 ± 0.3	20.0	100	170	2307	26.3	39.8	12 581 356
37x1	1.2	1.77	16.7 ± 0.5	20.0	100	160	3506	41.8	62.3	84 129 985
2x2x1	1.2	1.77	8.8 ± 0.3	20.0	130	220	957	5.9	12.6	12 581 357
5x2x1	1.2	1.77	12.7 ± 0.4	20.0	100	170	1949	14.6	7.8	12 584 697
6x2x1	1.2	1.77	14.0 ± 0.4	20.0	100	170	2424	17.2	33.4	12 584 412
8x2x1	1.2	1.77	16.7 ± 0.5	20.0	100	170	3668	22.9	46.7	12 585 378
3x4x1	1.2	1.77	12.4 ± 0.4	20.0	100	170	1885	16.6	28.7	12 583 002
4x4x1	1.2	1.77	14.2 ± 0.4	20.0	100	170	2362	21.1	36.2	12 584 118 9)

9) RADOX TENUIS- TW 600V 4x4x1 MM S UIC, cable construction according to UIC 558 (16- core connection cable); numbering of cores: 1,4,2,3 / 5,8,6,7 / 9,12,10,11 / 14,20,15,16



Traction cable

RADOX TENUIS-TW 600V MM S

Construction 1) n x mm ²	Conductor Dia.nom. mm	Core 2) Dia. nom. mm	Cable Dia. mm	R ₂₀ 3) max. Ω/km	C 4) core/ core/ core/ screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
2x1.5	1.5	2.17	6.5 ± 0.3	13.7	150	260	565	3.6	7.8	12 568 172
3x1.5	1.5	2.17	6.8 ± 0.3	13.7	150	260	599	5.6	9.6	12 568 173
3G1.5	1.5	2.17	6.8 ± 0.3	13.7	150	250	599	5.6	9.6	12 583 730
4x1.5	1.5	2.17	7.4 ± 0.3	13.7	130	210	675	6.9	11.6	12 568 174
4G1.5	1.5	2.17	7.4 ± 0.3	13.7	130	210	675	6.9	11.6	12 583 731
5x1.5	1.5	2.17	8.3 ± 0.3	13.7	120	190	911	8.7	14.5	12 582 053
6x1.5	1.5	2.17	9.0 ± 0.3	13.7	110	180	1094	10.3	17.1	12 581 465
7x1.5	1.5	2.17	10.0 ± 0.3	13.7	110	180	1360	12.5	20.9	85 031 963
7G1.5	1.5	2.17	10.0 ± 0.3	13.7	110	180	1360	12.5	20.9	85 021 166
8x1.5	1.5	2.17	11.0 ± 0.4	13.7	100	170	1694	14.3	24.7	12 586 408
9G1.5	1.5	2.17	11.6 ± 0.4	13.7	100	170	1922	15.7	27.4	85 024 345
10x1.5	1.5	2.17	11.4 ± 0.4	13.7	100	170	1610	17.0	27.1	12 583 544
12x1.5	1.5	2.17	12.1 ± 0.4	13.7	100	170	1749	21.3	32.2	12 582 054
16x1.5	1.5	2.17	13.6 ± 0.4	13.7	100	170	2245	27.5	41.1	12 582 055
18x1.5	1.5	2.17	14.4 ± 0.4	13.7	100	160	2559	31.1	46.5	12 582 056
42x1.5	1.5	2.17	21.2 ± 0.5	13.7	100	160	5494	68.2	100	85 020 521
48x1.5	1.5	2.17	21.9 ± 0.5	13.7	100	160	5224	76.3	120	85 022 986
64x1.5	1.5	2.17	25.5 ± 0.6	13.7	100	160	7713	102	146	85 020 967
2x2x1.5	1.5	2.17	10.6 ± 0.4	13.7	110	180	1400	9.0	18.5	84 105 087
4x2x1.5	1.5	2.17	13.5 ± 0.4	13.7	100	170	1846	17.0	29.6	12 585 486
6x2x1.5	1.5	2.17	16.3 ± 0.5	13.7	100	170	3226	23.2	44.7	12 585 487 ¹⁰⁾
12x2x1.5	1.5	2.17	20.6 ± 0.5	13.7	100	160	4094	43.6	70.2	85 004 430
3x4x1.5	1.5	2.17	14.8 ± 0.4	13.7	100	160	2612	23.1	39.7	12 584 953

¹⁰⁾ increased sheath thickness



Traction cable

RADOX TENUIS-TW 600V MM S

Construction 1) n x mm ²	Conductor Dia.nom. mm	Core 2) Dia. nom. mm	Cable Dia. mm	R ₂₀ 3) max. Ω/km	C 4) core/ core/ core screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
2x2.5	1.9	2.75	7.8 ± 0.3	8.21	170	280	807	6.3	12.0	12 568 175
3x2.5	1.9	2.75	8.2 ± 0.3	8.21	160	280	861	8.5	14.2	12 582 658
3G2.5	1.9	2.75	8.2 ± 0.3	8.21	160	280	861	8.6	14.4	12 583 736
4x2.5	1.9	2.75	9.1 ± 0.3	8.21	130	220	1054	11.1	17.9	12 582 058
5x2.5	1.9	2.75	10.3 ± 0.4	8.21	120	200	1365	14.3	23.0	12 584 926
6x2.5	1.9	2.75	11.4 ± 0.4	8.21	110	190	1723	17.0	27.7	12 582 059
7x2.5	1.9	2.75	12.5 ± 0.4	8.21	110	190	2072	21.0	33.7	12 584 927
10x2.5	1.9	2.75	14.2 ± 0.4	8.21	110	180	2384	28.4	43.4	84 091 733
16x2.5	1.9	2.75	17.1 ± 0.5	8.21	110	180	3296	42.8	64.3	85 092 868
30G2.5	1.9	2.75	22.5 ± 0.5	8.21	100	170	5460	80.0	114.9	85 078 241
2x2x2.5	1.9	2.75	13.2 ± 0.4	8.21	110	190	2167	15.1	29.7	12 583 449

Construction 1) n x mm ²	Conductor Dia.nom. mm	Core 2) Dia. nom. mm	Cable Dia. mm	R ₂₀ 3) max. Ω/km	C 4) core/ core/ core screen pF/m		Fireload nom. kJ/m	Weight nom. Copper Cable kg / 100m		H + S Part No.
2x4	2.45	3.35	8.9 ± 0.3	5.09	170	290	1077	9.3	16.3	12 583 873
3x4	2.45	3.35	9.7 ± 0.3	5.09	170	290	1216	12.9	20.9	85 003 133
4x4	2.45	3.35	11.0 ± 0.4	5.09	130	220	1526	17.7	27.4	85 003 135



Traction cable

RADOX TENUIS-TW 600V MM S

Cables with coloured cores:

Construction 1) n x mm ²	Con- ductor Dia. _{nom} mm	Core colours	Core 2) Dia. nom mm	Cable Dia. mm	R ₂₀ ³⁾ max Ω/km	C ⁴⁾		Fireload nom. kJ/m	Weight		H + S Part No.
						core/ core	core/ screen		Copper	Cable	
3V0.5	0.9	BN- BK- BU	1.42	5.2 ± 0.3	40.1	130	220	365	2.1	4.8	12 584 130
3V0.5	0.9	BU- RD- GN	1.42	5.2 ± 0.3	40.1	130	220	365	2.1	4.8	85 091 049
3V0.5	0.9	WH- RD- BK	1.42	5.2 ± 0.3	40.1	130	220	365	2.1	4.8	85 103 643
4V0.5	0.9	BU- WH- BN- BK	1.42	5.4 ± 0.3	40.1	110	190	380	2.7	5.4	12 584 097
4V0.5	0.9	BU- BK- BN- GNYE	1.42	5.4 ± 0.3	40.1	110	190	380	2.7	5.4	85 027 557
4V0.5	0.9	BU- RD- GN- YE	1.42	5.4 ± 0.3	40.1	110	190	380	2.7	5.4	85 091 050
5V0.5	0.9	BN- BK- BU- WH- GY	1.42	6.3 ± 0.3	40.1	100	170	545	3.7	7.4	84 092 080
2V0.75	1.1	BK- BU	1.62	5.3 ± 0.3	26.7	150	250	375	2.1	5.0	12 584 133

- 1) X: one colour, numbered
 G: one green- yellow core, others one colour, numbered
 V: various colours
 2) Cores: Core details according to H+S Datasheet 564 264
 3) R₂₀: Conductor resistance according to EN 50306- 2
 4) C': Capacity typical value

Colour Legend:

BK: black
 BN: brown
 RD: red
 OG: orange
 YE: yellow
 GN: green
 BU: blue
 VT: violet
 GNYE: green- yellow
 GY: grey
 WH: white
 PK: pink
 TQ: turquoise