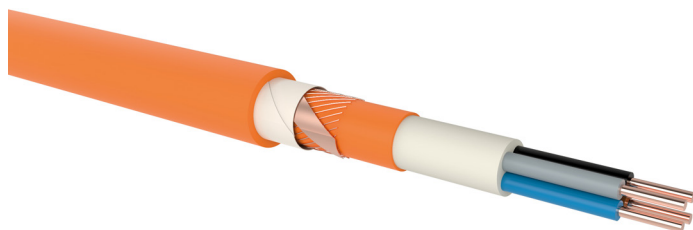


## (N)HXCH FE180/E30 (VDE)

SI/FRNC cable, with insulation integrity FE180 and circuit integrity E30, screened

### DESIGN



- 1 | Copper conductor, round solid (RE) resp. round stranded (RM)
- 2 | Primary core insulation (silicone rubber)
- 3 | Secondary core insulation (silicone rubber)
- 4 | Inner covering (halogen-free polymer compound)
- 5 | Screen (bare copper wires and counter helix)
- 6 | Taping (halogen-free plastic tape)
- 7 | Sheath (halogen-free polymer compound orange)

### APPLICATION

Suitable to protect people and technical building equipment in the event of fire if circuit integrity is required (circuit integrity is only maintained if these cables are installed with specified supporting elements). The cable is not UV-resistant.

### TECHNICAL DATA



**Standard:**  
adapted to DIN VDE 0266



**Rated voltage:**  
0.6/1 kV (U<sub>0</sub>/U)



**Test voltage:**  
4 kV / 50 Hz



**Temperature range:**  
laying temperature: min. -5 °C  
operating temperature: -50 °C up to 90 °C  
conductor temperature: max. 90 °C  
short circuit temperature: max. 250 °C/5 s



**Bending radius (min.):**  
12 x Ø of cable



**Core identification:**  
HD 308 S2



**Fire properties:**  
EN 60332-1-2: flame retardant  
EN 60754-1 and 2: halogen-free; non-corrosive combustion gases  
EN 60332-3-22 and 24: reduced flame propagation  
EN 61034-2: low smoke emission  
IEC 60331-21, DIN VDE 0472-814: insulation integrity FE 180  
DIN 4102-12: circuit integrity E30



**Certificate:**  
VDE Germany

| Number of cores x nominal cross-section / cross-section of screen (mm <sup>2</sup> ) | Max. conductor resistance (Ω/km) | Current rating in the air (A) | Outer diameter (mm) appr. | Total weight (kg/km) appr. | Standard lengths/packing (m) |
|--|----------------------------------|-------------------------------|---------------------------|----------------------------|------------------------------|
| <b>(N)HXCH FE180/E30 (VDE)</b>   |                                  |                               |                           |                            |                              |
| 2 x 1.5 RE/1.5   | 12.1                             | 29                            | 11.6                      | 185                        | 1000 D                       |
| 3 x 1.5 RE/1.5   | 12.1                             | 24                            | 12.1                      | 205                        | 1000 D                       |
| 4 x 1.5 RE/1.5   | 12.1                             | 24                            | 13.0                      | 235                        | 1000 D                       |
| 4 x 1.5 RE/16  | 12.1                             | 24                            | 19.0                      | 455                        | 1000 D                       |
| 4 x 1.5 RE/1.5   | 12.1                             | 24                            | 13.8                      | 265                        | 1000 D                       |
| 7 x 1.5 RE/2.5   | 12.1                             | 14                            | 14.7                      | 330                        | 1000 D                       |
| 7 x 1.5 RE/16  | 12.1                             | 14                            | 18.6                      | 550                        | 1000 D                       |
| 10 x 1.5 RE/2.5  | 12.1                             | 13                            | 17.5                      | 425                        | 500 D                        |
| 12 x 1.5 RE/2.5  | 12.1                             | 12                            | 18.2                      | 475                        | 500 D                        |
| 14 x 1.5 RE/2.5  | 12.1                             | 11                            | 18.9                      | 525                        | 500 D                        |

## (N)HXCH FE180/E30 (VDE)

SI/FRNC cable, with insulation integrity FE180 and circuit integrity E30, screened

| Number of cores x nominal cross-section / cross-section of screen (mm <sup>2</sup> ) | Max. conductor resistance (Ω/km) | Current rating in the air (A) | Outer diameter (mm) appr. | Total weight (kg/km) appr. | Standard lengths/packing (m) |
|--|----------------------------------|-------------------------------|---------------------------|----------------------------|------------------------------|
| <b>(N)HXCH FE180/E30 (VDE)</b>   |                                  |                               |                           |                            |                              |
| 19 x 1.5 RE/4  | 12.1                             | 11                            | 21.2                      | 660                        | 500 D                        |
| 19 x 1.5 RE/16   | 12.1                             | 11                            | 25.3                      | 942                        | 500 D                        |
| 24 x 1.5 RE/6  | 12.1                             | 10                            | 24.5                      | 835                        | 500 D                        |
| 30 x 1.5 RE/6  | 12.1                             | 9                             | 25.7                      | 970                        | 500 D                        |
| 40 x 1.5 RE/10   | 12.1                             | 8                             | 28.4                      | 1240                       | 500 D                        |
| 2 x 2.5 RE/2.5   | 7.41                             | 38                            | 12.4                      | 230                        | 1000 D                       |
| 3 x 2.5 RE/2.5   | 7.41                             | 32                            | 13.1                      | 265                        | 1000 D                       |
| 4 x 2.5 RE/2.5   | 7.41                             | 32                            | 14.0                      | 305                        | 1000 D                       |
| 4 x 2.5 RE/16  | 7.41                             | 32                            | 17.6                      | 476                        | 1000 D                       |
| 5 x 2.5 RE/2.5   | 7.41                             | 32                            | 14.9                      | 345                        | 1000 D                       |
| 4 x 2.5 RE/2.5   | 7.41                             | 32                            | 18.0                      | 380                        | 1000 D                       |
| 7 x 2.5 RE/16  | 7.41                             | 20                            | 19.9                      | 642                        | 1000 D                       |
| 10 x 2.5 RE/4  | 7.41                             | 18                            | 19.9                      | 575                        | 500 D                        |
| 12 x 2.5 RE/4  | 7.41                             | 17                            | 20.4                      | 635                        | 500 D                        |
| 14 x 2.5 RE/6  | 7.41                             | 16                            | 21.3                      | 705                        | 500 D                        |
| 19 x 2.5 RE/6  | 7.41                             | 16                            | 23.4                      | 910                        | 500 D                        |
| 24 x 2.5 RE/10   | 7.41                             | 13                            | 27.2                      | 1155                       | 500 D                        |
| 30 x 2.5 RE/10   | 7.41                             | 12                            | 28.8                      | 1365                       | 500 D                        |
| 24 x 2.5 RE/10   | 7.41                             | 11                            | 31.4                      | 1710                       | 500 D                        |
| 2 x 4 RE/4   | 4.61                             | 51                            | 14.7                      | 315                        | 1000 D                       |
| 3 x 4 RE/4   | 4.61                             | 42                            | 15.4                      | 365                        | 1000 D                       |
| 4 x 4 RE/4   | 4.61                             | 42                            | 16.4                      | 420                        | 1000 D                       |
| 4 x 4 RE/16  | 4.61                             | 42                            | 15.6                      | 580                        | 1000 D                       |
| 7 x 4 RE/16  | 4.61                             |                               | 19.1                      | 790                        | 500 D                        |
| 10 x 4 RE/6  | 4.61                             | 25                            | 23.2                      | 820                        | 500 D                        |
| 12 x 4 RE/6  | 4.61                             | 23                            | 23.8                      | 920                        | 500 D                        |
| 14 x 4 RE/6  | 4.61                             | 22                            | 24.9                      | 1030                       | 500 D                        |
| 19 x 4 RE/10   | 4.61                             | 22                            | 27.8                      | 1050                       | 500 D                        |
| 2 x 6 RE/6   | 3.08                             | 64                            | 15.7                      | 395                        | 500 D                        |
| 3 x 6 RE/6   | 3.08                             | 53                            | 16.4                      | 460                        | 500 D                        |
| 4 x 6 RE/6   | 3.08                             | 53                            | 17.8                      | 550                        | 500 D                        |
| 4 x 6 RE/16  | 3.08                             | 53                            | 19.9                      | 697                        | 500 D                        |
| 5 x 6 RE/16  | 3.08                             | 53                            | 23.5                      | 895                        | 500 D                        |
| 2 x 10 RE/10   | 1.83                             | 86                            | 17.9                      | 555                        | 500 D                        |
| 3 x 10 RE/10   | 1.83                             | 74                            | 18.9                      | 655                        | 500 D                        |
| 4 x 10 RE/10   | 1.83                             | 74                            | 20.1                      | 770                        | 500 D                        |
| 5 x 10 RE/10   | 1.83                             | 74                            | 21.6                      | 905                        | 500 D                        |
| 2 x 16 RE/16   | 1.15                             | 110                           | 20.1                      | 775                        | 500 D                        |
| 3 x 16 RE/16   | 1.15                             | 98                            | 21.1                      | 930                        | 500 D                        |
| 4 x 16 RE/16   | 1.15                             | 97                            | 26.0                      | 1300                       | 500 D                        |

## (N)HXCH FE180/E30 (VDE)

SI/FRNC cable, with insulation integrity FE180 and circuit integrity E30, screened

| Number of cores x nominal cross-section / cross-section of screen (mm <sup>2</sup> ) | Max. conductor resistance (Ω/km) | Current rating in the air (A) | Outer diameter (mm) appr. | Total weight (kg/km) appr. | Standard lengths/packing (m) |
|--|----------------------------------|-------------------------------|---------------------------|----------------------------|------------------------------|
| <b>(N)HXCH FE180/E30 (VDE)</b>   |                                  |                               |                           |                            |                              |
| 4 x 16 RM/16   | 1.15                             | 98                            | 22.8                      | 1110                       | 500 D                        |
| 5 x 16 RE/16   | 1.15                             | 98                            | 24.8                      | 1320                       | 500 D                        |
| 3 x 25 RM/16   | 0.727                            | 133                           | 27.4                      | 1410                       | 500 D                        |
| 4 x 25 RM/16   | 0.727                            | 133                           | 29.0                      | 1655                       | 500 D                        |
| 5 x 25 RM/16   | 0.727                            | 133                           | 31.7                      | 1995                       | 500 D                        |
| 3 x 35 RM/16   | 0.524                            | 162                           | 28.6                      | 1600                       | 500 D                        |
| 3 x 35 RM/35   | 0.524                            | 162                           | 33.0                      | 2200                       | 500 D                        |
| 4 x 35 RM/16   | 0.524                            | 162                           | 31.1                      | 1980                       | 500 D                        |
| 5 x 35 RM/16   | 0.524                            | 162                           | 34.2                      | 2420                       | 500 D                        |
| 4 x 50 RM/25   | 0.387                            | 197                           | 35.7                      | 2700                       | 500 D                        |
| 5 x 50 RM/25   | 0.387                            | 197                           | 39.1                      | 3285                       | 500 D                        |
| 3 x 70 RM/35   | 0.268                            | 250                           | 37.5                      | 2930                       | 500 D                        |
| 4 x 70 RM/35   | 0.268                            | 250                           | 42.0                      | 4500                       | 500 D                        |
| 5 x 70 RM/35   | 0.268                            | 250                           | 45.1                      | 4475                       | 500 D                        |
| 3 x 95 RM/50   | 0.193                            | 308                           | 42.5                      | 3895                       | 500 D                        |
| 4 x 95 RM/50   | 0.193                            | 308                           | 49.0                      | 6100                       | 500 D                        |
| 5 x 95 RM/50   | 0.193                            | 308                           | 51.3                      | 5950                       | 500 D                        |
| 3 x 120 RM/70  | 0.153                            | 359                           | 45.8                      | 4870                       | 500 D                        |
| 4 x 120 RM/70  | 0.153                            | 359                           | 50.5                      | 6105                       | 500 D                        |
| 5 x 120 RM/70  | 0.153                            | 359                           | 55.6                      | 7450                       | 500 D                        |
| 3 x 150 RM/70  | 0.124                            | 412                           | 50.3                      | 5845                       | 500 D, 1000 D                |
| 4 x 150 RM/70  | 0.124                            | 412                           | 55.4                      | 7345                       | 300 D                        |
| 5 x 150 RM/70  | 0.124                            | 412                           | 61.7                      | 9010                       | 300 D                        |
| 3 x 185 RM/95  | 0.0991                           | 480                           | 55.0                      | 7900                       | 500 D, 1000 D                |
| 4 x 185 RM/95  | 0.0991                           | 480                           | 60.5                      | 10300                      | 300 D                        |
| 4 x 240 RM/120   | 0.0754                           | 565                           | 64.9                      | 13190                      | 300 D                        |

Technical changes reserved. All figures are therefore without guarantee.

19.8.2022, 13:06