



#### Code

**A2XH-AF , AXZ1-AF      AL/XLPE/HFFR**

#### Voltage Rating

**0.6/1 kV**

#### Standards

**IEC 60228  
EN 61034  
EN 50267  
EN 60332-3**

**Conductor  
Smoke Density  
Halogen Free  
Flame Retardant (Cat C)**

#### Reaction to Fire Classification ( CPR )

**EN 60332-1-2      Flame Retardant**

#### Conductor

**Flexible Aluminum Conductor (Class 5)**

#### Insulation

**XLPE (Cross-linked Polyethylene)**

#### Filler

**Halogen Free Filler**

#### Armour

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#### Sheath

**Halogen Free Sheath**

#### Technical Data

**Max. Operating Temperature      :    90°C  
Short Circuit Temperature      :    250°C (max.5 sec)  
Bending Radius      :    6D ( D : Overall Diameter )  
Test Voltage      :    3,5 kV**

#### Application:

**Used in energy networks in refineries, mines, hotels, schools, tunnels, high constructions, hospitals, power plants, data processing centers, business centers where there is a risk of fire.**

| Nominal Cross Section<br>(mm <sup>2</sup> ) | Overall Diameter<br>(mm) | Net Weight<br>(kg/km) | Delivery Length<br>(m) | Resistance at 20°C<br>(ohm/km) | Current Carrying Capacity |                |
|---------------------------------------------|--------------------------|-----------------------|------------------------|--------------------------------|---------------------------|----------------|
|                                             |                          |                       |                        |                                | In Ground at 20°C         | In Air at 30°C |
| 1x1,5*                                      | 5,7                      | 41,4                  | 1000                   | 19,25                          | -                         | -              |
| 1x2,5*                                      | 6,2                      | 48,5                  | 1000                   | 11,55                          | -                         | -              |
| 1x4*                                        | 6,8                      | 59,1                  | 1000                   | 7,22                           | -                         | -              |
| 1x6*                                        | 7,3                      | 69,4                  | 1000                   | 4,81                           | -                         | -              |
| 1x10                                        | 8,4                      | 92,2                  | 1000                   | 3,08                           | -                         | -              |
| 1x16                                        | 9,2                      | 116,1                 | 1000                   | 1,91                           | -                         | -              |
| 1x25                                        | 11,3                     | 167,6                 | 1000                   | 1,20                           | 114                       | 106            |
| 1x35                                        | 12,3                     | 205,4                 | 1000                   | 0,868                          | 136                       | 130            |
| 1x50                                        | 13,5                     | 256,6                 | 1000                   | 0,641                          | 162                       | 161            |
| 1x70                                        | 15,6                     | 329,4                 | 1000                   | 0,443                          | 199                       | 204            |
| 1x95                                        | 17,7                     | 424,0                 | 1000                   | 0,320                          | 238                       | 252            |
| 1x120                                       | 19,6                     | 524,7                 | 1000                   | 0,253                          | 272                       | 295            |
| 1x150                                       | 21,5                     | 637,6                 | 1000                   | 0,206                          | 305                       | 339            |
| 1x185                                       | 23,9                     | 778,6                 | 1000                   | 0,164                          | 347                       | 395            |
| 1x240                                       | 27,0                     | 1003,9                | 1000                   | 0,125                          | 404                       | 472            |
| 1x300                                       | 29,5                     | 1217,8                | 1000                   | 0,100                          | 457                       | 547            |
| 1x400                                       | 33,2                     | 1551,7                | 1000                   | 0,0778                         | 525                       | 643            |
| 1x500                                       | 37,6                     | 1924,9                | 500                    | 0,0605                         | 601                       | 754            |
| 1x630                                       | 41,7                     | 2429,8                | 500                    | 0,0469                         | 687                       | 882            |

| Nominal Cross Section<br>(mm <sup>2</sup> ) | Overall Diameter<br>(mm) | Net Weight<br>(kg/km) | Delivery Length<br>(m) | Resistance at 20°C<br>(ohm/km) | Current Carrying Capacity |                |
|---------------------------------------------|--------------------------|-----------------------|------------------------|--------------------------------|---------------------------|----------------|
|                                             |                          |                       |                        |                                | In Ground at 20°C         | In Air at 30°C |
| 2x1,5*                                      | 10,4                     | 143,3                 | 1000                   | 19,25                          | -                         | -              |
| 2x2,5*                                      | 11,3                     | 169,6                 | 1000                   | 11,55                          | -                         | -              |
| 2x4*                                        | 12,6                     | 210,0                 | 1000                   | 7,22                           | -                         | -              |
| 2x6*                                        | 13,5                     | 254,1                 | 1000                   | 4,81                           | -                         | -              |
| 2x10                                        | 15,8                     | 336,2                 | 1000                   | 3,08                           | -                         | -              |
| 2x16                                        | 17,5                     | 420,1                 | 1000                   | 1,91                           | -                         | -              |
| 2x25                                        | 21,5                     | 627,5                 | 1000                   | 1,20                           | 112                       | 102            |
| 2x35                                        | 23,8                     | 778,1                 | 1000                   | 0,868                          | 135                       | 126            |
| 2x50                                        | 26,5                     | 977,9                 | 1000                   | 0,641                          | 158                       | 149            |
| 2x70                                        | 31,0                     | 1311,9                | 1000                   | 0,443                          | 196                       | 191            |
| 2x95                                        | 34,9                     | 1672,9                | 1000                   | 0,320                          | 234                       | 234            |
| 2x120                                       | 39,4                     | 2122,2                | 1000                   | 0,253                          | 268                       | 273            |
| 2x150                                       | 43,2                     | 2569,8                | 1000                   | 0,206                          | 300                       | 311            |
| 2x185                                       | 48,1                     | 3184,4                | 1000                   | 0,164                          | 342                       | 360            |
| 2x240                                       | 54,2                     | 4071,7                | 500                    | 0,125                          | 398                       | 427            |

| Nominal Cross Section<br>(mm <sup>2</sup> ) | Overall Diameter<br>(mm) | Net Weight<br>(kg/km) | Delivery Length<br>(m) | Resistance at 20°C<br>(ohm/km) | Current Carrying Capacity |                |
|---------------------------------------------|--------------------------|-----------------------|------------------------|--------------------------------|---------------------------|----------------|
|                                             |                          |                       |                        |                                | In Ground at 20°C         | In Air at 30°C |
| 3x1,5*                                      | 10,9                     | 154,5                 | 1000                   | 19,25                          | -                         | -              |
| 3x2,5*                                      | 11,8                     | 184,5                 | 1000                   | 11,55                          | -                         | -              |
| 3x4*                                        | 13,2                     | 229,9                 | 1000                   | 7,22                           | -                         | -              |
| 3x6*                                        | 14,2                     | 280,5                 | 1000                   | 4,81                           | -                         | -              |
| 3x10                                        | 16,7                     | 373,7                 | 1000                   | 3,08                           | -                         | -              |
| 3x16                                        | 18,5                     | 472,8                 | 1000                   | 1,91                           | -                         | -              |
| 3x25                                        | 22,9                     | 707,6                 | 1000                   | 1,20                           | 112                       | 102            |
| 3x35                                        | 25,3                     | 883,4                 | 1000                   | 0,868                          | 135                       | 126            |
| 3x50                                        | 28,3                     | 1132,4                | 1000                   | 0,641                          | 158                       | 149            |
| 3x70                                        | 33,2                     | 1512,4                | 1000                   | 0,443                          | 196                       | 191            |
| 3x95                                        | 37,5                     | 1949,1                | 1000                   | 0,320                          | 234                       | 234            |
| 3x120                                       | 42,2                     | 2443,2                | 1000                   | 0,253                          | 268                       | 273            |
| 3x150                                       | 46,3                     | 2970,9                | 500                    | 0,206                          | 300                       | 311            |
| 3x185                                       | 51,8                     | 3698,6                | 500                    | 0,164                          | 342                       | 360            |
| 3x240                                       | 58,5                     | 4736,8                | 500                    | 0,125                          | 398                       | 427            |
| 3x300                                       | 64,8                     | 5858,2                | 250                    | 0,100                          | 457                       | 507            |
| 3x400                                       | 72,9                     | 7449,4                | 250                    | 0,0778                         | 529                       | 600            |

| Nominal Cross Section<br>(mm <sup>2</sup> ) | Overall Diameter<br>(mm) | Net Weight<br>(kg/km) | Delivery Length<br>(m) | Resistance at 20°C<br>(ohm/km) | Current Carrying Capacity |                |
|---------------------------------------------|--------------------------|-----------------------|------------------------|--------------------------------|---------------------------|----------------|
|                                             |                          |                       |                        |                                | In Ground at 20°C         | In Air at 30°C |
| 3x16+10                                     | 19,7                     | 531,9                 | 1000                   | 1,91 - 3,08                    | -                         | -              |
| 3x25+16                                     | 23,9                     | 772,3                 | 1000                   | 1,20 - 1,91                    | 112                       | 102            |
| 3x35+16                                     | 25,9                     | 929,3                 | 1000                   | 0,868 - 1,91                   | 135                       | 126            |
| 3x50+25                                     | 29,6                     | 1228,7                | 1000                   | 0,641 - 1,20                   | 158                       | 149            |
| 3x70+35                                     | 34,5                     | 1641,1                | 1000                   | 0,443 - 0,868                  | 196                       | 191            |
| 3x95+50                                     | 39,1                     | 2112,6                | 1000                   | 0,320 - 0,641                  | 234                       | 234            |
| 3x120+70                                    | 44,4                     | 2711,5                | 500                    | 0,253 - 0,443                  | 268                       | 273            |
| 3x150+70                                    | 47,8                     | 3184,1                | 500                    | 0,206 - 0,443                  | 300                       | 311            |
| 3x185+95                                    | 53,6                     | 3967,0                | 500                    | 0,164 - 0,320                  | 342                       | 360            |
| 3x240+120                                   | 60,5                     | 5087,6                | 500                    | 0,125 - 0,253                  | 398                       | 427            |
| 3x300+150                                   | 66,7                     | 6232,0                | 250                    | 0,100 - 0,206                  | 457                       | 507            |
| 3x400+185                                   | 74,8                     | 7852,5                | 250                    | 0,0778 - 0,164                 | 529                       | 600            |

| Nominal Cross Section<br>(mm <sup>2</sup> ) | Overall Diameter<br>(mm) | Net Weight<br>(kg/km) | Delivery Length<br>(m) | Resistance at 20°C<br>(ohm/km) | Current Carrying Capacity |                |
|---------------------------------------------|--------------------------|-----------------------|------------------------|--------------------------------|---------------------------|----------------|
|                                             |                          |                       |                        |                                | In Ground at 20°C         | In Air at 30°C |
| 4x1,5*                                      | 11,6                     | 175,5                 | 1000                   | 19,25                          | -                         | -              |
| 4x2,5*                                      | 12,7                     | 211,6                 | 1000                   | 11,55                          | -                         | -              |
| 4x4*                                        | 14,2                     | 266,3                 | 1000                   | 7,22                           | -                         | -              |
| 4x6*                                        | 15,4                     | 327,2                 | 1000                   | 4,81                           | -                         | -              |
| 4x10                                        | 18,2                     | 440,9                 | 1000                   | 3,08                           | -                         | -              |
| 4x16                                        | 20,2                     | 563,6                 | 1000                   | 1,91                           | -                         | -              |
| 4x25                                        | 25,1                     | 850,2                 | 1000                   | 1,20                           | 112                       | 102            |
| 4x35                                        | 27,9                     | 1066,3                | 1000                   | 0,868                          | 135                       | 126            |
| 4x50                                        | 31,3                     | 1387,5                | 1000                   | 0,641                          | 158                       | 149            |
| 4x70                                        | 36,7                     | 1852,6                | 1000                   | 0,443                          | 196                       | 191            |
| 4x95                                        | 41,6                     | 2389,7                | 1000                   | 0,320                          | 234                       | 234            |
| 4x120                                       | 46,8                     | 3017,3                | 500                    | 0,253                          | 268                       | 273            |
| 4x150                                       | 51,3                     | 3675,7                | 500                    | 0,206                          | 300                       | 311            |
| 4x185                                       | 57,5                     | 4566,3                | 500                    | 0,164                          | 342                       | 360            |
| 4x240                                       | 65,0                     | 5888,4                | 250                    | 0,125                          | 398                       | 427            |
| 4x300                                       | 71,6                     | 7186,9                | 250                    | 0,100                          | 457                       | 507            |
| 4x400                                       | 80,6                     | 9153,4                | 250                    | 0,0778                         | 529                       | 600            |

| Nominal Cross Section<br>(mm <sup>2</sup> ) | Overall Diameter<br>(mm) | Net Weight<br>(kg/km) | Delivery Length<br>(m) | Resistance at 20°C<br>(ohm/km) | Current Carrying Capacity |                |
|---------------------------------------------|--------------------------|-----------------------|------------------------|--------------------------------|---------------------------|----------------|
|                                             |                          |                       |                        |                                | In Ground at 20°C         | In Air at 30°C |
| 5x1,5*                                      | 12,5                     | 239,2                 | 1000                   | 19,25                          | -                         | -              |
| 5x2,5*                                      | 13,7                     | 287,1                 | 1000                   | 11,55                          | -                         | -              |
| 5x4*                                        | 15,4                     | 359,7                 | 1000                   | 7,22                           | -                         | -              |
| 5x6*                                        | 16,6                     | 437,6                 | 1000                   | 4,81                           | -                         | -              |
| 5x10                                        | 19,8                     | 590,5                 | 1000                   | 3,08                           | -                         | -              |
| 5x16                                        | 22,0                     | 750,8                 | 1000                   | 1,91                           | -                         | -              |
| 5x25                                        | 27,5                     | 1129,2                | 1000                   | 1,20                           | 112                       | 102            |
| 5x35                                        | 30,7                     | 1407,9                | 1000                   | 0,868                          | 135                       | 126            |
| 5x50                                        | 34,3                     | 1798,9                | 1000                   | 0,641                          | 158                       | 149            |
| 5x70                                        | 40,5                     | 2396,4                | 500                    | 0,443                          | 196                       | 191            |
| 5x95                                        | 46,0                     | 3062,6                | 500                    | 0,320                          | 234                       | 234            |
| 5x120                                       | 51,8                     | 3800,0                | 500                    | 0,253                          | 268                       | 273            |
| 5x150                                       | 56,8                     | 4666,2                | 500                    | 0,206                          | 300                       | 311            |
| 5x185                                       | 63,6                     | 5792,0                | 250                    | 0,164                          | 342                       | 360            |
| 5x240                                       | 71,9                     | 7473,4                | 250                    | 0,125                          | 398                       | 427            |
| 5x300                                       | 79,3                     | 9115,3                | 250                    | 0,100                          | 457                       | 507            |
| 5x400                                       | 89,4                     | 11665,8               | 250                    | 0,0778                         | 529                       | 600            |

**Note 1:**

\* Conductor resistance calculated theoretically. Conductor resistances are taken from EN 60228 Class-2 Aluminum values.

**Note 2:**

Current carrying capacities are valid at 30°C ambient temperature.

