Heavy standard construction

Product Description

Heavy-duty, rubber-sheathed cable;High stresses;Permitted up to 1000 V (0.6/1 kV) alternating voltage for protected and fixed installation;Arrangements made of single-core, rubber-sheathed cables H07RN-F can be used for short circuit-proof and short-to-ground-proof installations in accordance with VDE 0100 Part 520;Type-compliant versions <HAR>-certified with “<HAR>” testing and certification mark for accelerated granting of approvals if final application of cable is within the European CENELEC area



CE ◁HAR▷ RoHS

Application range

- Handheld and power supply devices according to HD 516/VDE 0298-300
- According to HD 516/VDE 0298-300:... tools, machinery and agricultural devices for medium mechanical stress; for mobile engines and machinery; on plaster; not for submersion except for exceptional, brief flooding (see H07RN8-F cable for submersible pumps); areas with an explosion hazard, in addition to individual, national provisions/guidelines/legislation/standards/norms that may apply in specific cases;
- Dry or damp rooms as well as outdoors (taking into account all normative power characteristics) according to HD 516/VDE 0298-300
- Light & sound technology

Benefits

- Heavy-duty, rubber-sheathed cable
- High stresses
- Permitted up to 1000 V (0.6/1 kV) alternating voltage for protected and fixed installation
- Arrangements made of single-core, rubber-sheathed cables H07RN-F can be used for short circuit-proof and short-to-ground-proof installations in accordance with VDE 0100 Part 520
- Type-compliant versions <HAR>-certified with “<HAR>” testing and certification mark for accelerated granting of approvals if final application of cable is within the European CENELEC area

Design

- Bare copper wire according to HAR
- Core insulation: rubber compound type EI 4
- Outer sheath: rubber compound, type EM2

Product features

- Flame-retardant according to IEC 60332-1-2
- Oil-resistant according to EN 60811-2-1
- Normatively not ozone-resistant according to HD 22.4/VDE 0282-4 and HD 22.1/VDE 0282-1

Technical Data

Core identification code
Up to 5 cores: colour-coded according to VDE 0293-308, refer to Appendix T9
From 6 cores: black with white numbers
Approvals
VDE 0282 Part 4/HD 22.4
Specific insulation resistance
1 GOhm x cm
Conductor stranding
Fine wire according to VDE 0295 Class 5/ IEC 60228 Class 5
Minimum bending radius
According to HD 516/VDE 0298-300, table 6(c): 3 x up to 8 x cable outer diameter, depending on the outer diameter and application involved

Nominal voltage
U0/U: 450/750 V
Test voltage
2500 V
Protective conductor
G = with GN-YE protective conductor
X = without protective conductor
Current rating
According to VDE 0298 part 4 Tab. 11 and 13
HD 516/VDE 0298-300
Temperature range
According to HD 516/VDE 0298-300:... Flexible use and fixed installation: -25 °C to +60 °C at the conductor
maximum cable surface temperature: +50 °C
According to HD 516/VDE 0298-300: minimum laying and handling temperature: -25 °C
maximum ambient temperature for storage: +40 °C

Article List

Part number	Number of cores and mm² per conductor	Outer diameter (mm)	Copper index (kg/km)	Weight (kg/km)
1600096	1 X 1,5	5,7 - 7,1	14.4	59
1600099	1 X 2,5	6,3 - 7,9	24.0	72
1600097	1 X 4	7,2 - 9	38.0	99
1600098	1 X 6	7,9 - 9,8	58.0	130
1600194	1 X 10	9,5 - 11,9	96.0	230
1600195	1 X 16	10,8 - 13,4	154.0	320
1600196	1 X 25	12,7 - 15,8	240.0	450
1600193	1 X 35	14,3 - 17,9	336.0	605
1600197	1 X 50	16,5 - 20,6	480.0	825
1600189	1 X 70	18,6 - 23,3	672.0	1090
1600190	1 X 95	20,8 - 26	912.0	1405
1600198	1 X 120	22,8 - 28,6	1152.0	1745
1600191	1 X 150	25,2 - 31,4	1440.0	1887
1600175	1 X 185	27,6 - 34,4	1776.0	2274
1600177	1 X 240	30,6 - 38,3	2304.0	2955
30015435	1 X 300	33,5 - 41,9	2880.0	3479
1600117	3 G 1,0	8,3 - 10,7	29.0	130
1600199	2 X 1,5	8,5 - 11	29.0	135
1600103	3 G 1,5	9,2 - 11,9	43.0	165
16001233	4 G 1,5	10,2 - 13,1	58.0	200
16001043	5 G 1,5	11,2 - 14,4	72.0	240
1600151	7 G 1,5	14 - 17,5	101.0	385
1600148	12 G 1,5	17,6 - 22,4	173.0	516
1600259	19 G 1,5	20,7 - 26,3	274.0	800
1600166	24 G 1,5	24,3 - 30,7	346.0	882
1600263	25 G 1,5	25,1 - 25,9	360.0	920
1600187	2 X 2,5	10,2 - 13,1	48.0	195
1600118	3 G 2,5	10,9 - 14	72.0	235
16001053	4 G 2,5	12,1 - 15,5	96.0	290
16001293	5 G 2,5	13,3 - 17	120.0	294
1600152	7 G 2,5	16,5 - 20	168.0	520
1600154	12 G 2,5	20,6 - 26,2	288.0	810
1600156	19 G 2,5	25,5 - 31	456.0	1200
1600157	24 G 2,5	28,8 - 36,4	576.0	1650
1600186	2 X 4	11,8 - 15,1	77.0	270

1600119	3 G 4	12,7 - 16,2	115.0	320
16001063	4 G 4	14 - 17,9	154.0	395
16001303	5 G 4	15,6 - 19,9	192.0	485
1600161	7 G 4	21 - 21,8	268.8	681
1600120	3 G 6	14,1 - 18	173.0	360
16001073	4 G 6	15,7 - 20	230.0	475
16001313	5 G 6	17,5 - 22,2	288.0	760
1600121	3 G 10	19,1 - 24,2	288.0	880
16001083	4 G 10	20,9 - 26,5	384.0	1060
16001093	5 G 10	22,9 - 29,1	480.0	1300
1600122	3 G 16	21,8 - 27,6	461.0	1090
16001103	4 G 16	23,8 - 30,1	614.0	1345
16001113	5 G 16	26,4 - 33,3	768.0	1680
16001123	4 G 25	28,9 - 36,6	960.0	1995
16001133	5 G 25	32 - 40,4	1200.0	2470
1600124	3 G 35	29,3 - 37,1	1008.0	1910
16001143	4 G 35	32,5 - 41,1	1344.0	2645
16001363	5 G 35	37 - 45	1680.0	2810
16001153	4 G 50	37,7 - 47,5	1920.0	3635
1600126	5 G 50	40 - 50,8	2400.0	4050
16001163	4 G 70	42,7 - 54	2688.0	4830
16001283	4 G 95	48,4 - 61	3648.0	6320
16001323	4 G 120	53 - 66	4608.0	6830
16000883	4 G 150	58 - 73	5760.0	8320
1600141	4 G 185	64 - 80	7104.0	9800
1600183	4 G 240	72 - 91	9216.0	12800

Footnote:

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

Copper price basis: EUR 150/100kg. Refer to 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 are not to scale and do not represent detailed images of the respective products.

Cross-sections 5G35 and 5G50 without <HAR>