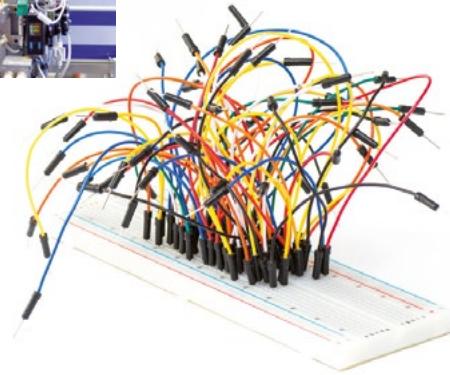




2

HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET  
SECTION II: FLUOROPOLYMERS AND THERMOPLASTICS

**omerin**  
LES CABLES DE L'EXTREME



- **The world's leading manufacturer of silicone-insulated wires and cables**
- **Europe's leading manufacturer of glass-yarn braids**
- **France's leading manufacturer of fire safety cables**

**The Omerin group has been producing electrical cables for extreme conditions since 1959**



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Our product range is further extended by varnished, impregnated and treated braided insulating sleeveings, door seals for ovens, fireproof sleeveings, thermocouple, extension and compensation cables as well as industrial braids.

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**SECTION I: CROSS LINKED ELASTOMERS**

**HIGH TEMPERATURE WIRES AND CABLES FOR THE GENERAL MARKET** 2  
**SECTION II: FLUOROPOLYMERS AND THERMOPLASTICS**

**HIGH TEMPERATURE WIRES AND CABLES FOR THE GENERAL MARKET** 3  
**SECTION III: COMPOSITE INSULATIONS**

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**CABLE SOLUTIONS FOR ROLLING STOCK** 5

**CABLES FOR POWER STATIONS AND HIGH-RISK SITES** 6

**MARINE CABLES** 7

**PYROMETRY CABLES** 8

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**HIGH TEMPERATURE MEDIUM VOLTAGE POWER CABLES** 10

**CABLE SOLUTIONS FOR AUTOMOTIVE AND E-MOBILITY** 11

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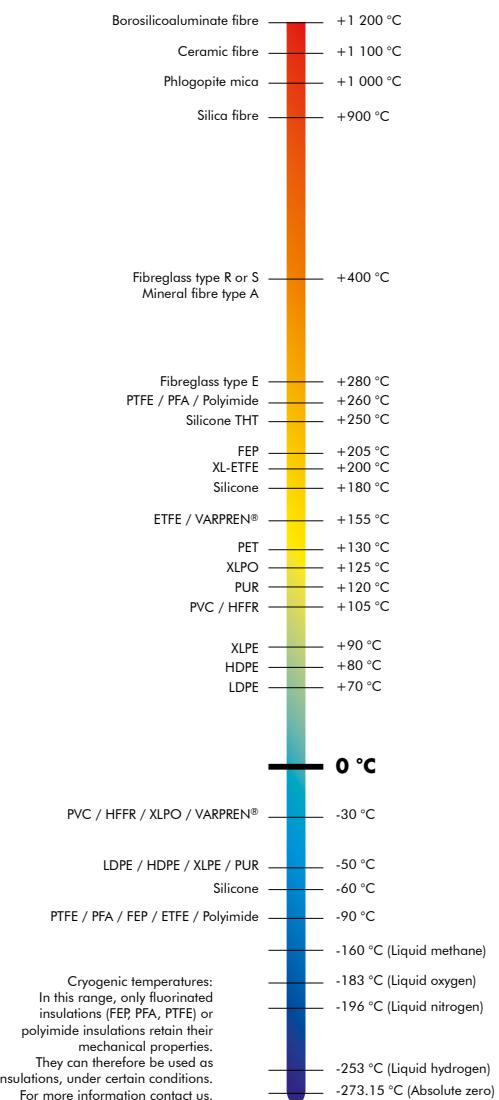
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<b>FLEXBAT®</b>	Extra flexible battery cables
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<b>PLASTHERM®</b>	Special thermoplastic insulated wires and cables
<b>POWER CONNECT®</b>	High performance power cords
<b>PROFIPLAST®</b>	Thermoplastic insulated wires and cables
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<b>SILIBOX®</b>	Wire and cables cardboard box packaging system
<b>SILICABLE®</b>	Special high temperature wires and cables
<b>SILICOUL®</b>	Low and medium voltage class H (180°C) power cables
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<b>SILITUBE®</b>	Braided or extruded tubes
<b>SOLARPLAST®</b>	Power cables for photovoltaic solar panels
<b>SONDIX®</b>	Platinum resistance temperature sensors connection cables
<b>SPIRFLEX®</b>	High performance spiral cables
<b>TEXALARM®</b>	Cables for safety systems and fire alarms
<b>TS CABLES®</b>	Coaxial and data cables
<b>TS COM 900®</b>	Telephonic cables for very speed reception
<b>TS LAN®</b>	Copper LAN cables
<b>TWINLINK®</b>	High temperature controlled impedance twisted pair cables
<b>TWINPLAST®</b>	Extra flexible cables for battery chargers or jump starters
<b>VARPREN®</b>	Wires and cables with special cross-linked Varpren® insulation
<b>VEROX®</b>	Fiberglass braided seals
<b>VIDEOCOAX®</b>	Analog and digital video cables



### Thermal classification of insulations



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# SILIFLON®

## ETFE and EETFE

### -90 °C to +155 °C

#### Approvals - standards

- Series inspired by standards

NF C 93-524

#### Applications

- Cabling for rotating machines (class F).
- Cabling in household electrical appliances, electronics.
- Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
- Cabling requiring compact size and excellent mechanical strength.

#### Options

- Nickel-plated copper core: ref. CNETFE.
- Silver-plated copper core: ref. AETFE.
- Pure nickel core: ref. NETFE.
- Outer electrical shielding:
- > Tin-plated copper braid: ref. ETFEBE or EETFEBE.
  - Other nominal metric or American cross-sections: contact us.
  - Other nominal stranding: contact us.
  - Other options and/or combinations of the options outlined above: contact us.

#### FLUOROPOLYMER INSULATED WIRES AND CABLES

2 1



1 • Bare (ref. ETFE) or tin-plated (ref. EETFE) copper core.  
2 • Insulation: Fluorinated polymer ETFE.

#### Characteristics

##### General

- Continuous operating temperatures: -90 °C to +155 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

##### Electrical

- Rated voltage: 450/750 V.
- Test voltage: 2500 V.

#### Standard products

- All colours including translucent.

#### ETFE and EETFE

CONDUCTING CORE			INSULATED WIRE OR CABLE		
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (bare copper core)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.05	7 x 0.10	373	0.17	0.65	0.9
0.09	7 x 0.13	214	0.17	0.7	1.3
0.12*	7 x 0.15	161	0.17	0.8	1.7
0.14**	7 x 0.16	141	0.17	0.8	1.8
0.15	19 x 0.10	136	0.20	0.9	2.1
0.22	7 x 0.20	89.9	0.20	1.0	2.7
0.25	19 x 0.13	80.0	0.20	1.05	3.2
0.34	7 x 0.25	57.5	0.20	1.15	4.0
0.38**	19 x 0.16	54.1	0.20	1.15	4.4
0.5	7 x 0.30	39.6	0.20	1.3	5.6
0.5	16 x 0.20	39.0	0.20	1.3	5.9
0.6	19 x 0.20	32.8	0.20	1.4	6.4
0.75	24 x 0.20	26.0	0.20	1.45	8.5
0.88	7 x 0.40	22.2	0.20	1.5	9.0
0.93	19 x 0.25	21.0	0.20	1.7	10.0
1	32 x 0.20	19.5	0.20	1.7	11.4
1.34	19 x 0.30	14.6	0.20	1.9	13.9
1.5	30 x 0.25	13.3	0.20	1.95	15.6
2.5	50 x 0.25	7.98	0.20	2.5	25.6
4	56 x 0.30	4.95	0.25	3.1	38.9
6	84 x 0.30	3.30	0.35	3.9	55.6
10	80 x 0.40	1.91	0.40	5.2	101
16	126 x 0.40	1.21	0.40	6.5	147
25	196 x 0.40	0.780	0.60	8.2	242
35	276 x 0.40	0.554	0.60	9.2	320
50	396 x 0.40	0.386	0.70	11.2	465

\*\* Nominal cross-section not available with the ref. EETFE.

\*\* Nominal cross-sections not available with the ref. ETFE.

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LES CABLES DE L'EXTREME

# SILIFLON®

## KU 01 and KU 02

### -55 °C to +150 °C

## FLUOROPOLYMER INSULATED WIRES AND CABLES

KU 01

2

1

KU 02

4

3

2

1

## Approvals - standards

- Inspired from NF C 93-524 standard.

## Applications

- Wires used in aeronautical and electronic applications and all instrumentation uses requiring excellent resistance to high temperatures and to chemical influences.

## Options

- Compliance with American standards SAE AS 22756/16 and SAE AS 22759/18: contact us.
- Other colours: contact us.

#### Characteristics

##### General

- Continuous operating temperatures: -55 °C to +150 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

## Electrical (as per UTE C 93-524)

- Rated voltage: 600 Vac – 850 Vdc.
- Test voltage: KU 01: 3400 Vac.  
KU 02: 1500 Vac.

## Standard products

- Standard insulation colour: white.
- Standard outer sheath colour: white.

## KU 01 and KU 02

## CONCENTRIC CORE

AWG	Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)
30	0.05	7 x 0.10	365.4
28	0.09	7 x 0.13	208.0
26	0.15	19 x 0.10	128.7
24	0.25	19 x 0.13	76.6
22	0.38	19 x 0.16	50.3
20	0.60	19 x 0.20	32.1
18	0.93	19 x 0.25	20.6
16	1.34	19 x 0.30	14.3
14	1.82	37 x 0.25	10.6
12	3.00	37 x 0.32	6.5

## INSULATED WIRE

## KU 01

Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.63	0.9	1.33	4.7
0.69	1.3	1.39	5.0
0.81	1.9	1.51	5.8
0.91	2.8	1.71	7.2
1.10	4.2	1.96	10.1
1.52	6.9	2.38	13.4
1.80	10.5	2.76	19.3
2.00	14.4	2.96	23.5
2.36	19.5	3.32	30.8
2.89	36.1	3.85	48.1

For this product, please contact:

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LES CABLES DE L'EXTREME

# SILIFLON® 7YA

## VDE approval

### -90 °C to +135 °C



#### Approvals - standards

- 7YA: VDE approval as per standards DIN VDE 0250 Part 1 and DIN VDE 0250 Part 106 - Licence no. 88272.

#### Applications

- Cabling in household electrical appliances, electronics.
- Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
- Cabling requiring compact size and excellent mechanical strength.

2 1

VDE-Reg-Nr : 9838

- 1 • Flexible bare copper core - class 5 as per IEC 60228 / DIN VDE 0295.
- 2 • Insulation: Fluorinated polymer ETFE.

#### Characteristics General

- Continuous operating temperatures:  
 > Bare copper core: -90 °C to +130 °C.  
 > Tin-plated, nickel-plated or silver-plated copper core: -90 °C to +135 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

#### Electrical

#### 7YA

- Rated voltage: 450/750 V
- Test voltage: 2500 V

#### Standard products

- All colours including translucent.

#### Options

- Flexible tin-plated copper core - ref. E7YA and E7YS: contact us.
- Flexible nickel-plated copper core - ref. CN7YA and CN7YS: contact us.
- Flexible silver-plated copper core - ref. A7YA and A7YS: contact us.
- Solid bare copper core - ref. R7YA and R7YS: see details of the option below.
- Solid tin-plated copper core - ref. RE7YA and RE7YS: contact us.

#### 7YA

##### Flexible core • class 5 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.25*	19 x 0.13 or 7 x 0.22	80.7	0.40	1.45	4.6
0.5	16 x 0.20	39.0	0.40	1.7	7.8
0.75	24 x 0.20	26.0	0.40	1.85	9.9
1	32 x 0.20	19.5	0.40	2.0	12.6
1.5	30 x 0.25	13.3	0.50	2.4	18.9
2.5	50 x 0.25	7.98	0.60	3.1	31.0
4	56 x 0.30	4.95	0.60	3.8	43.6
6	84 x 0.30	3.30	0.60	4.3	60.1

##### INSULATED WIRE

##### Option • R7YA

##### Solid core • class 1 as per IEC 60228

0.25*	1 x 0.56	73.4	0.40	1.35	4.2
0.5	1 x 0.80	36.0	0.40	1.6	7.1
0.75	1 x 0.98	24.5	0.40	1.8	9.8
1	1 x 1.13	18.1	0.40	1.95	12.4
1.5	1 x 1.36	12.1	0.50	2.4	18.3
2.5	1 x 1.77	7.41	0.60	3.0	30.0
4	1 x 2.24	4.61	0.60	3.45	44.7
6	1 x 2.74	3.08	0.60	3.95	63.9

For this product, please contact:

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\* Nominal cross-section not included in IEC 60228.

(1) Standardised name: N7YA VDE.

(2) Standardised name: N7YA VDE.

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LES CABLES DE L'EXTREME

# SILIFLON® 7Y

VDE approval  
-90 °C to +135 °C



1 • Solid bare or tin-plated copper core.  
2 • Insulation: Fluorinated polymer ETFE.



## Approvals - standards

- VDE approval as per standard DIN VDE 0881 - licence no. 088244.

## Applications

- Cabling in electronics and household appliances.
- Cabling in hot and aggressive environments (humidity, chemicals, etc.).

## Options

- Solid silver-plated copper core: contact us.
  - Twisted pair or triple or quad with no outer sheath - Standardised reference: 7Y n x Cross-section/Østranding (n being the number of twisted conductors).

## Characteristics

### General

- Continuous operating temperatures: -90 °C to +135 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

### Electrical

- Rated voltage:
  - > Nominal thickness of insulation (0.15 mm): 375 V.
  - > Nominal thickness of insulation (0.25 mm): 900 V.
- Test voltage:
  - > Nominal thickness of insulation (0.15 mm): 1500 V.
  - > Nominal thickness of insulation (0.25 mm): 2500 V.

## Standard products

- All colours including translucent.

7Y

Standardised reference	SOLID CORE			INSULATED WIRE		
	Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (bare copper core)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
7Y 1 x 0.25/0.55	0.05	1 x 0.25	384	0.15	0.55	0.8
7Y 1 x 0.32/0.6*	0.08	1 x 0.32	230	0.15	0.62	1.1
7Y 1 x 0.4 /0.7	0.125	1 x 0.40	146	0.15	0.7	1.6
7Y 1 x 0.5 /0.8	0.20	1 x 0.50	93.1	0.15	0.8	2.3
7Y 1 x 0.63/0.95*	0.31	1 x 0.63	58.7	0.15	0.93	3.4
7Y 1 x 0.8 /1.1	0.50	1 x 0.80	36.0	0.15	1.1	5.3
7Y 1 x 0.25/0.75	0.05	1 x 0.25	384	0.25	0.75	1.1
7Y 1 x 0.32/0.8*	0.08	1 x 0.32	230	0.25	0.82	1.5
7Y 1 x 0.4 /0.9	0.125	1 x 0.40	146	0.25	0.9	2.0
7Y 1 x 0.5 /1.0	0.20	1 x 0.50	93.1	0.25	1.0	2.8
7Y 1 x 0.63/1.2*	0.31	1 x 0.63	58.7	0.25	1.13	4.0
7Y 1 x 0.8 /1.3	0.50	1 x 0.80	36.0	0.25	1.3	5.9
7Y 1 x 1.0 /1.5*	0.785	1 x 1.00	23.1	0.25	1.5	8.7
7Y 1 x 1.3 /1.8*	1.33	1 x 1.30	13.6	0.25	1.8	14.0
7Y 1 x 1.6 /2.1*	2.01	1 x 1.60	9.01	0.25	2.1	20.6
7Y 1 x 2.1 /2.6*	3.46	1 x 2.10	5.23	0.25	2.6	34.3

\* Contact us.

For this product, please contact:

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**omerin**  
LES CABLES DE L'EXTREME

**SILIFLON® Li7Y**  
**VDE approval**  
**-90 °C to +135 °C**



FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Concentric bare, tin-plated or silver-plated copper core.  
2 • Insulation: Fluorinated polymer ETFE.

**Approvals - standards**

- VDE approval as per standard DIN VDE 0881 - Licence no. 085392.

**Applications**

- Cabling in electronics and household appliances.
  - Cabling in hot and aggressive environments (humidity, chemicals, etc.).

**Options**

- Twisted pair or triple or quad with no outer sheath - Standardised reference:

Li7Y n x Cross-section/Østranding  
(n being the number of twisted conductors).

**Characteristics**

**General**

- Continuous operating temperatures: -90 °C to +135 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

**Electrical**

- Rated voltage:
  - > Nominal thickness of insulation (0.15 mm): 375 V.
  - > Nominal thickness of insulation (0.25 mm): 900 V.
  - > Nominal thickness of insulation (0.40 mm): 1500 V.
  - > Nominal thickness of "ECO" insulation: 900 V.
- Test voltage:
  - > Nominal thickness of insulation (0.15 mm): 1500 V.
  - > Nominal thickness of insulation (0.25 mm): 2500 V.
  - > Nominal thickness of insulation (0.40 mm): 3000 V.
  - > Nominal thickness of "ECO" insulation: 2500 V.

**Standard products**

- All colours including translucent.

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LES CABLES DE L'EXTREME

CONCENTRIC CORE				INSULATED WIRE OR CABLE		
Standardised reference	Nominal cross-section	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (bare copper core)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
<b>Standardised series</b>						
Li7Y 1 x 0.055/0.6	0.055	7 x 0.10	349	0.15	0.6	0.9
Li7Y 1 x 0.079/0.7	0.079	7 x 0.12	236	0.15	0.65	1.1
Li7Y 1 x 0.12 /0.8	0.12	7 x 0.15	151	0.15	0.75	1.6
Li7Y 1 x 0.22 /0.9	0.22	7 x 0.20	84.8	0.15	0.9	2.6
Li7Y 1 x 0.34 /1.1	0.34	7 x 0.25	54.3	0.15	1.05	3.8
Li7Y 1 x 0.56 /1.3	0.56	19 x 0.20**	32.5	0.15	1.25	5.9
Li7Y 1 x 0.055/0.8	0.055	7 x 0.10	349	0.25	0.8	1.2
Li7Y 1 x 0.079/0.9	0.079	7 x 0.12	236	0.25	0.85	1.5
Li7Y 1 x 0.12 /1.0	0.12	7 x 0.15	151	0.25	0.95	2.0
Li7Y 1 x 0.22 /1.1	0.22	7 x 0.20	84.8	0.25	1.1	3.1
Li7Y 1 x 0.34 /1.3	0.34	7 x 0.25	54.3	0.25	1.25	4.4
Li7Y 1 x 0.56 /1.5	0.56	19 x 0.20**	32.5	0.25	1.45	6.6
Li7Y 1 x 0.93 /1.8	0.93	19 x 0.25	20.0	0.25	1.75	10.4
Li7Y 1 x 1.3 /2.0	1.3	19 x 0.29	14.9	0.25	1.95	13.6
Li7Y 1 x 1.9 /2.3	1.9	19 x 0.36	9.46	0.25	2.3	20.1
Li7Y 1 x 3.2 /2.8	3.2	19 x 0.46	5.79	0.25	2.8	31.8
Li7Y 1 x 0.12 /1.3	0.12	7 x 0.15	151	0.40	1.25	2.9
Li7Y 1 x 0.22 /1.4	0.22	7 x 0.20	84.8	0.40	1.4	4.1
Li7Y 1 x 0.34 /1.6	0.34	7 x 0.25	54.3	0.40	1.55	5.5
Li7Y 1 x 0.56 /1.8	0.56	19 x 0.20**	32.5	0.40	1.75	7.9
Li7Y 1 x 0.93 /2.1	0.93	19 x 0.25	20.0	0.40	2.05	11.9
Li7Y 1 x 1.3 /2.3	1.3	19 x 0.29	14.9	0.40	2.25	15.2
Li7Y 1 x 1.9 /2.6	1.9	19 x 0.36	9.46	0.40	2.6	22.1
Li7Y 1 x 3.2 /3.1	3.2	19 x 0.46	5.79	0.40	3.1	34.2
Li7Y 1 x 4.6 /3.6	4.6	37 x 0.40	3.93	0.40	3.6	48.7
Li7Y 1 x 8.8 /5.2	8.8	133 x 0.29*	2.12	0.60	5.2	93.8
Li7Y 1 x 13.5 /6.2	13.5	133 x 0.36*	1.35	0.60	6.25	140
<b>Economical series</b>						
Li7Y 1 x 0.15 /0.8	0.15	19 x 0.10	135	0.16	0.8	1.9
Li7Y 1 x 0.22 /0.9	0.22	19 x 0.12	86.0	0.16	0.9	2.5
Li7Y 1 x 0.36 /1.1	0.36	19 x 0.15	53.2	0.16	1.1	3.9
Li7Y 1 x 0.59 /1.3	0.59	19 x 0.20	32.4	0.17	1.3	6.3
Li7Y 1 x 0.93 /1.55	0.93	19 x 0.25	20.4	0.17	1.55	9.5
Li7Y 1 x 1.3 /1.8	1.3	19 x 0.29	15.8	0.21	1.8	12.8
Li7Y 1 x 1.9 /2.15	1.9	19 x 0.36	10.0	0.23	2.15	19.3
Li7Y 1 x 2.8 /2.7	2.8	37 x 0.31	6.63	0.26	2.7	28.6
Li7Y 1 x 4.6 /3.4	4.6	37 x 0.40	4.13	0.32	3.4	46.8

\* Non-concentric cores.

\*\* Nominal stranding not defined in standard DIN VDE 0881.

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LES CABLES DE L'EXTREME

# SILIFLON® FEP and EFEP

## -90 °C to +205 °C

### Approvals - standards

- Series inspired by standards NF C 93-524 and DIN VDE 0250 Part 106.

### Applications

- Cabling for rotating machines.
- Cabling in household electrical appliances, electronics.
- Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
- Cabling requiring compact size and excellent mechanical strength.

### Options

- Nickel-plated copper core: ref. CNFEP.
- Silver-plated copper core: ref. AFEP.
  - Pure nickel core: ref. NFEP.
  - Outer electrical shielding: > Tin-plated copper braid: ref. FEPBE or EFEPBE.
- Other nominal metric or American cross-sections: contact us.
- Other nominal stranding: contact us.
- Other options and/or combinations of the options outlined above: contact us.

### Characteristics

#### General

- Continuous operating temperatures: -90 °C to +205 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

#### Electrical

- Rated voltage: 450/750 V.
- Test voltage: 2500 V.

### Standard products

- All colours including translucent.

### FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Bare (ref. FEP) or tin-plated (ref. EFEP) copper core.  
2 • Insulation: Fluorinated polymer FEP.

### FEP and EFEP

CONDUCTING CORE			INSULATED WIRE OR CABLE		
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (bare copper core)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.05	7 x 0.10	373	0.17	0.65	1.1
0.09	7 x 0.13	214	0.17	0.7	1.4
0.12*	7 x 0.15	161	0.17	0.8	1.9
0.14**	7 x 0.16	141	0.17	0.8	2.0
0.15	19 x 0.10	136	0.20	0.9	2.3
0.22	7 x 0.20	89.9	0.20	1.0	3.0
0.25	19 x 0.13	80.0	0.20	1.05	3.4
0.34	7 x 0.25	57.5	0.20	1.15	4.3
0.38**	19 x 0.16	54.1	0.20	1.15	4.6
0.5	7 x 0.30	39.6	0.20	1.3	5.9
0.5	16 x 0.20	39.0	0.20	1.3	6.2
0.6	19 x 0.20	32.8	0.20	1.4	6.7
0.75	24 x 0.20	26.0	0.20	1.45	8.8
0.88	7 x 0.40	22.2	0.20	1.5	9.3
0.93	19 x 0.25	21.0	0.20	1.7	10.5
1	32 x 0.20	19.5	0.20	1.7	11.9
1.34	19 x 0.30	14.6	0.20	1.9	14.3
1.5	30 x 0.25	13.3	0.20	1.95	16.3
2.5	50 x 0.25	7.98	0.20	2.5	26.6
4	56 x 0.30	4.95	0.25	3.1	40.4
6	84 x 0.30	3.30	0.35	3.9	57.7
10	80 x 0.40	1.91	0.40	5.2	104
16	126 x 0.40	1.21	0.40	6.2	150
25	196 x 0.40	0.780	0.60	8.2	248
35	276 x 0.40	0.554	0.60	9.2	328
50	396 x 0.40	0.386	0.70	11.2	478

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\* Nominal cross-section not available with the ref. EFEP.

\*\* Nominal cross-sections not available with the ref. FEP.

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LES CABLES DE L'EXTREME

# SILIFLON® 6YS

## VDE approval

### -90 °C to +180 °C

#### Approvals - standards

- 6YS: VDE approval as per standard DIN VDE 0250 Part 106 - Licence no. 107583.



#### Applications

- Cabling in household electrical appliances, electronics.
- Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
- Cabling requiring compact size and excellent mechanical strength.

#### Characteristics General

- Continuous operating temperatures:  
> Bare copper core: -90 °C to +130 °C.  
> Tin-plated, nickel-plated or silver-plated copper core: -90 °C to +180 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

#### Electrical      6YS

- Rated voltage: 300/500 V.
- Test voltage: 2000 V.

#### Standard products

- All colours including translucent.

#### Options

- Flexible tin-plated copper core – ref. E6YA and E6YS: contact us.
- Flexible nickel-plated copper core – ref. CN6YA and CN6YS: contact us.
- Flexible silver-plated copper core – ref. A6YA and A6YS: contact us.
- Solid bare copper core – ref. R6YA and R6YS: see details of the option below.
- Solid tin-plated copper core – ref. RE6YA and RE6YS: contact us.

#### 6YS

##### Flexible core • class 5 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)
0.25*	19 x 0.13 or 7 x 0.22	80.7
0.5	16 x 0.20	39.0
0.6*	19 x 0.20	32.8
0.75	24 x 0.20	26.0
1	32 x 0.20	19.5
1.5	30 x 0.25	13.3
2.5	50 x 0.25	7.98
4	56 x 0.30	4.95
6	84 x 0.30	3.30

##### INSULATED WIRE

Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.30	1.25	4.2
0.30	1.5	6.5
0.30	1.5	7.4
0.30	1.65	8.7
0.30	1.8	10.9
0.30	2.0	14.9
0.35	2.6	25.0
0.40	3.4	41.9
0.40	3.9	60.1

#### Option • R6YS

##### Solid core • class 1 as per IEC 60228

0.25*	1 x 0.56	73.4
0.5	1 x 0.80	36.0
0.75	1 x 0.98	24.5
1	1 x 1.13	18.1
1.5	1 x 1.36	12.1
2.5	1 x 1.77	7.41
4	1 x 2.24	4.61
6	1 x 2.74	3.08

0.30	1.15	3.9
0.30	1.4	6.8
0.30	1.6	9.5
0.30	1.75	12.0
0.30	2.0	16.7
0.35	2.5	27.4
0.40	3.05	42.7
0.40	3.55	61.7

For this product, please contact:

\* Nominal cross-sections not described in IEC 60228.

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# SILIFLON® 6Y6YS and E6Y6YS

*Double insulating layer  
VDE approval  
-90 °C to +180 °C*

## Approvals - standards

- VDE approval as per standard DIN VDE 0250  
Part 106 -  
Licence no. 40001865.



## Applications

- Cabling for class 2 light fittings, household electrical appliances, electronics, etc.
- Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
  - Cabling in the medical field.
  - Cabling requiring compact size and excellent mechanical strength.

## Options

- Nickel-plated copper core - ref. CN6Y6YS: contact us.
- Silverplated copper core - ref. A6Y6YS: contact us.
- Solid bare (ref. R6Y6YS) or tin-plated (ref. RE6Y6YS) copper core: See details of the option below.

## 6Y6YS and E6Y6YS

### Characteristics

#### General

- Continuous operating temperatures:  
> Bare copper core: -90 °C to +130 °C.  
> Tin-plated, nickel-plated or silver-plated copper core: -90 °C to +180 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

#### Electrical

- Rated voltage: 300/500 V.
- Test voltage: 2000 V.

### Standard products

- All solid colours.

## FLUOROPOLYMER INSULATED WIRES AND CABLES



- 1 • Multistrand bare (ref. 6Y6YS) or tin-plated (ref. E6Y6YS) copper core.
- 2 • Insulation: Fluorinated polymer FEP.

#### MULTISTRAND CORE

AWG	(mm <sup>2</sup> )	Nominal cross-section	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (tin-plated copper core)	INSULATED WIRE		
					Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
24	0.25	19 x 0.13	19 x 0.13	82.9	0.60	1.85	7.3
22	0.34	7 x 0.25	7 x 0.25	60.6	0.60	1.95	8.5
-	0.38	19 x 0.16	19 x 0.16	55.7	0.60	2.0	9.1
-	0.5	16 x 0.20	16 x 0.20	40.1	0.60	2.1	10.5
-	0.5	7 x 0.30	7 x 0.30	36.7	0.60	2.1	10.5
20	0.6	19 x 0.20	19 x 0.20	33.7	0.60	2.15	11.4
18	0.75	24 x 0.20	24 x 0.20	26.7	0.60	2.25	13.8
-	0.93	19 x 0.25	19 x 0.25	21.6	0.60	2.4	15.4
-	1	32 x 0.20	32 x 0.20	20.0	0.60	2.45	17.2
16	1.34	19 x 0.30	19 x 0.30	15.0	0.60	2.6	20.2
-	1.5	30 x 0.25	30 x 0.25	13.7	0.60	2.65	21.7

#### Option • R6Y6YS and RE6Y6YS

#### SOLID CORE

-	0.25	1 x 0.56	74.8	0.60	1.75	6.9
-	0.5	1 x 0.80	36.7	0.60	2.0	10.2
-	0.75	1 x 0.98	24.8	0.60	2.2	13.3
-	1	1 x 1.13	18.2	0.60	2.35	16.2
-	1.5	1 x 1.38	12.2	0.60	2.6	21.7

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LES CABLES DE L'EXTREME

# SILIFLON® PFA and EPFA

-90 °C to +260 °C

## Approvals - standards

- Series inspired by standards NF C 93-524 and DIN VDE 0250 Part 106.

## Applications

- Cabling for rotating machines.
- Cabling in household electrical appliances, electronics.
- Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
- Cabling requiring compact size and excellent mechanical strength.

## Options

- Nickel-plated copper core: ref. CNPFA.
- Silver-plated copper core: ref. APFA.
- Pure nickel core: ref. NPFA.
- Outer electrical shielding:
- > Tin-plated copper braid: ref. PFABE or EPFABE.
- Other nominal metric or American cross-sections: contact us.
- Other nominal stranding: contact us.
- Other options and/or combinations of the options outlined above: contact us.

## Characteristics

### General

- Continuous operating temperatures: -90 °C to +260 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

### Electrical

- Rated voltage: 450/750 V.
- Test voltage: 2500 V.

## Standard products

- All colours including translucent.

## PFA and EPFA

CONDUCTING CORE			INSULATED WIRE OR CABLE		
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (bare copper core)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.05	7 x 0.10	373	0.17	0.65	1.1
0.09	7 x 0.13	214	0.17	0.7	1.4
0.12*	7 x 0.15	161	0.17	0.8	1.9
0.14**	7 x 0.16	141	0.17	0.8	2.0
0.15	19 x 0.10	136	0.20	0.9	2.3
0.22	7 x 0.20	89.9	0.20	1.0	3.0
0.25	19 x 0.13	80.0	0.20	1.05	3.4
0.34	7 x 0.25	57.5	0.20	1.15	4.3
0.38**	19 x 0.16	54.1	0.20	1.15	4.6
0.5	7 x 0.30	39.6	0.20	1.3	5.9
0.5	16 x 0.20	39.0	0.20	1.3	6.2
0.6	19 x 0.20	32.8	0.20	1.4	6.7
0.75	24 x 0.20	26.0	0.20	1.45	8.8
0.88	7 x 0.40	22.2	0.20	1.5	9.3
0.93	19 x 0.25	21.0	0.20	1.7	10.5
1	32 x 0.20	19.5	0.20	1.7	11.9
1.34	19 x 0.30	14.6	0.20	1.9	14.3
1.5	30 x 0.25	13.3	0.20	1.95	16.3
2.5	50 x 0.25	7.98	0.20	2.5	26.6
4	56 x 0.30	4.95	0.25	3.1	40.4
6	84 x 0.30	3.30	0.35	3.9	57.7
10	80 x 0.40	1.91	0.40	5.2	104
16	126 x 0.40	1.21	0.40	6.2	150
25	196 x 0.40	0.780	0.60	8.2	248
35	276 x 0.40	0.554	0.60	9.2	328
50	396 x 0.40	0.386	0.70	11.2	478

\* Nominal cross-section not available with the ref. EPFA.

\*\* Nominal cross-sections not available with the ref. PFA.

For this product, please contact:

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The information provided in this technical data sheet is indicative and may be modified without prior notice, laying, wiring and electrical conditions and the environment of the cable can not be fully considered in our studies. In some cases, for production purposes, a separating tape may be added between two successive layers. In no way the company OMERIN shall be held responsible for any incidents in the case of inappropriate uses, particularly in the case of wiring conditions that do not respect the good practice and the standards in force. For an optimum use of the cables produced by our company, we recommend testing in real conditions. Our sales department is available for a possible provision of samples, and/or for the conditions of a complete study in our laboratories.® Registered trademark of the OMERIN Group. Drawings and photos are not contractual. Reproduction is prohibited without the prior agreement of OMERIN.

**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® 51YS

VDE approval

-90 °C to +250 °C

## Approvals - standards

- VDE approval as per standard DIN VDE 0250 Part 106 - Licence no. 106489.



## Applications

- Cabling in household electrical appliances, electronics.
  - Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
  - Cabling requiring compact size and excellent mechanical strength.

## Options

- Flexible tin-plated copper core - ref. E51YS: contact us.
- Flexible nickel-plated copper core - ref. CN51YS: contact us.
- Flexible silverplated copper core - ref. A51YS: contact us.
  - Solid bare copper core - ref. R51YS: see details of the option below.
  - Solid tin-plated copper core - ref. RE51YS: contact us.
  - Rated voltage 450/750 V - ref. 51YA: contact us.

## Characteristics

### General

- Continuous operating temperatures:
  - > Bare copper core: -90 °C to +130 °C.
  - > Tin-plated copper core: -90 °C to +180 °C.
  - > Silver-plated copper core: -90 °C to +200 °C.
  - > Nickel-plated copper core: -90 °C to +250 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

### Electrical

- Rated voltage: 300/500 V.
- Test voltage: 2000 V.

## Standard products

- All colours including translucent.

## 51YS

### Flexible core • class 5 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)
0.25*	19 x 0.13 or 7 x 0.22	79.9
0.5	16 x 0.20	39.0
0.75	24 x 0.20	26.0
1	32 x 0.20	19.5
1.5	30 x 0.25	13.3
2.5	50 x 0.25	7.98
4	56 x 0.30	4.95
6	84 x 0.30	3.30

### INSULATED WIRES

Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.30	1.25	4.2
0.30	1.5	6.5
0.30	1.65	8.7
0.30	1.8	10.9
0.30	2.0	14.9
0.35	2.6	25.0
0.40	3.4	41.9
0.40	3.9	60.1

### Option • R51YS

### Solid core • class 1 as per IEC 60228

0.25*	1 x 0.56	74.5	0.30	1.15	3.9
0.5	1 x 0.80	36.0	0.30	1.4	6.8
0.75	1 x 0.98	23.1	0.30	1.6	9.5
1	1 x 1.13	18.1	0.30	1.75	12.0
1.5	1 x 1.36	12.1	0.30	2.0	16.7
2.5	1 x 1.77	7.41	0.35	2.5	27.4
4	1 x 2.24	4.61	0.40	3.05	42.7
6	1 x 2.74	3.08	0.40	3.55	61.7

For this product, please contact:

\* Nominal cross-section not described in IEC 60228.

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**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® RETFE, RFEP and RPFA

-90 °C to +260 °C

## Approvals - standards

- Series inspired by standard NF C 93-522.

## Applications

- Cabling in household electrical appliances, electronics.
- Cabling in hot or cold environments (cryogenics).
- Cabling in aggressive environments (humidity, chemicals, etc.).
- Cabling requiring compact size and excellent mechanical strength.

## Options

- Solid tin-plated copper core  
– ref. REETFE, REFEP and REPFA: contact us.
- Solid silver-plated copper core  
– ref. RAETFE, RAFEP and RAPEA: contact us.
- Solid nickel-plated copper core  
– ref. RCNETFE, RCNFEP and RCNPFA:  
contact us.
- Solid pure nickel core  
– ref. RNETFE, RNFEP and RNPFA: contact us.

## RETFE, RFEP and RPFA

## Characteristics

### General

- Continuous operating temperatures:  
RETFE: -90 °C to +155 °C.  
RFEP: -90 °C to +205 °C.  
RPFA: -90 °C to +260 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

### Electrical

- Rated voltage: 300/500 V.
- Test voltage: 2500 V.

### Standard products

- All colours including translucent.

## FLUOROPOLYMER INSULATED WIRES AND CABLES



- 1 • Solid bare copper core.
- 2 • Insulation: Fluorinated polymer ETFE (ref. RETFE) or FEP (ref. RFEP) or PFA (ref. RPFA).

### SOLID CORE

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)
0.03	1 x 0.20	599
0.05	1 x 0.25	384
0.07	1 x 0.30	268
0.125	1 x 0.40	140
0.15	1 x 0.43	118
0.2	1 x 0.50	93.1
0.22	1 x 0.52	84.2
0.32*	1 x 0.64	57.5
0.5	1 x 0.80	36.0
0.75	1 x 0.98	24.5
1	1 x 1.13	18.1
1.5	1 x 1.36	12.1
2.5	1 x 1.77	7.41
4	1 x 2.24	4.61
6	1 x 2.74	3.08

### INSULATED WIRE

Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.15	0.5	0.6
0.15	0.55	0.8
0.17	0.65	1.2
0.17	0.75	1.8
0.17	0.8	2.1
0.17	0.85	2.6
0.20	1.05	4.1
0.20	1.2	5.9
0.20	1.4	8.5
0.25	1.65	11.5
0.25	1.9	16.0
0.30	2.4	26.6
0.35	2.95	41.7
0.35	3.45	60.5

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\*\* Nominal cross-section available in the solid tin-plated copper core version only.

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LES CABLES DE L'EXTREME

**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

# SILIFLON® 105 °C

## Fluoropolymer insulation UL and cUL approval



### FLUOROPOLYMER INSULATED WIRES AND CABLES

2 1



1 • Bare, tin-plated, nickel-plated or silver-plated copper core.  
2 • Insulation: Fluorinated polymer.

#### Approvals - standards

- UL approval as per standard UL 758 –  
File no.: E101965.
  - cUL approval (CSA) as per standard C22.2 No. 210 –  
File no.: E101965.
- “Horizontal flame test” as per UL approval.
  - “FT1 flame rating” as per cUL approval.

#### Applications

- Cabling for household electrical heating appliances, small electric motors, electronic equipment, rear computer panels, etc.

#### Options

- Other nominal cross-sections: contact us.
  - Other style nos. available: styles no. 1226, 1517 and 1523.
- Style n° 1863 (125°C - 300 V): contact us.

#### Characteristics General

- Continuous operating temperatures: -90 °C to +105 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

#### Electrical

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

#### Standard products

- All colours including translucent.
- Stranding of conducting cores: contact us.

Style no. Insulation	1053 ETFE "Thin-wall"	1227 FEP	1508 ETFE "Thin-wall"	10101 ETFE
Approval	105 °C - VNS	105 °C - VNS	105 °C - 30 V	105 °C - 250 V
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)
AWG (mm <sup>2</sup> )	(mm)	(mm)	(mm)	(mm)
30 0.05	0.13	0.55	0.20	0.7
28 0.09	0.13	0.65	0.20	0.8
26 0.13	0.13	0.75	0.20	0.9
24 0.22	0.13	0.85	0.20	1.0
22 0.34	0.13	1.0	0.20	1.15
- 0.5	0.13	1.2	0.20	1.3
20 0.6	0.13	1.25	0.20	1.4
- 0.75	-	-	0.33	1.75
18 0.93	-	-	0.33	1.9
- 1	-	-	0.33	1.95
16 1.34	-	-	0.33	2.2
- 1.5	-	-	0.33	2.2
14 -	-	-	0.33	2.6
- 2.5	-	-	0.33	2.7
12 -	-	-	0.33	3.2
- 4	-	-	0.33	3.25
10 -	-	-	0.33	3.9
- 6	-	-	0.33	3.9
Conducting metal	BCD	BCDEFG	BCD	BCD

#### KEY

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silver-plated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/B External or Internal wiring

NS Not Specified  
VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
Only the average thickness of insulation should be taken into account.

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**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® Style 10935

## ETFE insulation + reinforcing braid

### UL and cUL approval

### -60 °C to +150 °C

#### Approvals - standards

- UL approval as per standard UL 758 –  
File no.: E101965.
- cUL approval as per standard C22.2 No. 210  
(AWM I A/B FT1 FT2 150°C 600V) –  
File no.: E101965.
- CSA approval as per standard C22.2 No. 127  
(Equipment and Lead Wire).
  - “Horizontal flame test” as per UL approval.
  - “FT1 flame rating” as per cUL approval.
  - “FT2 flame rating” as per cUL approval.

#### Applications

- Internal cabling for electrical appliances or electronic appliances.

#### Options

- Other nominal stranding: contact us.
- Other colours: contact us.



#### FLUOROPOLYMER INSULATED WIRES AND CABLES

3 2 1

SILIFLON 150C 10935 AWM

- Bare or tin-plated copper core.
- Insulation: Fluorinated polymer ETFE.
- Reinforcement: Varnished synthetic fibre braid.

#### Characteristics

##### General

- Continuous operating temperatures: -60 °C to +150 °C.
- Excellent resistance to solvents, impregnation varnish and other chemical influences.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

##### Electrical

- Rated voltage: 600 V.
- Test voltage: 6000 V.

#### Standard products

- Standard insulation colour: white.
- Standard reinforcing braid colours: white, blue, red, black, yellow or brown.

#### Style no.

#### 10935

150°C - 600 V  
AWM I A/B

Approval	Nominal diameter*				Approximate linear weight (kg/km)
	AWG	Nominal cross-section (mm <sup>2</sup> )	Average thickness of insulation (mm)	Multistrand core (mm)	
AWM I A	24	0.22	0.15	1.2	3.2
AWM I A/B	22	0.34	0.15	1.3	4.3
AWM II A/B	-	0.5	0.15	1.5	6.1
AWM I A/B	20	0.6	0.15	1.6	6.8
AWM I A/B	-	0.75	0.20	1.7	8.9
AWM I A/B	18	0.93	0.20	1.85	10.1
AWM I A/B	-	1	0.20	2.0	11.5
AWM I A/B	16	1.34	0.20	2.2	15.0
AWM I A/B	-	1.5	0.20	2.25	16.0
AWM I A/B	14	-	0.33	2.8	22.4
AWM I A/B	-	2.5	0.33	3.1	26.4
AWM I A/B	12	-	0.33	3.4	38.2
AWM I A/B	-	4	0.33	3.6	38.6
AWM I A/B	10	-	0.33	4.1	56.0
AWM I A/B	-	6	0.33	4.2	56.1
AWM I A/B	8	-	0.51	5.2	91.5
AWM I A/B	-	10	0.51	6.0	107
AWM I A/B	6	-	0.51	6.8	143
AWM I A/B	-	16	0.51	7.1	160
AWM I A/B	4	-	0.51	8.1	220
AWM I A/B	-	25	0.51	8.6	249
AWM I A/B	2	35	0.51	9.7	331
AWM I A/B	1	-	0.76	11.3	443
AWM I A/B	-	50	0.76	11.7	478
AWM I A/B	1/0	-	0.76	12.4	545
AWM I A/B	2/0	70	0.76	13.5	659
AWM I A/B	3/0	-	0.76	15.1	838
AWM I A/B	-	95	0.76	15.2	855
AWM I A/B	4/0	-	0.76	16.7	1 045
AWM I A/B	-	120	0.76	16.9	1 094

#### Conducting metal

#### BF

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core. Only the average thickness of insulation should be taken into account.

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#### KEY

Conducting metals	
B	Tin-plated copper
B*	Tin-plated copper ( $\varnothing > 0.38$ mm)
C	Nickel-plated copper
D	Silverplated copper
E	Nickel
F	Bare copper
F*	Bare copper ( $\varnothing > 0.38$ mm)
G	Nickel-plated copper 27%

AWM I A	Internal wiring, not subject to mechanical abuse
AWM I A/B	Internal wiring
AWM II A/B	External or Internal wiring
NS	Not Specified
VNS	Voltage Not Specified

■	UL approved nominal cross-sections only.
---	--

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LES CABLES DE L'EXTREME

**SILIFLON® Style 11881**  
*FEP insulation + reinforcing braid*  
*UL and cUL approval*  
**-60 °C to +200 °C**



**Approvals - standards**

- UL approval as per standard UL 758 –  
File no.: E101965.
- cUL approval as per standard C22.2 No. 210  
(AWM I A/B FT1 FT2 200°C 600V) –  
File no.: E101965.
- "Horizontal flame test" as per UL approval.
- "FT1 flame rating" as per cUL approval.
- "FT2 flame rating" as per cUL approval.

**Applications**

- Internal cabling for electrical appliances  
or electronic appliances.

**Options**

- Other nominal stranding: contact us.
- Other colours: contact us.

FLUOROPOLYMER INSULATED WIRES AND CABLES

3 2 1



- 1 • Bare, tin-plated, nickel-plated or silver-plated copper core.
- 2 • Insulation: Fluorinated polymer FEP.
- 3 • Reinforcement: Varnished fiberglass braid.

**Characteristics**  
**General**

- Continuous operating temperatures: -60 °C to +200 °C.
- Excellent resistance to solvents, impregnation varnish and other chemical influences.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

**Electrical**

- Rated voltage: 600 V.
- Test voltage: 6000 V.

**Standard products**

- Standard insulation colour: white.
- Standard reinforcing braid colours: white, blue, red, black, yellow or brown.

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LES CABLES DE L'EXTREME

## Style no.

11881

## Approval

200°C - 600 V  
AWM I A/B

AWG	Nominal cross-section (mm <sup>2</sup> )	Average thickness of insulation (mm)	Nominal diameter*		Approximate linear weight (kg/km)
			Multistrand core (mm)	Solid core (mm)	
24	0.22	0.15	1.2	1.15	3.2
22	0.34	0.15	1.3	1.2	4.3
-	0.5	0.15	1.5	1.4	6.1
20	0.6	0.15	1.6	-	6.8
-	0.75	0.20	1.7	1.65	8.9
18	0.93	0.20	1.85	1.7	10.1
-	1	0.20	2.0	1.9	11.5
16	1.34	0.20	2.2	2.0	15.0
-	1.5	0.20	2.25	2.1	16.0
14	-	0.33	2.8	2.6	22.4
-	2.5	0.33	3.1	2.9	26.4
12	-	0.33	3.4	-	38.2
-	4	0.33	3.6	3.3	38.6
10	-	0.33	4.1	-	56.0
-	6	0.33	4.2	4.0	56.1
8	-	0.51	5.2	-	91.5
-	10	0.51	6.0	-	107
6	-	0.51	6.8	-	143
-	16	0.51	7.1	-	160
4	-	0.51	8.1	-	220
-	25	0.51	8.6	-	249
2	35	0.51	9.7	-	331
1	-	0.76	11.3	-	443
-	50	0.76	11.7	-	478
1/0	-	0.76	12.4	-	545
2/0	70	0.76	13.5	-	659
3/0	-	0.76	15.1	-	838
-	95	0.76	15.2	-	855
4/0	-	0.76	16.7	-	1 045
-	120	0.76	16.9	-	1 094

Conducting metal

B\*CDEF\*G

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core. Only the average thickness of insulation should be taken into account.

## KEY

- Conducting metals
- B** Tin-plated copper
- B\*** Tin-plated copper ( $\varnothing > 0.38$  mm)
- C** Nickel-plated copper
- D** Silver-plated copper
- E** Nickel
- F** Bare copper
- F\*** Bare copper ( $\varnothing > 0.38$  mm)
- G** Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/B External or Internal wiring

NS Not Specified  
VNS Voltage Not Specified

■ : UL approved nominal cross-sections only.

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**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

# SILIFLON® 150 °C

## Fluoropolymer insulation UL and cUL approval



### Approvals - standards

- UL approval as per standard UL 758 – File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 – File no.: E101965.
- “Horizontal flame test” as per UL approval.
  - “FT1 flame rating” as per cUL approval.
- VW-1 approval for Style 1333, Style 10126 and Style 11945 (AWG 24 to 18 Cross-sections).

### Characteristics

#### General

- Continuous operating temperatures: -90 °C to +150 °C.
- Excellent resistance to aggressive chemical environments.
  - Excellent resistance to humidity and UV.
  - Excellent mechanical strength.
- **Electrical**
  - Rated voltage: as per style no.
  - Test voltage: 10 x Rated voltage.

### Standard products

- All colours including translucent.
- Stranding of conducting cores: contact us.

### Applications

- Cabling for household electrical heating appliances, rotating machines, industrial machines, electronic equipment, rear computer panels, etc.

### Options

- Other nominal cross-sections: contact us.
  - Other style nos. available: styles no. 1591, 1814, 1829, 1857, 1858, 1859, 11537, 10211.

### FLUOROPOLYMER INSULATED WIRES AND CABLES

2

1

1500 300V FT1 SILIFLON 150C 10125 AWM

- Bare, tin-plated, nickel-plated or silver-plated copper core.
- Insulation: Fluorinated polymer.

Style no. Insulation Approval	1827 ETFE "Thin-wall"			10125 ETFE "Thin-wall"			1828 ETFE			1643 ETFE		
	150 °C - 125 V			150 °C - 300 V			150 °C - 300 V			150 °C - 300 V		
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter*	Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter*	Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter*	Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter*	
AWG (mm <sup>2</sup> )												
30	0.05	0.14	0.6	0.15	0.6	0.33	0.33	0.95	0.33	0.95	0.33	0.95
28	0.09	0.14	0.7	0.15	0.7	0.33	0.33	1.05	0.33	1.05	0.33	1.05
26	0.13	0.14	0.75	0.15	0.75	0.33	0.33	1.15	0.33	1.15	0.33	1.15
24	0.22	0.14	0.9	0.15	0.9	0.33	0.33	1.3	0.33	1.3	0.33	1.3
22	0.34	0.14	1.05	0.15	1.05	0.33	0.33	1.4	0.33	1.4	0.33	1.4
-	0.5	0.14	1.2	0.15	1.25	0.33	0.33	1.6	0.33	1.6	0.33	1.6
20	0.6	0.14	1.3	0.15	1.3	0.33	0.33	1.65	0.33	1.65	0.33	1.65
-	0.75	0.20	1.5	0.15	1.4	0.33	0.33	1.75	0.33	1.75	0.33	1.75
18	0.93	0.20	1.65	0.15	1.55	0.33	0.33	1.9	0.33	1.9	0.33	1.9
-	1	0.20	1.7	0.15	1.65	0.33	0.33	1.95	0.33	1.95	0.33	1.95
16	1.34	0.20	1.9	0.20	1.9	0.33	0.33	2.2	0.33	2.2	0.33	2.2
-	1.5	0.20	1.9	0.20	1.9	0.33	0.33	2.2	0.33	2.2	0.33	2.2
14	-	0.33	2.55	0.20	2.5	0.33	0.33	2.55	0.33	2.55	0.33	2.55
-	2.5	0.33	2.7	0.20	2.45	0.33	0.33	2.7	0.33	2.7	0.33	2.7
12	-	0.33	3.1	0.25	2.9	0.33	0.33	3.1	0.33	3.0	0.33	3.0
-	4	0.33	3.25	0.25	3.1	0.33	0.33	3.25	0.33	3.25	0.33	3.25
10	-	0.33	3.7	0.25	3.6	0.33	0.33	3.7	0.33	3.9	0.33	3.9
-	6	0.33	3.9	0.25	3.7	0.33	0.33	3.9	0.33	3.9	0.33	3.9
8	-	-	-	0.64	5.4	-	-	-	0.51	5.3	-	-
-	10	-	-	0.64	5.7	-	-	-	0.51	5.4	-	-
6	-	-	-	0.64	6.6	-	-	-	0.51	6.3	-	-
-	16	-	-	0.64	6.7	-	-	-	0.51	6.6	-	-
4	-	-	-	0.64	7.8	-	-	-	0.51	7.4	-	-
-	25	-	-	0.64	8.3	-	-	-	0.51	8.0	-	-
2	35	-	-	0.89	10.0	-	-	-	0.51	9.3	-	-
1	-	-	-	0.89	11.0	-	-	-	0.76	10.7	-	-
-	50	-	-	0.89	11.4	-	-	-	0.76	11.1	-	-
1/0	-	-	-	1.14	12.5	-	-	-	0.76	11.7	-	-
2/0	70	-	-	1.14	14.0	-	-	-	0.76	12.8	-	-
3/0	-	-	-	1.14	15.2	-	-	-	0.76	14.4	-	-
-	95	-	-	1.14	15.4	-	-	-	0.76	14.6	-	-
4/0	-	-	-	1.14	16.8	-	-	-	0.76	16.0	-	-
-	120	-	-	1.14	17.1	-	-	-	0.76	16.3	-	-
Conducting metal			BCDEFG			BCDEFG			BF			BCDEFG

### KEY

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silver-plated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring

AWM II A/B External or internal wiring

NS Not Specified

VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
Only the average thickness of insulation should be taken into account.

For this product, please contact:

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Style no.	1333-VW-1	10210	10126-VW-1	1644	1331	11945	10358							
Insulation	FEP	ETFE "Thin-wall"	ETFE "Thin-wall"	ETFE	FEP	ETFE "Thin-wall"	ETFE							
Approval	150 °C - 300 V		150 °C - 600 V		150 °C - 600 V		150 °C - 600 V		150 °C - 750 V		150 °C - 1000 V (cUL 600 V)			
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)		
AWG (mm <sup>2</sup> )	(mm)	(mm)												
30	0.05	0.33	0.25	0.8	0.31	1.3	0.51	1.3	-	-	0.51	1.3		
28	0.09	0.33	0.25	0.9	0.51	1.4	0.51	1.4	-	-	0.51	1.4		
26	0.13	0.33	0.25	1.05	0.51	1.5	0.51	1.5	-	-	0.51	1.5		
24	0.22	0.33	0.25	1.15	0.51	1.65	0.51	1.65	-	-	0.51	1.65		
22	0.34	0.33	0.25	1.3	0.51	1.8	0.51	1.8	-	-	0.51	1.8		
-	0.5	0.33	0.25	1.4	0.51	1.95	0.51	1.95	-	-	0.51	1.95		
20	0.6	0.33	0.25	1.5	0.51	2.0	0.51	2.0	-	-	0.51	2.0		
-	0.75	0.33	0.25	1.75	0.51	2.1	0.51	2.1	-	-	0.51	2.1		
18	0.93	0.33	0.25	1.9	0.51	2.25	0.51	2.25	-	-	0.51	2.25		
-	1	0.33	0.25	1.95	0.51	2.3	0.51	2.3	-	-	0.51	2.3		
16	1.34	0.33	0.25	2.2	0.51	2.5	0.51	2.5	-	-	0.51	2.5		
-	1.5	0.33	0.25	2.2	0.51	2.55	0.51	2.55	-	-	0.51	2.55		
14	-	0.33	0.25	2.55	0.51	2.85	0.51	2.85	-	-	0.51	2.85		
-	2.5	0.33	0.25	2.7	0.51	3.0	0.51	3.0	-	-	0.51	3.0		
12	-	0.33	0.25	3.1	0.51	3.25	0.51	3.3	-	-	0.51	3.3		
-	4	0.33	0.25	3.25	0.51	3.6	0.51	3.6	-	-	0.51	3.6		
10	-	0.33	0.25	3.7	0.51	4.1	0.51	4.1	-	-	0.51	4.1		
-	6	0.33	0.25	3.9	0.51	4.3	0.51	4.3	-	-	0.51	4.3		
8	-	-	-	0.64	5.4	0.76	5.6	0.76	5.4	-	-	0.76	5.4	
-	10	-	-	0.64	5.7	0.76	5.9	0.76	5.9	-	-	0.76	5.9	
6	-	-	-	0.64	6.6	0.76	6.8	0.76	6.8	-	-	0.76	6.8	
-	16	-	-	0.64	6.7	0.76	7.1	0.76	7.1	-	-	0.76	7.1	
4	-	-	-	0.64	7.8	0.76	8.0	0.76	8.0	-	-	0.76	8.0	
-	25	-	-	0.64	8.3	0.76	8.5	0.76	8.5	-	-	0.76	8.5	
2	35	-	-	-	0.89	10.0	0.76	9.6	0.76	9.6	-	-	0.76	9.6
1	-	-	-	-	0.89	11.0	1.14	11.2	1.14	11.2	-	-	1.14	11.2
-	50	-	-	-	0.89	11.4	1.14	12.0	1.14	12.0	-	-	1.14	12.0
1/0	-	-	-	-	1.14	12.5	1.14	12.5	1.14	12.5	-	-	1.14	12.5
2/0	70	-	-	-	1.14	14.0	1.14	14.6	1.14	14.0	-	-	1.14	14.0
3/0	-	-	-	-	1.14	15.2	1.14	15.2	1.14	15.2	-	-	1.14	15.2
-	95	-	-	-	1.14	15.4	1.14	15.4	1.14	15.4	-	-	1.14	15.4
4/0	-	-	-	-	1.14	16.8	1.14	16.8	1.14	16.8	-	-	1.14	16.8
-	120	-	-	-	1.14	17.1	1.14	17.1	1.14	17.1	-	-	1.14	17.1
Conducting metal	BCDEFG													

## KEY

- A W M I A Internal wiring, not subject to mechanical abuse
- B T i n - p l a t e d c o p p e r
- B\* T i n - p l a t e d c o p p e r (ø > 0.38 mm)
- C N i c k e l - p l a t e d c o p p e r
- D S i l v e r - p l a t e d c o p p e r
- E N i c k e l
- F B a r e c o p p e r
- F\* B a r e c o p p e r (ø > 0.38 mm)
- G N i c k e l - p l a t e d c o p p e r 27%

A W M I A Internal wiring, not subject to mechanical abuse  
 A W M I A / B Internal wiring  
 A W M I I A / B External or Internal wiring

N S Not Specified  
 V N S Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.

Only the average thickness of insulation should be taken into account.

For this product, please contact:

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# SILIFLON® 200°C

## Fluoropolymer insulation

### UL and cUL approval



## FLUOROPOLYMER INSULATED WIRES AND CABLES

2

1



1 • Bare, tin-plated, nickel-plated or silver-plated copper core.  
2 • Insulation: Fluorinated polymer.

## Approvals - standards

- UL approval as per standard UL 758 – File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 – File no.: E101965.
- “Horizontal flame test” as per UL approval.
  - “FT1 flame rating” as per cUL approval.
  - VW-1 approval.

### Characteristics

#### General

- Continuous operating temperatures: -90°C to +200°C.
- Excellent resistance to aggressive chemical environments.
  - Excellent resistance to humidity and UV.
  - Excellent mechanical strength.

#### Electrical

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

### Standard products

- All colours including translucent.
- Stranding of conducting cores: contact us.

### Applications

- Cabling for household electrical heating appliances, rotating machines, industrial machines, electronic equipment, rear computer panels, etc.

### Options

- Other nominal cross-sections: contact us.

Style no. Insulation Approval	10109 ETFE "Thin-wall"		10969 FEP		1900 FEP		1332 FEP "Thick-wall"		
	200°C - 300 V		200°C - 300 V		200°C - 300 V		200°C - 300 V		
Nominal cross-section	Avg (mm²)	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)	Nominal diameter*
AWG	(mm²)								
30	0.05	0.15	0.6	0.20	0.7	0.25	0.8	0.33	0.95
28	0.09	0.15	0.7	0.20	0.8	0.25	0.9	0.33	1.05
26	0.13	0.15	0.8	0.20	0.9	0.25	1.0	0.33	1.15
24	0.22	0.15	0.9	0.20	1.0	0.25	1.1	0.33	1.3
22	0.34	0.15	1.05	0.20	1.15	0.25	1.25	0.33	1.45
-	0.5	0.15	1.25	0.20	1.3	0.25	1.4	0.33	1.55
20	0.6	0.15	1.3	0.20	1.4	0.25	1.5	0.33	1.7
-	0.75	0.15	1.4	0.33	1.75	0.25	1.55	0.33	1.75
18	0.93	0.15	1.55	0.33	1.9	0.25	1.7	0.33	1.9
-	1	0.15	1.65	0.33	1.95	0.25	1.8	0.33	1.95
16	1.34	0.20	1.9	0.33	2.1	0.25	2.0	0.33	2.1
-	1.5	0.20	1.9	0.33	2.2	0.25	2.0	0.33	2.2
14	-	0.20	2.25	0.33	2.5	0.25	2.4	0.33	2.7
-	2.5	0.20	2.45	0.33	2.7	0.25	2.55	0.33	2.7
12	-	0.25	2.9	0.33	3.2	0.25	2.9	0.33	3.2
-	4	0.25	3.1	0.33	3.25	0.25	3.1	0.33	3.25
10	-	0.25	3.6	0.33	3.9	0.25	3.6	0.33	3.9
-	6	0.25	3.7	0.33	3.9	0.25	3.7	0.33	3.9
8	-	0.64	5.4	-	-	-	-	-	-
-	10	0.64	5.7	-	-	-	-	-	-
6	-	0.64	6.6	-	-	-	-	-	-
-	16	0.64	6.7	-	-	-	-	-	-
4	-	0.64	7.8	-	-	-	-	-	-
-	25	0.64	8.3	-	-	-	-	-	-
2	35	0.89	10.0	-	-	-	-	-	-
1	-	0.89	11.0	-	-	-	-	-	-
-	50	0.89	11.4	-	-	-	-	-	-
1/0	-	1.14	12.5	-	-	-	-	-	-
2/0	70	1.14	14.0	-	-	-	-	-	-
3/0	-	1.14	15.2	-	-	-	-	-	-
-	95	1.14	15.4	-	-	-	-	-	-
4/0	-	1.14	16.8	-	-	-	-	-	-
-	120	1.14	17.1	-	-	-	-	-	-
Conducting metal		B*CDEF*G		B*CDEF*G		B*CDEG		B*CDEF*G	

## KEY

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silver-plated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse

AWM I A/B Internal wiring

AWM II A/B External or Internal wiring

NS Not Specified

VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
Only the average thickness of insulation should be taken into account.

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Style no. Insulation		10086 ETFE "Thin-wall"		10588 FEP "Thin-wall"		1901 FEP		1330 FEP "Thick-wall"		1930 PFA "Thick-wall"		10203 FEP		10048 FEP "Thick-wall"			
Approval		200°C - 600 V		200°C - 600 V		200°C - 600 V		200°C - 600 V		200°C - 600 V		200°C - 1 000 V		200°C - 1 000 V			
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	
AWG	(mm <sup>2</sup> )																
30	0.05	0.25	0.8	0.23	0.75	0.36	1.0	0.51	1.3	0.51	1.3	0.51	1.3	0.51	1.3	0.64	1.6
28	0.09	0.25	0.9	0.23	0.85	0.36	1.1	0.51	1.4	0.51	1.4	0.51	1.4	0.51	1.4	0.64	1.7
26	0.13	0.25	1.0	0.23	0.95	0.36	1.2	0.51	1.5	0.51	1.5	0.51	1.5	0.51	1.5	0.64	1.8
24	0.22	0.25	1.1	0.23	1.05	0.36	1.35	0.51	1.65	0.51	1.65	0.51	1.65	0.51	1.65	0.64	1.9
22	0.34	0.25	1.25	0.23	1.2	0.36	1.5	0.51	1.85	0.51	1.8	0.51	1.8	0.51	1.8	0.64	2.05
-	0.5	0.25	1.4	0.23	1.35	0.36	1.65	0.51	1.95	0.51	1.95	0.51	1.95	0.51	1.95	0.64	2.2
20	0.6	0.25	1.5	0.23	1.45	0.36	1.7	0.51	2.0	0.51	2.0	0.51	2.0	0.51	2.0	0.64	2.3
-	0.75	0.25	1.55	0.23	1.5	0.36	1.8	0.51	2.1	0.51	2.1	0.51	2.1	0.51	2.1	0.64	2.4
18	0.93	0.25	1.7	0.23	1.65	0.36	2.0	0.51	2.25	0.51	2.25	0.51	2.25	0.51	2.25	0.64	2.55
-	1	0.25	1.8	0.23	1.75	0.36	2.0	0.51	2.3	0.51	2.3	0.51	2.3	0.51	2.3	0.64	2.6
16	1.34	0.25	2.0	0.23	1.95	0.36	2.2	0.51	2.5	0.51	2.5	0.51	2.5	0.51	2.5	0.64	2.8
-	1.5	0.25	2.0	0.23	1.95	0.36	2.3	0.51	2.55	0.51	2.55	0.51	2.55	0.51	2.55	0.64	2.85
14	-	0.25	2.4	0.23	2.35	0.36	2.7	0.51	3.0	0.51	3.0	0.51	3.0	0.51	3.0	0.64	3.2
-	2.5	0.25	2.55	0.23	2.5	0.36	2.75	0.51	3.0	0.51	3.0	0.51	3.0	0.51	3.0	0.64	3.3
12	-	0.38	3.2	0.23	2.9	0.36	3.1	0.51	3.4	0.51	3.4	0.51	3.4	0.51	3.4	0.64	3.6
-	4	0.38	3.35	0.23	3.1	0.36	3.3	0.51	3.6	0.51	3.6	0.51	3.6	0.51	3.6	0.64	3.9
10	-	0.38	3.8	0.23	3.5	0.36	3.8	0.51	4.0	0.51	4.0	0.51	4.0	0.51	4.0	0.64	4.3
-	6	0.38	4.0	-	-	0.36	4.0	0.51	4.3	0.51	4.3	0.51	4.3	0.51	4.3	0.64	4.5
8	-	0.64	5.4	-	-	0.51	5.2	0.76	5.3	0.76	5.6	0.76	5.6	0.76	5.6	-	-
-	10	0.64	5.7	-	-	0.51	5.4	0.76	5.9	0.76	5.9	0.76	5.9	0.76	5.9	-	-
6	-	0.64	6.6	-	-	0.51	6.3	0.76	6.8	0.76	6.8	0.76	6.8	0.76	6.8	-	-
-	16	0.64	6.7	-	-	0.51	6.6	0.76	7.1	0.76	7.1	0.76	7.1	0.76	7.1	-	-
4	-	0.64	7.8	-	-	0.51	7.4	0.76	8.0	0.76	8.0	0.76	8.0	0.76	8.0	-	-
-	25	0.64	8.3	-	-	0.51	8.0	0.76	8.5	0.76	8.5	0.76	8.5	0.76	8.5	-	-
2	35	0.89	10.0	-	-	0.51	9.3	0.76	9.2	0.76	9.2	0.76	9.2	0.76	9.2	-	-
1	-	0.89	11.0	-	-	0.76	10.7	1.14	11.2	1.14	11.2	1.14	11.2	1.14	11.2	-	-
-	50	0.89	11.4	-	-	0.76	11.1	1.14	12.0	1.14	12.0	1.14	12.0	1.14	12.0	-	-
1/0	-	1.14	12.5	-	-	0.76	11.7	1.14	12.5	1.14	12.5	1.14	12.5	1.14	12.5	-	-
2/0	70	1.14	14.0	-	-	0.76	12.8	1.14	14.0	1.14	14.0	1.14	14.0	1.14	14.0	-	-
3/0	-	1.14	15.2	-	-	0.76	14.4	1.14	15.2	1.14	15.2	1.14	15.2	1.14	15.2	-	-
-	95	1.14	15.4	-	-	0.76	14.6	1.14	15.4	1.14	15.4	1.14	15.4	1.14	15.4	-	-
4/0	-	1.14	16.8	-	-	0.76	16.0	1.14	16.8	1.14	16.8	1.14	16.8	1.14	16.8	-	-
-	120	1.14	17.1	-	-	0.76	16.3	1.14	17.1	1.14	17.1	1.14	17.1	1.14	17.1	-	-
Conducting metal	B*CDEF*G		B*CDEF*G		B*CDEF*G		B*CDEF*G		B*CDEF*G		B*CDEF*G		B*CDEF*G		B*CDEG		

## KEY

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silver-plated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse

AWM I A/B Internal wiring

AWM II A/B External or Internal wiring

NS Not Specified

VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core. Only the average thickness of insulation should be taken into account.

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# SILIFLON® 250°C

## Fluoropolymer insulation

### UL and cUL approval



#### Approvals - standards

- UL approval as per standard UL 758 –  
File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 –  
File no.: E101965.
- "Horizontal flame test" as per UL approval.
  - "FT1 flame rating" as per cUL approval.
  - VW-1 approval.

#### Characteristics

##### General

- Continuous operating temperatures: -90°C to +250°C.
- Excellent resistance to aggressive chemical environments.
  - Excellent resistance to humidity and UV.
  - Excellent mechanical strength.

##### Electrical

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

#### Standard products

- All colours including translucent.
- Stranding of conducting cores: contact us.

#### Applications

- Cabling for household electrical heating appliances, rotating machines, industrial machines, electronic equipment, rear computer panels, etc.

#### Options

- Other nominal cross-sections: contact us.

#### FLUOROPOLYMER INSULATED WIRES AND CABLES

2

1



1 • Bare, tin-plated, nickel-plated or silver-plated copper core.  
2 • Insulation: Fluorinated polymer.

Style no. Insulation Approval	1933 PFA "Thin-wall"			1882 PFA			10486 PFA		
	250°C - VNS			250°C - 150 V			250°C - 300 V		
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter*							
AWG (mm²)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	
30	0.05	0.15	0.6	0.25	0.8	0.23	0.75		
28	0.09	0.15	0.7	0.25	0.9	0.23	0.85		
26	0.13	0.15	0.8	0.25	1.0	0.23	0.95		
24	0.22	0.15	0.9	0.25	1.1	0.23	1.1		
22	0.34	0.15	1.05	0.25	1.25	0.23	1.2		
-	0.5	0.15	1.2	0.25	1.4	0.23	1.4		
20	0.6	0.15	1.3	0.25	1.5	0.23	1.5		
-	0.75	-	-	0.25	1.55	0.23	1.55		
18	0.93	-	-	0.25	1.8	0.23	1.75		
-	1	-	-	0.25	1.8	0.23	1.75		
16	1.34	-	-	0.25	2.0	0.23	2.0		
-	1.5	-	-	0.25	2.0	0.23	2.0		
14	-	-	-	-	-	0.23	2.3		
-	2.5	-	-	-	-	0.23	2.5		
12	-	-	-	-	-	0.23	2.8		
-	4	-	-	-	-	0.23	3.05		
10	-	-	-	-	-	0.23	3.6		
-	6	-	-	-	-	0.23	3.65		
8	-	-	-	-	-	0.51	5.2		
-	10	-	-	-	-	0.51	5.4		
6	-	-	-	-	-	0.51	6.3		
-	16	-	-	-	-	0.51	6.6		
4	-	-	-	-	-	0.76	8.0		
-	25	-	-	-	-	0.76	8.5		
2	35	-	-	-	-	0.76	9.6		
1	-	-	-	-	-	1.14	11.2		
-	50	-	-	-	-	1.14	12.0		
1/0	-	-	-	-	-	1.14	12.5		
2/0	70	-	-	-	-	1.14	14.0		
3/0	-	-	-	-	-	1.14	15.2		
-	95	-	-	-	-	1.14	15.4		
4/0	-	-	-	-	-	1.14	16.8		
-	120	-	-	-	-	1.14	17.1		
Conducting metal			CEG			CEG			

#### KEY

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silver-plated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/B External or Internal wiring

NS Not Specified  
VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
Only the average thickness of insulation should be taken into account.

For this product, please contact:

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LES CABLES DE L'EXTREME

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Style no. Insulation Approval		1726 PFA		10362 PFA "Thin-wall"		1727 PFA		10371 PFA "Thin-wall"	
		250°C - 300 V		250°C - 600 V		250°C - 600 V		250°C - 1000 V (cUL 600 V)	
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)	Nominal diameter*	
AWG	(mm <sup>2</sup> )	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	
30	0.05	0.33	0.95	0.25	0.8	0.51	1.3	0.51	1.3
28	0.09	0.33	1.05	0.25	0.9	0.51	1.4	0.51	1.4
26	0.13	0.33	1.15	0.25	1.0	0.51	1.5	0.51	1.5
24	0.22	0.33	1.3	0.25	1.1	0.51	1.65	0.51	1.65
22	0.34	0.33	1.45	0.25	1.25	0.51	1.8	0.51	1.8
-	0.5	0.33	1.6	0.25	1.4	0.51	1.95	0.51	1.95
20	0.6	0.33	1.65	0.25	1.5	0.51	2.0	0.51	2.0
-	0.75	0.33	1.75	0.25	1.55	0.51	2.1	0.51	2.1
18	0.93	0.33	1.9	0.25	1.8	0.51	2.2	0.51	2.2
-	1	0.33	1.95	0.25	1.8	0.51	2.3	0.51	2.3
16	1.34	0.33	2.2	0.25	2.0	0.51	2.45	0.51	2.45
-	1.5	0.33	2.2	0.25	2.0	0.51	2.65	0.51	2.55
14	-	0.33	2.6	0.25	2.4	0.51	2.85	0.51	2.8
-	2.5	0.33	2.7	0.25	2.55	0.51	3.0	0.51	3.0
12	-	0.33	3.2	0.25	2.9	0.51	3.4	0.51	3.4
-	4	0.33	3.25	0.25	3.1	0.51	3.6	0.51	3.6
10	-	0.33	3.9	0.25	3.6	0.51	4.2	0.51	4.2
-	6	0.33	3.9	0.25	3.7	0.51	4.3	0.51	4.3
8	-	0.51	5.2	0.76	5.8	0.76	5.7	0.76	5.7
-	10	0.51	5.4	0.76	5.9	0.76	5.9	0.76	5.9
6	-	0.51	6.3	0.76	6.8	0.76	6.8	0.76	6.8
-	16	0.51	6.6	0.76	7.1	0.76	7.1	0.76	7.1
4	-	0.76	8.0	0.76	8.0	0.76	8.0	0.76	8.0
-	25	0.76	8.5	0.76	8.5	0.76	8.5	0.76	8.5
2	35	0.76	9.6	0.76	9.6	0.76	9.6	0.76	9.6
1	-	1.14	11.2	1.14	11.2	1.14	11.2	1.14	11.2
-	50	1.14	12.0	1.14	12.0	1.14	12.0	1.14	12.0
1/0	-	1.14	12.5	1.14	12.5	1.14	12.5	1.14	12.5
2/0	70	1.14	14.0	1.14	14.0	1.14	14.0	1.14	14.0
3/0	-	1.14	15.2	1.14	15.2	1.14	15.2	1.14	15.2
-	95	1.14	15.4	1.14	15.4	1.14	15.4	1.14	15.4
4/0	-	1.14	16.8	1.14	16.8	1.14	16.8	1.14	16.8
-	120	1.14	17.1	1.14	17.1	1.14	17.1	1.14	17.1
Conducting metal		CEG		CEG		CEG		CEG	

## KEY

Conducting metals  
 B Tin-plated copper  
 B\* Tin-plated copper ( $\varnothing > 0.38$  mm)  
 C Nickel-plated copper  
 D Silver-plated copper  
 E Nickel  
 F Bare copper  
 F\* Bare copper ( $\varnothing > 0.38$  mm)  
 G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
 AWM I A/B Internal wiring  
 AWM II A/B External or Internal wiring

NS Not Specified  
 VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
 Only the average thickness of insulation should be taken into account.

For this product, please contact:

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**omerin**  
 LES CABLES DE L'EXTREME

# SILIFLON® KZ 04

**-55 °C to +200 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Concentric silver-plated copper core.  
2 • Insulation: PTFE tape(s).

### Approvals - standards

- Inspired from NF C 93-523 standard.

### Applications

- Wires used in aeronautical and electronic applications and all instrumentation uses requiring excellent resistance to high temperatures and to chemical influences.

### Options

- Compliance with the American standard ANSI NEMA HP3: contact us.

### Characteristics

#### General

- Continuous operating temperatures: -55 °C to +200 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity.
- Excellent resistance to hydrocarbons and fluids.

#### Electrical (as per UTE C 93-523)

- Rated voltage: 250 Vac – 350 Vdc.
- Test voltage: 2500 V.

### Standard products

- Standard insulation colours: all solid colours.

### KZ 04

CONCENTRIC CORE			INSULATED WIRE		
Nominal cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)	
32	0.035	7 x 0.08	546	0.53	0.7
30	0.055	7 x 0.10	349	0.61	1.0
28	0.093	7 x 0.13	201	0.68	1.4
26	0.14	7 x 0.16	132	0.79	2.0
24	0.22	7 x 0.20	86	0.91	2.8
22	0.34	7 x 0.25	54.4	1.06	4.1
20	0.60	19 x 0.20	31.3	1.35	7.3

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# SILIFLON® KZ 05

**-55 °C to +200 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Concentric silver-plated copper core.  
2 • Insulation: PTFE tape(s).

## Approvals - standards

- Inspired from NF C 93-523 standard.

## Applications

- Wires used in aeronautical and electronic applications and all instrumentation uses requiring excellent resistance to high temperatures and to chemical influences.

## Options

- Compliance with the American standard ANSI NEMA HP3: contact us.

## Characteristics

### General

- Continuous operating temperatures: -55 °C to +200 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity.
- Excellent resistance to hydrocarbons and fluids.

### Electrical (as per UTE C 93-523)

- Rated voltage: 600 Vac – 850 Vdc.
- Test voltage: 3400 V.

## Standard products

- Standard insulation colours: all solid colours.

## KZ 05

CONCENTRIC CORE				INSULATED WIRE	
Nominal cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)		Nominal diameter (mm)	Approximate linear weight (kg/km)
32	0.035	7 x 0.08	546	0.73	1.3
30	0.055	7 x 0.10	349	0.81	1.5
28	0.093	7 x 0.13	201	0.90	2.0
26	0.14	7 x 0.16	132	1.00	2.6
24	0.22	7 x 0.20	86	1.13	3.6
22	0.34	7 x 0.25	54.4	1.27	5.0
20	0.60	19 x 0.20	31.3	1.52	7.8
18	0.93	19 x 0.25	20.5	1.80	11.6
16	1.34	19 x 0.30	13.9	2.10	16.5
14	1.91	27 x 0.30*	10	2.48	22.3
12	3.18	45 x 0.30*	6	3.06	35.7

\* Non-concentric cores.

For this product, please contact:

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LES CABLES DE L'EXTREME

# SILIFLON® KZ 06

**-55 °C to +200 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Concentric silver-plated copper core.  
2 • Insulation: PTFE tape(s).

### Approvals - standards

- Inspired from NF C 93-523 standard.

### Applications

- Wires used in aeronautical and electronic applications and all instrumentation uses requiring excellent resistance to high temperatures and to chemical influences.

### Options

- Compliance with the American standard ANSI NEMA HP3: contact us.

### Characteristics

#### General

- Continuous operating temperatures: -55 °C to +200 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity.
- Excellent resistance to hydrocarbons and fluids.

#### Electrical (as per UTE C 93-523)

- Rated voltage: 1000 Vac – 1400 Vdc.
- Test voltage: 5000 V.

### Standard products

- Standard insulation colours: all solid colours.

### KZ 06

CONCENTRIC CORE				INSULATED WIRE	
Nominal cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)		Nominal diameter (mm)	Approximate linear weight (kg/km)
32	0.035	7 x 0.08	546	0.99	2.3
30	0.055	7 x 0.10	349	1.05	2.5
28	0.093	7 x 0.13	201	1.14	3.0
26	0.14	7 x 0.16	132	1.24	3.7
24	0.22	7 x 0.20	86	1.37	4.7
22	0.34	7 x 0.25	54.4	1.53	6.2
20	0.60	19 x 0.20	31.3	1.76	9.1
18	0.93	19 x 0.25	20.5	2.05	12.6
16	1.34	19 x 0.30	13.9	2.25	17.1
14	1.91	27 x 0.30*	10	2.70	25.3
12	3.18	45 x 0.30*	6	3.35	38.7

\* Non-concentric cores.

For this product, please contact:

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**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® KZ 07

**-55 °C to +260 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Concentric nickel-plated copper core.  
2 • Insulation: PTFE tape(s).

## Approvals - standards

- Inspired from NF C 93-523 standard.

## Applications

- Wires used in aeronautical and electronic applications and all instrumentation uses requiring excellent resistance to high temperatures and to chemical influences.

## Options

- Compliance with the American standard ANSI NEMA HP3: contact us.

## Characteristics

### General

- Continuous operating temperatures: -55 °C to +260 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity.
- Excellent resistance to hydrocarbons and fluids.

### Electrical (as per UTE C 93-523)

- Rated voltage: 250 Vac – 350 Vdc.
- Test voltage: 2500 V.

## Standard products

- Standard insulation colours: all solid colours.

## KZ 07

CONCENTRIC CORE			INSULATED WIRE		
Nominal cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)	
32	0.035	7 x 0.08	612	0.53	0.7
30	0.055	7 x 0.10	391	0.61	1.0
28	0.093	7 x 0.13	225	0.68	1.4
26	0.14	7 x 0.16	148	0.79	2.0
24	0.22	7 x 0.20	96.5	0.91	2.8
22	0.34	7 x 0.25	60.8	1.06	4.1
20	0.60	19 x 0.20	35	1.35	7.3

For this product, please contact:

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LES CABLES DE L'EXTREME

# SILIFLON® KZ 08

**-55 °C to +260 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Concentric nickel-plated copper core.  
2 • Insulation: PTFE tape(s).

### Approvals - standards

- Inspired from NF C 93-523 standard.

### Applications

- Wires used in aeronautical and electronic applications and all instrumentation uses requiring excellent resistance to high temperatures and to chemical influences.

### Options

- Compliance with the American standard ANSI NEMA HP3: contact us.

### Characteristics

#### General

- Continuous operating temperatures: -55 °C to +260 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity.
- Excellent resistance to hydrocarbons and fluids.

#### Electrical (as per UTE C 93-523)

- Rated voltage: 600 Vac – 850 Vdc.
- Test voltage: 3400 V.

### Standard products

- Standard insulation colours: all solid colours.

### KZ 08

CONCENTRIC CORE				INSULATED WIRE	
Nominal cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)		Nominal diameter (mm)	Approximate linear weight (kg/km)
32	0.035	7 x 0.08	612	0.73	1.3
30	0.055	7 x 0.10	391	0.81	1.5
28	0.093	7 x 0.13	225	0.90	2.0
26	0.14	7 x 0.16	148	1.00	2.6
24	0.22	7 x 0.20	96.5	1.13	3.6
22	0.34	7 x 0.25	60.8	1.27	5.0
20	0.60	19 x 0.20	35	1.52	7.8
18	0.93	19 x 0.25	23	1.80	11.6
16	1.34	19 x 0.30	15.6	2.10	16.5
14	1.91	27 x 0.30*	11.2	2.48	22.3
12	3.18	45 x 0.30*	6.7	3.06	35.7

\* Non-concentric cores.

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**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® KZ 09

**-55 °C to +260 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



1 • Concentric nickel-plated copper core.  
2 • Insulation: PTFE tape(s).

### Approvals - standards

- Inspired from NF C 93-523 standard.

### Applications

- Wires used in aeronautical and electronic applications and all instrumentation uses requiring excellent resistance to high temperatures and to chemical influences.

### Options

- Compliance with the American standard ANSI NEMA HP3: contact us.

### Characteristics

#### General

- Continuous operating temperatures: -55 °C to +260 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity.
- Excellent resistance to hydrocarbons and fluids.

#### Electrical (as per UTE C 93-523)

- Rated voltage: 1000 Vac – 1400 Vdc.
- Test voltage: 5000 V.

### Standard products

- Standard insulation colours: all solid colours.

### KZ 09

CONCENTRIC CORE				INSULATED WIRE	
Nominal cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)		Nominal diameter (mm)	Approximate linear weight (kg/km)
32	0.035	7 x 0.08	612	0.99	2.3
30	0.055	7 x 0.10	391	1.05	2.5
28	0.093	7 x 0.13	225	1.14	3.0
26	0.14	7 x 0.16	148	1.24	3.7
24	0.22	7 x 0.20	96.5	1.37	4.7
22	0.34	7 x 0.25	60.8	1.53	6.2
20	0.60	19 x 0.20	35	1.76	9.1
18	0.93	19 x 0.25	23	2.05	12.6
16	1.34	19 x 0.30	15.6	2.25	17.1
14	1.91	27 x 0.30*	11.2	2.70	25.3
12	3.18	45 x 0.30*	6.7	3.35	38.7

\* Non-concentric cores.

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**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® CN5YS and A5YS

VDE approval  
-90 °C to +250 °C

## Approvals - standards

- VDE approval as per standard DIN VDE 0250  
Part 106 - Licence no. 40005809.



## Applications

- Cabling in household electrical appliances, electronics.
  - Lighting, lights
- Cabling in hot or very cold environments (cryogenics).
  - Cabling in aggressive environments (humidity, chemicals, etc.).
  - Cabling requiring compact size and excellent mechanical strength.

## Options

- Other colours: contact us.
- Other cores available:

Rigid nickel-plated (ref. RCN5YS)  
or rigid silver-plated (ref. RA5YS) copper core  
- class 1 as per IEC 60228 / DIN VDE 0295.

## Characteristics

### General

- Continuous operating temperatures:
  - > Silver-plated copper core: -90 °C to +200 °C.
  - > Nickel-plated copper core: -90 °C to +250 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity.
- Excellent resistance to hydrocarbons and fluids.

### Electrical

- Rated voltage: 300/500 V.
- Test voltage: 2000 V.

## Standard products

- Standard insulation colour: white.

## CN5YS and A5YS

### Flexible core • class 5 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.25*	19 x 0.13	89.3	0.30	1.25	4.3
0.5	16 x 0.20	40.1	0.30	1.55	7.1
0.75	24 x 0.20	26.7	0.30	1.8	10.6
1	32 x 0.20	20.0	0.30	1.9	13.2
1.5	30 x 0.25	13.7	0.30	2.2	16.6
2.5	50 x 0.25	8.21	0.35	2.8	26.7
4	56 x 0.30	5.09	0.40	3.3	41.6
6	84 x 0.30	3.39	0.40	3.9	60.5

\* Nominal cross-section not described in IEC 60228.

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## FLUOROPOLYMER INSULATED WIRES AND CABLES

2 2 1



- 1 • Flexible nickel-plated (ref. CN5YS) or silver-plated (ref. A5YS) copper core - class 5 as per IEC 60228 / DIN VDE 0295.
- 2 • Insulation: Crossed and heat-sealed PTFE tapes.

**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® Style 10506

## PTFE insulation

### UL and cUL approval

### -90 °C to +250 °C

#### Approvals - standards

- Nickel-plated copper complying with the 2% class as per standard ASTM B355.
- UL approval as per standard UL 758 – File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 – File no.: E101965.
- "Horizontal flame test" as per UL approval.
- "FT1 flame rating" as per cUL approval.



#### Applications

- Internal cabling for electrical or electronic appliances.

#### Options

- Pure nickel core: contact us.
- 27% nickel-plated copper core: contact us.
- Other nominal cross-sections: contact us.
  - Other nominal stranding: contact us.
  - Other style no. available: style 10487 with PTFE tape + glass tape(s) based insulation.

#### Style 10506

MULTISTRAND CORE			INSULATED WIRE		
Nominal cross-section AWG	Nominal stranding*		Nominal thickness of insulation (mm)	Nominal diameter** (mm)	Approximate linear weight (kg/km)
30	0.05	7 x 0.10	0.15	0.66	1.1
28	0.09	7 x 0.13	0.15	0.76	1.6
26	0.14	7 x 0.16	0.15	0.86	2.1
24	0.22	7 x 0.20	0.15	0.99	3.0
22	0.34	7 x 0.25	0.15	1.16	4.4
-	0.5	7 x 0.30	0.15	1.30	6.1
20	0.6	19 x 0.20	0.15	1.38	7.0
-	0.75	24 x 0.20	0.15	1.51	8.7
18	0.93	19 x 0.25	0.18	1.70	10.9
-	1	32 x 0.20	0.18	1.76	11.7
16	1.34	19 x 0.30	0.18	1.96	15.1
-	1.5	30 x 0.25	0.18	2.05	16.5
14	-	29 x 0.30	0.18	2.33	22.3
-	2.5	50 x 0.25	0.18	2.53	26.5
12	-	46 x 0.30	0.18	2.98	34.9
-	4	56 x 0.30	0.18	3.25	42.1

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\* The most common nominal stranding. Some stranding is not available in all types of conductor metals.  
Other stranding can be produced taking into account the possibilities permitted by standard UL 758 and/or IEC 60228.

\*\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
Only the average thickness of insulation should be taken into account.

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#### FLUOROPOLYMER INSULATED WIRES AND CABLES

2

2

1



1 • Multistrand nickel-plated copper core.

2 • Insulation: PTFE tape(s).

#### Characteristics

##### General

- Continuous operating temperatures: -90 °C to +250 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

##### Electrical

- Rated voltage: 600 V.
- Test voltage: 2000 V.

#### Standard products

- Standard insulation colours: all solid colours.

**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**SILIFLON® HT**  
*Ignition wires*  
**-90 °C to +260 °C**

**FLUOROPOLYMER INSULATED WIRES AND CABLES**



1 • Bare, tin-plated, nickel-plated or silver-plated copper core.  
2 • Insulation: Fluorinated polymer.

**Applications**

- Ignition circuit, creation of an electric arc for piezo-electric system of household electric appliances, burners, etc.

**Options**

- Pure nickel core: contact us.
  - Outer electrical shielding:  
> Tin-plated copper braid: contact us.
- Other nominal cross-sections: contact us.
  - Other nominal stranding: contact us.  
• Other colours: contact us.

**Characteristics**

**General**

- Continuous operating temperatures:  
> ETFE insulation: -90 °C to +155 °C.  
> FEP insulation: -90 °C to +205 °C.  
> MFA insulation: -90 °C to +250 °C.  
> PFA insulation: -90 °C to +260 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

**Electrical**

- Pulse voltage: from 12 to 30 kV.

**Standard products**

- Main products: see table below.
- Standard insulation colours: translucent or white.

Core	Insulation ETFE	Insulation FEP	Insulation MFA	Insulation PFA
In bare copper	ETFE-HT	FEP-HT	MFA-HT	PFA-HT
In tin-plated copper	EETFE-HT	EFEP-HT	EMFA-HT	EPFA-HT
In silver-plated copper	AETFE-HT	AFEP-HT	AMFA-HT	APFA-HT
In nickel-plated copper	CNETFE-HT	CNFEP-HT	CNMA-HT	CNPFA-HT

**INSULATED WIRE – Voltage\***

CONDUCTING CORE			12 KV		15 KV		20 KV		25 KV		30 KV	
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (tin-plated copper core)	Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.22	7 x 0.20	92.5	1.4	4.7	1.5	5.2	1.7	6.3	1.8	6.8	2.0	8.1
0.34	7 x 0.25	59.2	1.6	6.5	1.7	7.0	1.8	7.6	2.0	8.9	2.2	10.3
0.5	16 x 0.20	40.1	1.7	8.1	1.8	8.7	1.9	9.3	2.1	10.7	2.3	12.2
0.6	19 x 0.20	33.7	1.8	9.3	1.9	9.9	2.0	10.6	2.2	12.0	2.4	13.6
0.75	24 x 0.20	26.7	1.9	10.9	2.0	11.6	2.1	12.3	2.3	13.8	2.5	15.4
0.93	19 x 0.25	21.6	2.0	12.8	2.1	13.5	2.3	14.9	2.4	15.7	2.6	17.4
1	32 x 0.20	20.0	2.1	13.9	2.2	14.6	2.3	15.4	2.5	17.0	2.7	18.8
1.34	19 x 0.30	15.0	2.3	17.6	2.4	18.4	2.5	19.2	2.7	21.0	2.8	21.9
1.5	30 x 0.25	13.7	2.4	19.2	2.4	19.2	2.6	20.9	2.7	21.8	2.9	23.6
2.5	50 x 0.25	8.21	2.8	29.0	2.9	29.9	3.0	30.9	3.2	33.0	3.3	34.1

For this product, please contact:

\* Pulse voltage.

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LES CABLES DE L'EXTREME

**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**FLUOROPOLYMER INSULATED WIRES AND CABLES**

**SILIFLON® HT**  
*Ignition wires*  
**UL and cUL approval**



**Approvals - standards**

- UL approval as per standard UL 758 – File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 – File no.: E101965.
- "Horizontal flame test" as per UL approval.
- "FT1 flame rating" as per cUL approval.

**Applications**

- Ignition circuit, creation of an electric arc for piezoelectric system of household electric appliances, burners, etc.

**Options**

- Pure nickel core: contact us.
- 27% nickel-plated copper core: contact us.
- Other nominal cross-sections: contact us.

**Characteristics**

**General**

- Continuous operating temperatures: -90 °C to +250 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

**Electrical**

- Pulse voltage: as per style no. except style 1813.

**Standard products**

- All colours including translucent.
- Stranding of conducting cores: contact us.

Style no.	10185-E150	1911-F150	1813	10185-E200	1911-F250
Approval	150 °C - 10 KV AC** (cUL 600 V)	150 °C - 20 KV DC** (cUL 1000 V)	200 °C - 3000 V (cUL 1000 V)	200 °C - 10 KV AC** (cUL 150°C - 600 V)	250 °C - 20 KV DC**
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)	Nominal diameter*	Average thickness of insulation (mm)
AWG (mm <sup>2</sup> )	(mm)	(mm)	(mm)	(mm)	(mm)
30 0.05	-	-	-	-	-
28 0.09	-	-	-	-	-
26 0.13	-	-	-	-	-
24 0.22	0.36	1.4	0.48	1.6	0.61
22 0.34	0.36	1.5	0.48	1.75	0.61
- 0.5	0.36	1.65	0.48	1.9	0.61
20 0.6	0.36	1.7	0.48	2.0	0.61
- 0.75	0.36	1.85	0.48	2.1	0.61
18 0.93	0.36	2.0	0.48	2.2	0.61
- 1	0.36	2.05	0.48	2.25	0.61
16 1.34	0.36	2.2	0.48	2.5	0.61
- 1.5	0.36	2.3	0.48	2.55	0.61
14 -	0.36	2.6	0.48	2.9	0.61
- 2.5	0.36	2.8	0.48	3.0	0.61
12 -	0.36	3.1	0.48	3.35	0.61
- 4	0.36	3.4	0.48	3.6	0.61
10 -	0.36	3.8	0.48	4.0	0.61
- 6	0.36	3.9	0.48	4.2	0.61
Conducting metal	BCDEFG	BCDEFG	B*CDEFG	B*CDEF*G	CEG

**KEY**

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silver-plated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/B External or Internal wiring

NS Not Specified  
VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
Only the average thickness of insulation should be taken into account.

\*\* Pulse voltage.

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**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® M6-E6

**-90 °C to +205 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



- 1 • Flexible tin-plated copper core – class 5 as per IEC 60228.
- 2 • Insulation: Fluorinated polymer FEP.
- 3 • Outer sheath: Fluorinated polymer FEP.

### Applications

- Cabling in household electrical appliances, electronics.
- Cabling in hot or cold environments (cryogenics).
  - Cabling in aggressive environments (humidity, chemicals, etc.).
  - Cabling requiring compact size and excellent mechanical strength.
- Cabling of thermoresistant detectors type PT 100.

### Options

- Bare copper core: ref. M6-6.
- Silver-plated copper core: ref. M6-A6.
- Nickel-plated copper core: ref. M6-CN6.
- Pure nickel core (not described in IEC 60228): ref. M6-N6.
  - PFA fluorinated polymer insulation and sheathing for continuous operating temperatures up to +260°C: ref. M5-E5.
  - ETFE fluorinated polymer insulation and sheathing for continuous operating temperatures up to +155 °C: ref. M7-E7.
  - Other nominal metric or American cross-sections: contact us.
- Other numbers of conductors: contact us.
  - Other nominal stranding: contact us.
  - Other colours: contact us.
- Other options and/or combinations of the options outlined above: contact us.

### Characteristics

#### General

- Continuous operating temperatures: -90°C to +205 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

#### Electrical

- Rated voltage: 300/500 V.
- Test voltage: 2000 V.

### Standard products

- Standard conductor colours: all solid colours including yellow/green.
- Standard outer sheath colours: grey, white or black.

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Flexible core • class 5 as per IEC 60228			INSULATED CONDUCTORS		SHEATHED CABLE	
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
2 x 0.5	16 x 0.20	40.1	0.20	1.3	3.1	17.0
3 x 0.5	16 x 0.20	40.1	0.20	1.3	3.3	23.3
4 x 0.5	16 x 0.20	40.1	0.20	1.3	3.6	29.6
5 x 0.5	16 x 0.20	40.1	0.20	1.3	4.1	38.0
7 x 0.5	16 x 0.20	40.1	0.20	1.3	4.5	51.1
2 x 0.75	24 x 0.20	26.7	0.20	1.45	3.4	22.1
3 x 0.75	24 x 0.20	26.7	0.20	1.45	3.6	30.5
4 x 0.75	24 x 0.20	26.7	0.20	1.45	4.0	39.9
5 x 0.75	24 x 0.20	26.7	0.20	1.45	4.6	51.8
7 x 0.75	24 x 0.20	26.7	0.20	1.45	5.0	69.0
2 x 1	32 x 0.20	20.0	0.20	1.7	3.9	28.8
3 x 1	32 x 0.20	20.0	0.20	1.7	4.2	41.0
4 x 1	32 x 0.20	20.0	0.20	1.7	4.6	52.7
5 x 1	32 x 0.20	20.0	0.20	1.7	5.3	68.5
7 x 1	32 x 0.20	20.0	0.20	1.7	5.7	90.2
2 x 1.5	30 x 0.25	13.7	0.20	1.95	4.4	38.7
3 x 1.5	30 x 0.25	13.7	0.20	1.95	4.7	54.9
4 x 1.5	30 x 0.25	13.7	0.20	1.95	5.3	73.6
5 x 1.5	30 x 0.25	13.7	0.20	1.95	5.9	91.3
7 x 1.5	30 x 0.25	13.7	0.20	1.95	6.6	127
2 x 2.5	50 x 0.25	8.21	0.20	2.5	5.6	63.3
3 x 2.5	50 x 0.25	8.21	0.20	2.5	6.2	94.5
4 x 2.5	50 x 0.25	8.21	0.20	2.5	6.8	122
5 x 2.5	50 x 0.25	8.21	0.20	2.5	7.6	152
7 x 2.5	50 x 0.25	8.21	0.20	2.5	8.4	208
2 x 4	56 x 0.30	5.09	0.25	3.1	7.2	102
3 x 4	56 x 0.30	5.09	0.25	3.1	7.9	149
4 x 4	56 x 0.30	5.09	0.25	3.1	8.7	192
5 x 4	56 x 0.30	5.09	0.25	3.1	9.6	235
7 x 4	56 x 0.30	5.09	0.25	3.1	10.9	333
2 x 6	84 x 0.30	3.39	0.35	3.9	9.0	162
3 x 6	84 x 0.30	3.39	0.35	3.9	9.6	228
4 x 6	84 x 0.30	3.39	0.35	3.9	10.8	303
5 x 6	84 x 0.30	3.39	0.35	3.9	12.1	380
7 x 6	84 x 0.30	3.39	0.35	3.9	13.7	532

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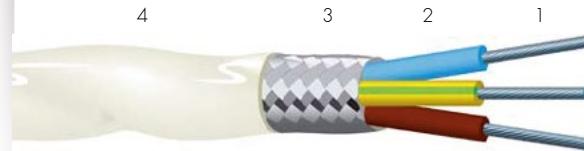
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**omerin**  
LES CABLES DE L'EXTREME

# SILIFLON® M6BE-E6

**-90 °C to +205 °C**

## FLUOROPOLYMER INSULATED WIRES AND CABLES



- 1 • Flexible tin-plated copper core – class 5 as per IEC 60228.
- 2 • Insulation: Fluorinated polymer FEP.
- 3 • Electrical shielding: Tin-plated copper braid.
- 4 • Outer sheath: Fluorinated polymer FEP.

**Applications**

- Cabling for electrical heating appliances.
  - Use in the medical field as cabling for sterilisable surgical instruments.
  - All power cords requiring resistance to alternate bendings.
- Cabling of thermoresistant detectors type PT 100.

**Options**

- Bare copper core: contact us.
- Silver-plated copper core: contact us.
- Nickel-plated copper core: contact us.
- Pure nickel core (not described in IEC 60228): contact us.
- Electrical shielding made of an aluminium tape + continuity wire (ref. M6BAL-E6): contact us.
  - PFA fluorinated polymer insulation and sheathing for continuous operating temperatures up to +260°C: ref. M5BE-E5.
  - ETFE fluorinated polymer insulation and sheathing for continuous operating temperatures up to +155 °C: ref. M7BE-E7.
  - Other nominal metric or American cross-sections: contact us.
- Other numbers of conductors: contact us.
  - Other nominal stranding: contact us.
    - Other colours: contact us.
  - Other options and/or combinations of the options outlined above: contact us.

**Characteristics**  
**General**

- Continuous operating temperatures: -90 °C to +205 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

**Electrical**

- Rated voltage: 300/500 V.
- Test voltage: 2000 V.

**Standard products**

- Standard conductor colours: all solid colours including yellow/green.
- Standard outer sheath colours: grey, white or black.

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LES CABLES DE L'EXTREME

Flexible core • class 5 as per IEC 60228			INSULATED CONDUCTORS		SHEATHED CABLE	
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
2 x 0.5	16 x 0.20	40.1	0.20	1.3	3.6	30.0
3 x 0.5	16 x 0.20	40.1	0.20	1.3	3.8	37.3
4 x 0.5	16 x 0.20	40.1	0.20	1.3	4.1	45.0
5 x 0.5	16 x 0.20	40.1	0.20	1.3	4.6	55.2
7 x 0.5	16 x 0.20	40.1	0.20	1.3	4.9	68.3
2 x 0.75	24 x 0.20	26.7	0.20	1.45	3.8	35.2
3 x 0.75	24 x 0.20	26.7	0.20	1.45	4.0	44.4
4 x 0.75	24 x 0.20	26.7	0.20	1.45	4.5	56.9
5 x 0.75	24 x 0.20	26.7	0.20	1.45	5.0	69.1
7 x 0.75	24 x 0.20	26.7	0.20	1.45	5.6	95.6
2 x 1	32 x 0.20	20.0	0.20	1.7	4.6	48.4
3 x 1	32 x 0.20	20.0	0.20	1.7	4.8	60.4
4 x 1	32 x 0.20	20.0	0.20	1.7	5.1	72.3
5 x 1	32 x 0.20	20.0	0.20	1.7	5.6	90.7
7 x 1	32 x 0.20	20.0	0.20	1.7	6.4	123
2 x 1.5	30 x 0.25	13.7	0.20	1.95	4.8	55.8
3 x 1.5	30 x 0.25	13.7	0.20	1.95	5.4	78.5
4 x 1.5	30 x 0.25	13.7	0.20	1.95	6.2	108
5 x 1.5	30 x 0.25	13.7	0.20	1.95	6.8	130
7 x 1.5	30 x 0.25	13.7	0.20	1.95	7.6	172
2 x 2.5	50 x 0.25	8.21	0.20	2.5	6.4	97.6
3 x 2.5	50 x 0.25	8.21	0.20	2.5	6.8	127
4 x 2.5	50 x 0.25	8.21	0.20	2.5	7.5	160
5 x 2.5	50 x 0.25	8.21	0.20	2.5	8.5	201
7 x 2.5	50 x 0.25	8.21	0.20	2.5	9.2	259
2 x 4	56 x 0.30	5.09	0.25	3.1	7.7	138
3 x 4	56 x 0.30	5.09	0.25	3.1	8.4	187
4 x 4	56 x 0.30	5.09	0.25	3.1	9.3	238
5 x 4	56 x 0.30	5.09	0.25	3.1	10.1	282
7 x 4	56 x 0.30	5.09	0.25	3.1	11.5	394
2 x 6	84 x 0.30	3.39	0.35	3.9	9.5	205
3 x 6	84 x 0.30	3.39	0.35	3.9	10.1	275
4 x 6	84 x 0.30	3.39	0.35	3.9	11.5	363
5 x 6	84 x 0.30	3.39	0.35	3.9	13.1	466
7 x 6	84 x 0.30	3.39	0.35	3.9	14.3	608

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LES CABLES DE L'EXTREME

# SILIFLON® KU 03, KU 04 KU 05 and KU 06 -55 °C to +150 °C

## Approvals - standards

- Inspired from NF C 93-524 standard.

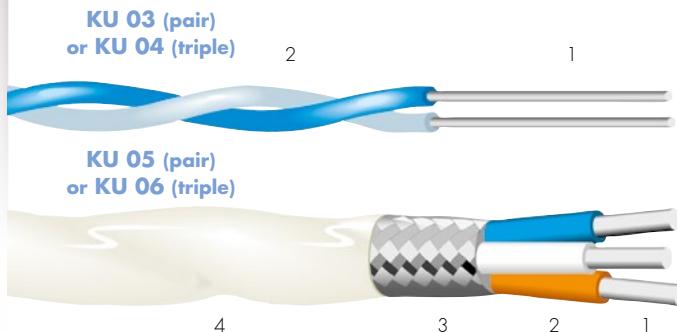
## Applications

- Wires used in aeronautical, electronic and all instrumentation applications requiring high resistance to high temperatures and to chemical influences.

## Options

- Other colours: contact us.

## FLUOROPOLYMER INSULATED WIRES AND CABLES



- Concentric tin-plated copper core.
- Insulation: Fluorinated polymer ETFE.
- Electrical shielding: Tin-plated copper braid.
- Outer sheath: Fluorinated polymer ETFE.

## Characteristics

### General

- Continuous operating temperatures: -55 °C to +150 °C.
- Excellent resistance to aggressive chemical environments.
- Excellent resistance to humidity and UV.
- Excellent mechanical strength.

### Electrical (as per UTE C 93-524)

- Rated voltage: 600 Vac – 850 Vdc.
- Test voltage: KU 03 and KU 04: 3400 Vac.  
KU 05 and KU 06: 1500 Vac.

## Standard products

- Standard conductor colours of the pair: white and blue.
- Standard conductor colours of the triple: white, blue and orange.
- Standard outer sheath colour: white.

## CONDUCTORS (TYPE KU 01)

CONDUCTORS (TYPE KU 01)				KU 03		KU 04		KU 05		KU 06	
Nominal cross-section	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal diameter (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)	Nominal diameter (mm)	Approximate linear weight (kg/km)
AWG (mm²)											
30	0.05	7 x 0.10	365.4	0.63	1.26	1.8	1.36	2.7	2.10	8.7	2.31
28	0.09	7 x 0.13	208.0	0.69	1.38	2.6	1.48	3.9	2.22	9.8	2.43
26	0.15	19 x 0.10	128.7	0.81	1.62	3.8	1.74	5.8	2.47	11.8	2.68
24	0.25	19 x 0.13	76.6	0.91	1.82	5.7	1.96	8.5	2.76	15.0	2.89
22	0.38	19 x 0.16	50.3	1.10	2.20	8.5	2.37	12.7	3.14	21.0	3.30
20	0.60	19 x 0.20	32.1	1.52	3.04	13.9	3.27	20.9	3.97	30.4	4.22
18	0.93	19 x 0.25	20.6	1.80	3.60	21.2	3.87	31.8	4.54	42.5	4.82
16	1.34	19 x 0.30	14.3	2.00	4.00	29.1	4.30	43.6	4.94	52.4	5.24
14	1.82	37 x 0.25	10.6	2.36	4.72	39.4	5.08	59.1	5.72	67.7	6.09
12	3.00	37 x 0.32	6.5	2.89	5.78	72.9	6.22	109	6.78	114	7.24

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LES CABLES DE L'EXTREME



# SILIFLON® 200 °C

## Fluoropolymer insulation Fluoropolymer sheathing UL and cUL approval



### Characteristics

#### General

- Continuous operating temperatures: -90 °C to +200 °C.
- Excellent resistance to aggressive chemical environments.
  - Excellent resistance to humidity and UV.
  - Excellent mechanical strength.

#### Electrical

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

### Standard products

- Single conductors: UL and cUL approved conductors with fluoropolymer insulation (≥ 200 °C).
- Outer sheath colours: white, black or grey.
- Stranding of conducting cores: contact us.

### Approvals - standards

- UL and cUL approval as per standard UL 758 and C22.2 No. 210 – File no.: E101965.
- “Horizontal flame test” or “Cable flame test” as per UL approval.
- “FT1 flame rating” as per cUL approval.

### Applications

- Internal cabling for electrical heating appliances.
- External connections for electrical heating appliances.

### Options

- Electrical shielding: Tin-plated copper braid, or aluminium tape + continuity wire.
- Other outer sheath colours: contact us.
- Other nominal cross-sections: contact us.
- Conductors with a silicone insulation : contact us.
- Other style nos. available: styles no. 2895, 20262, 20920.

### KEY

Conducting metals  
B Tin-plated copper  
B\* Tin-plated copper ( $\varnothing > 0.38$  mm)  
C Nickel-plated copper  
D Silver-plated copper  
E Nickel  
F Bare copper  
F\* Bare copper ( $\varnothing > 0.38$  mm)  
G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/B External or Internal wiring  
NS Not Specified  
VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.

Only the average thickness of insulation or the sheathing should be taken into account.

For this product, please contact:

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LES CABLES DE L'EXTREME

### FLUOROPOLYMER INSULATED WIRES AND CABLES



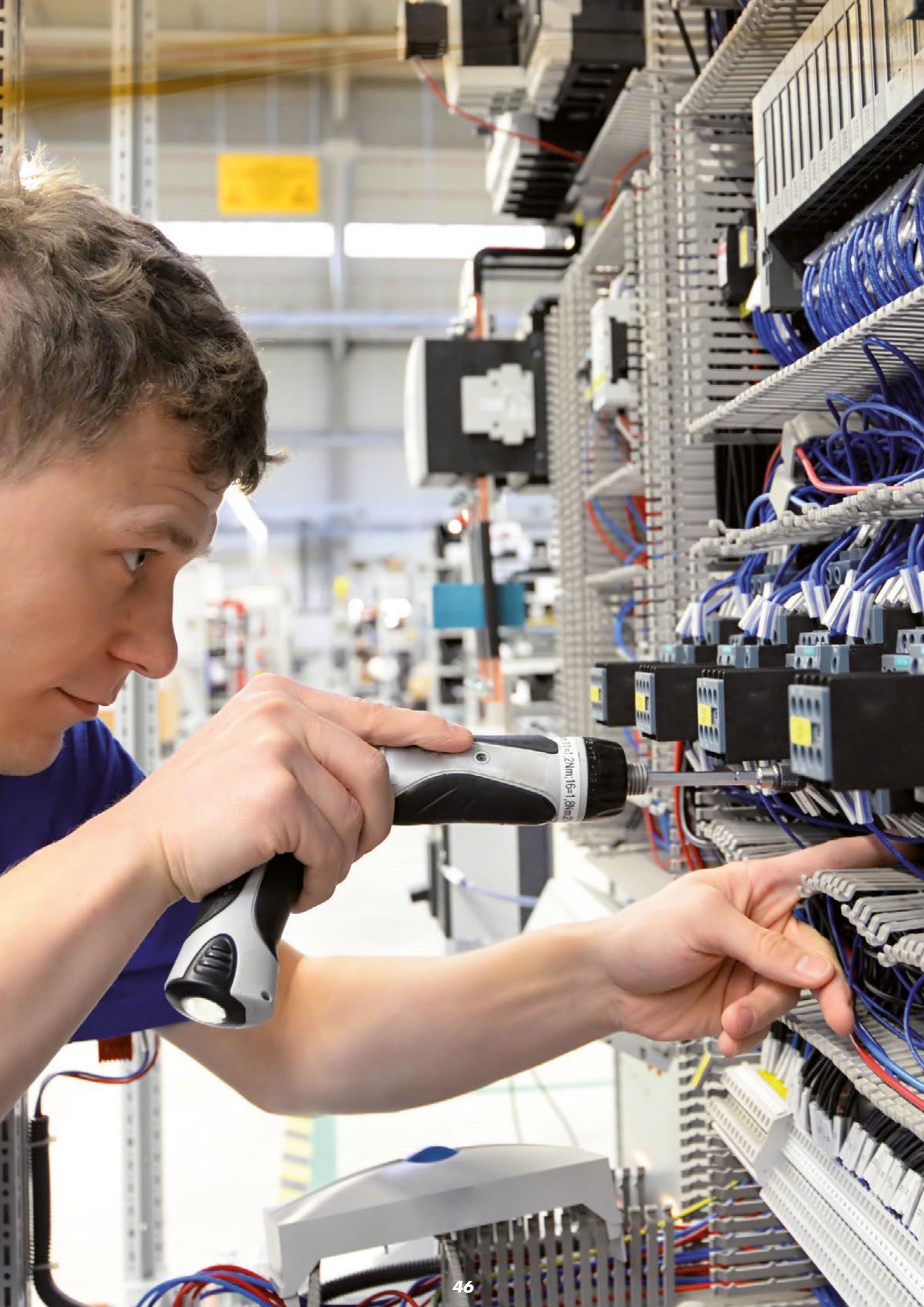
1 • UL and cUL approved conductors with fluoropolymer insulation.  
2 • Outer sheath: Fluorinated polymer.

Style no. Insulation Approval	20711-F200		20711-F200		2749-F200			
	ETFE "Thin-wall"		FEP		ETFE "Thin-wall"			
200 °C - 300 V		200 °C - 300 V		200 °C - 300 V		200 °C - 300 V		
No. of cond.	Nominal cross-section	Nominal diameter of the cond.* (mm)	Nominal diameter of the cable* (mm)	Nominal diameter of the cond.* (mm)	Nominal diameter of the cable* (mm)	Nominal diameter of the cond.* (mm)	Nominal diameter of the cable* (mm)	
AWG	(mm²)							
2	26	0.13	0.8	2.1	1.0	2.5	0.8	2.6
3	26	0.13	0.8	2.2	1.0	2.8	0.8	2.7
4	26	0.13	0.8	2.4	1.0	3.0	0.8	2.9
5	26	0.13	0.8	2.7	1.0	3.3	0.8	3.1
7	26	0.13	0.8	3.0	1.0	3.6	0.8	3.4
2	24	0.22	0.9	2.3	1.1	2.8	0.9	2.8
3	24	0.22	0.9	2.4	1.1	3.0	0.9	2.9
4	24	0.22	0.9	2.7	1.1	3.3	0.9	3.1
5	24	0.22	0.9	3.0	1.1	3.6	0.9	3.4
7	24	0.22	0.9	3.3	1.1	4.1	0.9	3.7
2	22	0.34	1.05	2.7	1.25	3.1	1.05	3.1
3	22	0.34	1.05	2.8	1.25	3.3	1.05	3.2
4	22	0.34	1.05	3.1	1.25	3.8	1.05	3.5
5	22	0.34	1.05	3.4	1.25	4.2	1.05	3.8
7	22	0.34	1.05	3.9	1.25	4.6	1.05	4.1
2	-	0.5	1.25	3.1	1.4	3.4	1.25	3.5
3	-	0.5	1.25	3.3	1.4	3.8	1.25	3.7
4	-	0.5	1.25	3.8	1.4	4.2	1.25	4.0
5	-	0.5	1.25	4.1	1.4	4.6	1.25	4.3
7	-	0.5	1.25	4.5	1.4	5.0	1.25	4.7
2	20	0.6	1.3	3.2	1.5	3.6	1.3	3.6
3	20	0.6	1.3	3.4	1.5	4.0	1.3	3.8
4	20	0.6	1.3	3.9	1.5	4.4	1.3	4.1
5	20	0.6	1.3	4.3	1.5	4.9	1.3	4.5
7	20	0.6	1.3	4.7	1.5	5.3	1.3	4.9
2	-	0.75	1.4	3.4	1.55	3.9	1.4	3.8
3	-	0.75	1.4	3.8	1.55	4.1	1.4	4.0
4	-	0.75	1.4	4.1	1.55	4.5	1.4	4.3
5	-	0.75	1.4	4.5	1.55	5.0	1.4	4.8
7	-	0.75	1.4	5.0	1.55	5.5	1.4	5.2
2	18	0.93	1.55	3.9	1.7	4.2	1.55	4.1
3	18	0.93	1.55	4.1	1.7	4.5	1.55	4.3
4	18	0.93	1.55	4.5	1.7	4.9	1.55	4.7
5	18	0.93	1.55	4.9	1.7	5.4	1.55	5.2
7	18	0.93	1.55	5.4	1.7	6.1	1.55	5.6
2	-	1	1.65	4.1	1.8	4.4	1.65	4.3
3	-	1	1.65	4.3	1.8	4.7	1.65	4.5
4	-	1	1.65	4.7	1.8	5.1	1.65	4.9
5	-	1	1.65	5.2	1.8	5.7	1.65	5.4
7	-	1	1.65	5.7	1.8	6.4	1.65	5.9
2	16	1.34	1.9	4.6	2.0	4.8	1.9	4.8
3	16	1.34	1.9	4.9	2.0	5.1	1.9	5.1
4	16	1.34	1.9	5.3	2.0	5.6	1.9	5.5
5	16	1.34	1.9	6.1	2.0	6.4	1.9	6.1
7	16	1.34	1.9	6.7	2.0	7.0	1.9	6.7
2	-	1.5	1.9	4.6	2.0	4.8	1.9	4.8
3	-	1.5	1.9	4.9	2.0	5.1	1.9	5.1
4	-	1.5	1.9	5.3	2.0	5.6	1.9	5.5
5	-	1.5	1.9	6.1	2.0	6.4	1.9	6.1
7	-	1.5	1.9	6.7	2.0	7.0	1.9	6.7
2	14	-	2.25	5.3	2.4	5.6	2.25	5.5
3	14	-	2.25	5.6	2.4	6.2	2.25	5.8
4	14	-	2.25	6.4	2.4	6.8	2.25	6.4
5	14	-	2.25	7.0	2.4	7.5	2.25	7.0
7	14	-	2.25	7.7	2.4	8.4	2.25	7.7

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Style no. Insulation		2749-F200		20710-F200		20710-F200		2750-F200		2750-F200		
Approval		200 °C – 300 V AWM I A/B (Wall 0.51 mm)		200 °C – 600 V ETFE "Thin-wall"		200 °C – 600 V FEP		200 °C – 600 V ETFE "Thin-wall"		200 °C – 600 V FEP		
No. of cond.	Nominal cross-section (mm <sup>2</sup> )	AWG	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	Nominal diameter of the cond.* of the cable* (mm)	
2	26	0.13	1.0	3.0	1.0	2.6	1.2	3.0	1.0	3.0	1.2	3.4
3	26	0.13	1.0	3.2	1.0	2.7	1.2	3.2	1.0	3.1	1.2	3.6
4	26	0.13	1.0	3.4	1.0	3.0	1.2	3.5	1.0	3.4	1.2	3.9
5	26	0.13	1.0	3.7	1.0	3.3	1.2	4.0	1.0	3.7	1.2	4.3
7	26	0.13	1.0	4.0	1.0	3.6	1.2	4.4	1.0	4.0	1.2	4.6
2	24	0.22	1.1	3.2	1.1	2.8	1.35	3.3	1.1	3.2	1.35	3.7
3	24	0.22	1.1	3.4	1.1	2.9	1.35	3.5	1.1	3.3	1.35	3.9
4	24	0.22	1.1	3.7	1.1	3.2	1.35	4.1	1.1	3.6	1.35	4.3
5	24	0.22	1.1	4.0	1.1	3.5	1.35	4.4	1.1	3.9	1.35	4.7
7	24	0.22	1.1	4.3	1.1	4.1	1.35	4.9	1.1	4.3	1.35	5.1
2	22	0.34	1.25	3.5	1.25	3.1	1.45	3.5	1.25	3.5	1.45	3.9
3	22	0.34	1.25	3.7	1.25	3.3	1.45	3.9	1.25	3.7	1.45	4.2
4	22	0.34	1.25	4.0	1.25	3.8	1.45	4.3	1.25	4.0	1.45	4.5
5	22	0.34	1.25	4.4	1.25	4.1	1.45	4.7	1.25	4.3	1.45	4.9
7	22	0.34	1.25	4.8	1.25	4.5	1.45	5.2	1.25	4.7	1.45	5.4
2	-	0.5	1.4	3.8	1.4	3.4	1.65	4.1	1.4	3.8	1.65	4.3
3	-	0.5	1.4	4.0	1.4	3.8	1.65	4.4	1.4	4.0	1.65	4.6
4	-	0.5	1.4	4.4	1.4	4.1	1.65	4.8	1.4	4.3	1.65	5.0
5	-	0.5	1.4	4.8	1.4	4.5	1.65	5.3	1.4	4.8	1.65	5.5
7	-	0.5	1.4	5.2	1.4	5.0	1.65	5.8	1.4	5.2	1.65	6.0
2	20	0.6	1.5	4.0	1.5	3.6	1.7	4.2	1.5	4.0	1.7	4.4
3	20	0.6	1.5	4.3	1.5	4.0	1.7	4.5	1.5	4.2	1.7	4.7
4	20	0.6	1.5	4.6	1.5	4.4	1.7	4.9	1.5	4.6	1.7	5.1
5	20	0.6	1.5	5.1	1.5	4.8	1.7	5.4	1.5	5.0	1.7	5.6
7	20	0.6	1.5	5.5	1.5	5.3	1.7	6.1	1.5	5.5	1.7	6.1
2	-	0.75	1.55	4.1	1.55	3.9	1.8	4.4	1.55	4.1	1.8	4.6
3	-	0.75	1.55	4.4	1.55	4.1	1.8	4.7	1.55	4.3	1.8	4.9
4	-	0.75	1.55	4.8	1.55	4.5	1.8	5.1	1.55	4.7	1.8	5.4
5	-	0.75	1.55	5.2	1.55	4.9	1.8	5.7	1.55	5.2	1.8	5.9
7	-	0.75	1.55	5.7	1.55	5.4	1.8	6.4	1.55	5.6	1.8	6.4
2	18	0.93	1.7	4.4	1.8	4.4	2.0	4.8	1.8	4.6	2.0	5.0
3	18	0.93	1.7	4.7	1.8	4.6	2.0	5.1	1.8	4.9	2.0	5.3
4	18	0.93	1.7	5.1	1.8	5.1	2.0	5.6	1.8	5.3	2.0	5.8
5	18	0.93	1.7	5.6	1.8	5.6	2.0	6.4	1.8	5.8	2.0	6.4
7	18	0.93	1.7	6.1	1.8	6.4	2.0	7.0	1.8	6.4	2.0	7.0
2	-	1	1.8	4.6	1.8	4.4	2.0	4.8	1.8	4.6	2.0	5.0
3	-	1	1.8	4.9	1.8	4.6	2.0	5.1	1.8	4.9	2.0	5.3
4	-	1	1.8	5.4	1.8	5.1	2.0	5.6	1.8	5.3	2.0	5.8
5	-	1	1.8	5.9	1.8	5.6	2.0	6.4	1.8	5.8	2.0	6.4
7	-	1	1.8	6.4	1.8	6.4	2.0	7.0	1.8	6.4	2.0	7.0
2	16	1.34	2.0	5.0	2.0	4.8	2.2	5.2	2.0	5.0	2.2	5.4
3	16	1.34	2.0	5.3	2.0	5.1	2.2	5.6	2.0	5.3	2.2	5.8
4	16	1.34	2.0	5.8	2.0	5.6	2.2	6.3	2.0	5.8	2.2	6.3
5	16	1.34	2.0	6.4	2.0	6.4	2.2	6.9	2.0	6.4	2.2	7.0
7	16	1.34	2.0	7.0	2.0	7.0	2.2	7.6	2.0	7.0	2.2	7.6
2	-	1.5	2.0	5.0	2.0	4.8	2.3	5.4	2.0	5.0	2.3	5.6
3	-	1.5	2.0	5.3	2.0	5.1	2.3	5.8	2.0	5.3	2.3	6.0
4	-	1.5	2.0	5.8	2.0	5.6	2.3	6.5	2.0	5.8	2.3	6.6
5	-	1.5	2.0	6.4	2.0	6.4	2.3	7.2	2.0	6.4	2.3	7.2
7	-	1.5	2.0	7.0	2.0	7.0	2.3	7.9	2.0	7.0	2.3	7.9
2	14	-	2.4	5.8	2.4	5.6	2.6	6.2	2.4	5.8	2.6	6.2
3	14	-	2.4	6.2	2.4	6.1	2.6	6.6	2.4	6.2	2.6	6.6
4	14	-	2.4	6.8	2.4	6.7	2.6	7.3	2.4	6.8	2.6	7.3
5	14	-	2.4	7.5	2.4	7.4	2.6	8.2	2.4	7.5	2.6	8.2
7	14	-	2.4	8.4	2.4	8.4	2.6	9.0	2.4	8.4	2.6	9.0
Conducting metal		B*CDEG		B*CDEF*G		B*CDEF*G		B*CDEF*G		B*CDEF*G		



## THERMOPLASTIC INSULATED WIRES AND CABLES

FT No.	PRODUCT REFERENCE	APPROVAL	PAGE
<b>2201</b>	PLASTHERM Y2 and EY2		48
<b>2202</b>	PLASTHERM 80 °C - PVC insulation	c  us	50
<b>2203</b>	PLASTHERM 105 °C - PVC insulation	c  us	52
<b>2204</b>	PLASTHERM Style 1015-HAR	c  us <HARD>	54
<b>2205</b>	PLASTHERM Style 20199, 2-conductor flat cable	c  us	55
<b>2206</b>	PLASTHERM MY2-Y2 and MY2-EY2		56
<b>2207</b>	PLASTHERM 80 °C - PVC insulation and sheathing	c  us	58
<b>2208</b>	PLASTHERM 90 °C - PVC insulation and sheathing	c  us	59
<b>2209</b>	PLASTHERM 105 °C - PVC insulation and sheathing	c  us	60
<b>2210</b>	PLASTHERM 90 °C - Polyolefin insulation	c  us	61
<b>2211</b>	PLASTHERM PHF2 - Halogen-free insulation		62
<b>2212</b>	PLASTHERM PHF2E IRD - Halogen-free insulation, reduced walls		63
<b>2213</b>	PLASTHERM PHFLEX - Cable resistant to alternate bending, halogen-free insulation		64
<b>2214</b>	PLASTHERM STYLE 21209 - Polyurethane sheathing	c  us	65
<b>2215</b>	PLASTHERM MYBE-EY-CSI - Intrinsic safety		66
<b>2216</b>	PLASTHERM HP-U - 2-conductor flat cable, thin insulation		67
<b>2217</b>	PLASTHERM HP-M - 2-conductor flat cable, thin insulation		68
<b>2218</b>	PLASTHERM HP-M-HT - 2-conductor flat cable, thin insulation		69
<b>2219</b>	PLASTHERM 41		70
<b>2220</b>	PLASTHERM E43		71

# PLASTHERM® Y2 and EY2

**-30 °C to +105 °C**

## Applications

- Cabling in an environment potentially reaching +105°C (electrical appliances, light fittings, electronics, motor cars, etc.).

## Options

- Solid bare (ref. RY2) or tin-plated (ref. REY2) copper core: see details of the option below.
- Extra-flexible bare (ref. Y2-ES) or tin-plated (ref. EY2-ES) copper core: see details of the option below.
- Silver-plated (ref. AY2) or nickel-plated (ref. CNY2) copper core: contact us.
  - Outer electrical shielding: > Tin-plated copper braid: ref. Y2BE or EY2BE.
  - Insulation made of PVC 80°C: contact us.
  - Insulation made of PVC 125°C: contact us.
  - Other nominal metric or American cross-sections: contact us.
  - Other nominal stranding: contact us.
  - Other options and/or combinations of the options outlined above: contact us.

## THERMOPLASTIC INSULATED WIRES AND CABLES

2 1

1 • Flexible bare (ref. Y2) or tin-plated (ref. EY2) copper core.  
2 • Insulation: PVC 105 °C.

## Characteristics

### General

- Continuous operating temperatures: -30 °C to +105 °C.
- Good resistance to thermal shock.
- Good mechanical strength.
- Good resistance to common chemical environments.

### Electrical

- Rated voltage: CS < 0.5 mm<sup>2</sup>: 300/500 V.  
0.5 mm<sup>2</sup> ≤ CS < 1.5 mm<sup>2</sup>: 450/750 V.  
CS ≥ 1.5 mm<sup>2</sup>: 600/1000 V.
- Test voltage: CS < 0.5 mm<sup>2</sup>: 1500 V.  
0.5 mm<sup>2</sup> ≤ CS < 1.5 mm<sup>2</sup>: 2500 V.  
CS ≥ 1.5 mm<sup>2</sup>: 3000 V.

## Standard products

- Standard insulation colours: all colours including yellow/green.

For this product, please contact:

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## Y2 and EY2

Flexible core			INSULATED WIRE OR CABLE		
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (Tin-plated copper core)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.12	7 x 0.15*	161	0.3	1.1	2.2
0.14	7 x 0.16**	142	0.3	1.1	2.3
0.22	7 x 0.20	92.5	0.3	1.2	3.2
0.34	7 x 0.25	59.2	0.3	1.3	4.3
0.34	19 x 0.15*	58.9	0.3	1.3	4.3
0.38	19 x 0.16**	55.7	0.3	1.4	4.9
0.5	7 x 0.30	40.7	0.6	2.1	8.4
0.5	16 x 0.20	40.1	0.6	2.1	8.4
0.6	19 x 0.20	33.7	0.6	2.2	9.6
0.75	24 x 0.20	26.7	0.6	2.3	11.2
0.93	19 x 0.25	21.6	0.6	2.4	13.0
1	32 x 0.20	20.0	0.6	2.5	14.0
1.34	19 x 0.30	15.0	0.6	2.7	17.6
1.5	30 x 0.25	13.7	0.7	3.0	20.3
2.5	50 x 0.25	8.21	0.8	3.6	31.7
4	56 x 0.30	5.09	0.8	4.3	48.5
6	84 x 0.30	3.39	0.8	4.8	67.6
10	77 x 0.40	1.95	1.0	6.4	111
16	119 x 0.40	1.24	1.2	7.8	169

## Option • RY2 and REY2

Solid core			INSULATED WIRE		
0.22	1 x 0.52	85.9	0.4	1.3	3.5
0.34	1 x 0.64	54.1	0.45	1.5	4.9
0.5	1 x 0.80	36.7	0.5	1.8	7.4
0.75	1 x 0.98	24.8	0.55	2.1	10.6
1	1 x 1.13	18.2	0.6	2.3	13.4
1.5	1 x 1.38	12.2	0.6	2.6	18.8
2.5	1 x 1.77	7.56	0.7	3.2	29.9
4	1 x 2.24*	4.70	0.7	3.6	44.1
6	1 x 2.74*	3.11	0.8	4.1	63.2

## Option • Y2-ES and EY2-ES

Extra-flexible core			INSULATED WIRE		
0.05	24 x 0.05	405	0.2	0.7	0.9
0.14	70 x 0.05	159	0.3	1.1	2.3
0.25	120 x 0.05 or 60 x 0.07	86.6	0.3	1.2	3.4
0.34	180 x 0.05 or 90 x 0.07 or 40 x 0.10	59.9	0.4	1.6	5.2
0.4	200 x 0.05 or 100 x 0.07 or 50 x 0.10	50.7	0.45	1.8	6.2
0.5	260 x 0.05 or 130 x 0.07 or 60 x 0.10	40.7	0.45	1.9	7.4
0.75	390 x 0.05 or 200 x 0.07 or 100 x 0.10	27.1	0.5	2.2	10.5
1	520 x 0.05 or 260 x 0.07 or 120 x 0.10	20.4	0.55	2.5	13.8
1.5	750 x 0.05 or 390 x 0.07 or 190 x 0.10	13.7	0.55	2.8	18.7

\* Nominal stranding only available in bare copper version.

\*\* Nominal stranding only available in tin-plated copper version.

For this product, please contact:

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LES CABLES DE L'EXTREME

**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**PLASTHERM® 80 °C**  
**PVC insulation**  
**UL and cUL approval**



**Characteristics**  
**General**

- Continuous operating temperatures  
-30°C to +80°C.
- Good resistance to chemical influences.
- Good alternate bending strength.

**Electrical**

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

**Standard products**

- All colours including two-coloured.
- Stranding of conducting cores: contact us.

**Approvals - standards**

- UL and cUL approval (CSA) as per standard UL 758 and C22.2 No. 210 – File no.: E101965.
- "Horizontal flame test" as per UL approval.
- "FT1 flame rating" as per cUL approval.

**Applications**

- Internal cabling for electrical or electronic appliances, computers, etc..

**Options**

- Other nominal cross-sections: contact us.
  - Other style nos. available: styles no. 1017, 1019, 1020, 1021, 1022, 1023, 1158, 1159, 10024, 10076, 10127, 10437, 10438, 1498, 1662, 1908, 1909.

For this product, please contact:

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**THERMOPLASTIC INSULATED WIRES AND CABLES**

2

1

**80C 300V 1007 AWM**

1 • Bare or tin-plated copper core.  
2 • Insulation: PVC.

		<b>Style no.</b>	<b>1007</b>	<b>1497</b>	<b>1581</b>
		<b>Approval</b>	<b>80 °C - 300 V</b>	<b>80 °C - 300 V</b>	<b>80 °C - 300 V</b>
<b>Nominal cross-section</b>	<b>AWG (mm²)</b>		<b>Average thickness of insulation (mm)</b>	<b>Nominal diameter* (mm)</b>	<b>Average thickness of insulation (mm)</b>
30	0.05		0.38	1.1	-
28	0.09		0.38	1.15	-
26	0.13		0.38	1.25	0.41
24	0.22		0.38	1.4	0.41
22	0.34		0.38	1.5	0.41
-	0.5		0.38	1.75	0.41
20	0.6		0.38	1.75	0.41
-	0.75		0.38	1.9	0.41
18	0.93		0.38	2.0	0.41
-	1		0.38	2.1	0.41
16	1.34		0.38	2.3	0.41
-	1.5		0.38	2.4	0.41
14	-		-	-	0.41
-	2.5		-	-	0.41
12	-		-	-	0.41
-	4		-	-	0.41
10	-		-	-	0.41
-	6		-	-	0.41
8	-		-	-	-
-	10		-	-	-
6	-		-	-	-
-	16		-	-	-
4	-		-	-	-
-	25		-	-	-
2	35		-	-	-
1	-		-	-	-
-	50		-	-	-
1/0	-		-	-	-
2/0	70		-	-	-
3/0	-		-	-	-
-	95		-	-	-
4/0	-		-	-	-
-	120		-	-	-
		<b>Conducting metal</b>	<b>BCDEFG</b>	<b>BCDEFG</b>	<b>BCDEFG</b>

**KEY**

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silverplated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickelplated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/External or Internal wiring

NS Not Specified  
VNS Voltage Not Specified

UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
Only the average thickness of insulation should be taken into account.

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Style no.		10053		1011		10381		1030	
Approval		80 °C - 300 V		80 °C - 600 V		80 °C - 600 V		80 °C - 1000 V	
Nominal cross-section	Average thickness of insulation	Nominal diameter*							
AWG	(mm <sup>2</sup> )	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)	
30	0.05	0.56	1.45	0.76	1.85	0.51	1.3	0.76	1.85
28	0.09	0.56	1.5	0.76	1.9	0.51	1.4	0.76	1.9
26	0.13	0.56	1.6	0.76	2.1	0.51	1.5	0.76	2.1
24	0.22	0.56	1.75	0.76	2.2	0.51	1.65	0.76	2.2
22	0.34	0.56	1.9	0.76	2.3	0.51	1.8	0.76	2.3
-	0.5	0.56	2.05	0.76	2.45	0.64	2.2	0.76	2.45
20	0.6	0.56	2.1	0.76	2.6	0.64	2.25	0.76	2.6
-	0.75	0.56	2.25	0.76	2.65	0.64	2.4	0.76	2.65
18	0.93	0.56	2.35	0.76	2.8	0.64	2.55	0.76	2.8
-	1	0.56	2.45	0.76	2.8	0.64	2.6	0.76	2.8
16	1.34	0.56	2.6	0.76	3.0	0.69	2.9	0.76	3.0
-	1.5	0.56	2.7	0.76	3.1	0.69	3.0	0.76	3.1
14	-	0.56	3.0	0.76	3.45	0.69	3.3	0.76	3.45
-	2.5	0.56	3.2	0.76	3.6	0.69	3.45	0.76	3.6
12	-	0.56	3.5	0.76	3.9	0.69	3.75	0.76	3.9
-	4	0.56	3.75	0.76	4.3	0.69	4.0	0.76	4.3
10	-	0.56	4.1	0.76	4.5	0.69	4.4	0.76	4.5
-	6	0.56	4.3	0.76	4.8	0.69	4.6	0.76	4.8
8	-	-	-	1.14	6.2	0.76	5.5	-	-
-	10	-	-	1.14	6.6	0.76	6.1	-	-
6	-	-	-	1.52	8.2	0.76	6.9	-	-
-	16	-	-	1.52	8.6	0.76	7.2	-	-
4	-	-	-	1.52	9.6	1.14	8.9	-	-
-	25	-	-	1.52	10.0	1.14	9.4	-	-
2	35	-	-	1.52	11.0	1.14	10.5	-	-
1	-	-	-	2.03	13.0	1.52	12.4	-	-
-	50	-	-	2.03	14.2	1.52	12.8	-	-
1/0	-	-	-	2.03	14.6	1.52	13.5	-	-
2/0	70	-	-	2.03	16.2	1.52	14.6	-	-
3/0	-	-	-	2.03	17.6	1.52	16.2	-	-
-	95	-	-	2.03	17.8	1.52	16.3	-	-
4/0	-	-	-	2.03	19.1	2.03	19.1	-	-
-	120	-	-	2.03	20.5	2.03	20.5	-	-
Conducting metal	BCDEFG		BCDEFG		BCDEFG		BCDEFG		

## KEY

- A Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silverplated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickelplated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
 AWM I A/B Internal wiring  
 AWM II A/B External or Internal wiring

NS Not Specified  
 VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
 Only the average thickness of insulation should be taken into account.

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**omerin**  
LES CABLES DE L'EXTREME

# PLASTHERM® 105°C

## PVC insulation

### UL and cUL approval



#### Characteristics

##### General

- Continuous operating temperatures -30°C to +105°C.
- Good resistance to chemical influences.
  - Good alternate bending strength.
  - Rated voltage: as per style no.
  - Test voltage: 10 x Rated voltage.

#### Standard products

- All colours including two-coloured.
- Stranding of conducting cores: contact us.

#### Approvals - standards

- UL and cUL approval (CSA) as per standard UL 758 and C22.2 No. 210 – File no.: E101965.
- "Horizontal flame test" as per UL approval.
- "FT1 flame rating" as per cUL approval.

#### Applications

- Internal cabling for electrical or electronic appliances, computers, etc..

#### Options

- Other nominal cross-sections: contact us.
  - Other style nos. available: styles no. 1028, 1484, 1500, 1504, 1647, 1650, 10070, 10236, 11122, 11287.
  - Available PVC 90 °C insulated style nos.: styles no. 1706, 1013, 1024, 1026, 1027, 1207, 1499, 10321, 1032, 1444: contact us.
- Nylon sleeving for certain Style number, consult us.
- Vertical flame test VW1 for style 1015: consult us.

For this product, please contact:

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#### THERMOPLASTIC INSULATED WIRES AND CABLES

2

1

I R/B 105°C FT1 PLASTHERM 105°C 1015



1 • Bare or tin-plated copper core.  
2 • Insulation: PVC.

Style no.	1569-VW-1		10198		1896		10012		
	Approval		105°C – 300 V		105°C – 300 V		105°C – 300 V		105°C – 600 V
Nominal cross-section		Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)
AWG	(mm <sup>2</sup> )								
30	0.05	0.38	1.1	0.38	1.1	-	-	0.51	1.3
28	0.09	0.38	1.15	0.38	1.15	-	-	0.51	1.4
26	0.13	0.38	1.2	0.38	1.25	0.89	2.3	0.51	1.5
24	0.22	0.38	1.4	0.38	1.4	0.89	2.4	0.51	1.65
22	0.34	0.38	1.6	0.38	1.5	0.89	2.55	0.51	1.8
-	0.5	0.38	1.7	0.38	1.7	0.89	2.7	0.51	1.95
20	0.6	0.38	1.8	0.38	1.75	0.89	2.75	0.51	2.0
-	0.75	0.38	1.9	0.38	1.9	0.89	2.9	0.51	2.15
18	0.93	0.38	2.05	0.38	2.0	0.89	3.1	0.51	2.25
-	1	0.38	2.1	0.38	2.1	0.89	3.1	0.51	2.35
16	1.34	0.38	2.3	0.38	2.3	0.89	3.4	0.51	2.5
-	1.5	0.38	2.4	0.38	2.4	0.89	3.4	0.51	2.7
14	-	0.38	2.7	0.51	2.9	0.89	3.7	0.51	2.9
-	2.5	0.38	2.8	0.51	3.1	0.89	3.9	0.51	3.1
12	-	0.38	3.2	0.51	3.4	0.89	4.3	0.51	3.4
-	4	0.38	3.4	0.51	3.65	0.89	4.5	0.51	3.65
10	-	0.38	3.8	0.51	4.0	0.89	4.9	0.51	4.0
-	6	0.38	4.0	0.51	4.2	0.89	5.1	0.51	4.2
8	-	0.76	5.5	0.76	5.5	0.89	5.8	0.76	5.5
-	10	0.76	6.1	0.76	6.1	0.89	6.4	0.76	6.1
6	-	0.76	6.9	0.76	6.9	0.89	7.1	1.14	7.6
-	16	0.76	7.2	0.76	7.2	0.89	7.4	1.14	7.7
4	-	0.76	8.1	0.76	8.1	0.89	8.4	1.14	8.9
-	25	0.76	8.6	0.76	8.6	0.89	9.0	1.14	9.4
2	35	0.76	9.7	0.76	9.7	0.89	10.0	1.14	10.5
1	-	-	-	1.02	11.4	0.89	11.2	1.52	12.4
-	50	-	-	1.02	11.8	0.89	11.5	1.52	12.8
1/0	-	-	-	1.02	12.5	0.89	12.2	1.52	13.5
2/0	70	-	-	1.27	14.1	0.89	13.3	1.52	14.6
3/0	-	-	-	1.27	15.7	0.89	14.9	1.52	16.2
-	95	-	-	1.27	15.8	0.89	15.1	1.52	16.3
4/0	-	-	-	1.27	17.3	0.89	16.5	-	-
-	120	-	-	1.27	17.6	0.89	16.8	-	-
Conducting metal	BCDEFG		BCDEFG		BCDEFG		BF		BCDEFG

#### KEY

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silver-plated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/B External or Internal wiring

NS Not Specified  
VNS Voltage Not Specified

: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core. Only the average thickness of insulation should be taken into account.

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Style no.		1015	1283	1897	10914	10271	10269
Approval		105°C - 600 V	105°C - 600 V	105°C - 600 V	105°C - 1 000 V	105°C - 1 000 V	105°C - 1 000 V
Nominal cross-section	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)	Nominal diameter* (mm)	Average thickness of insulation (mm)
AWG	(mm <sup>2</sup> )	(mm)	(mm)	(mm)	(mm)	(mm)	(mm)
30	0.05	0.76	1.85	-	-	-	-
28	0.09	0.76	1.9	-	-	-	-
26	0.13	0.76	2.1	-	-	0.89	2.3
24	0.22	0.76	2.2	-	-	0.89	2.4
22	0.34	0.76	2.3	-	-	0.89	2.55
-	0.5	0.76	2.45	-	-	0.89	2.7
20	0.6	0.76	2.6	-	-	0.89	2.75
-	0.75	0.76	2.65	-	-	0.89	2.9
18	0.93	0.76	2.8	-	-	0.89	3.2
-	1	0.76	2.8	-	-	0.89	3.2
16	1.34	0.76	3.0	-	-	0.89	3.4
-	1.5	0.76	3.1	-	-	0.89	3.4
14	-	0.76	3.45	-	-	0.89	3.7
-	2.5	0.76	3.6	-	-	0.89	3.9
12	-	0.76	3.9	-	-	0.89	4.4
-	4	0.76	4.3	-	-	0.89	4.5
10	-	0.76	4.5	-	-	0.89	4.9
-	6	0.76	4.8	-	-	0.89	5.1
8	-	1.14	6.2	1.52	7.0	0.89	5.8
-	10	1.14	6.6	1.52	7.6	0.89	6.4
6	-	1.52	8.2	1.52	8.2	0.89	7.1
-	16	1.52	8.6	1.52	8.6	0.89	7.4
4	-	1.52	9.6	1.52	9.6	0.89	8.4
-	25	1.52	10.0	1.52	10.0	0.89	9.0
2	35	1.52	11.4	1.52	11.0	0.89	10.0
1	-	2.03	13.6	-	-	0.89	11.2
-	50	2.03	14.2	-	-	0.89	11.5
1/0	-	2.03	14.6	-	-	0.89	12.2
2/0	70	2.03	16.2	-	-	0.89	13.3
3/0	-	2.03	17.6	-	-	0.89	14.9
-	95	2.03	17.8	-	-	0.89	15.1
4/0	-	2.03	19.1	-	-	0.89	16.5
-	120	2.03	20.5	-	-	0.89	16.8
Conducting metal		BCDEFG	BCDEFG	BCDEFG	BCDEFG	BCDEFG	BCDEFG

## KEY

- Conducting metals
- B Tin-plated copper
- B\* Tin-plated copper ( $\varnothing > 0.38$  mm)
- C Nickel-plated copper
- D Silverplated copper
- E Nickel
- F Bare copper
- F\* Bare copper ( $\varnothing > 0.38$  mm)
- G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
 AWM I A/B Internal wiring  
 AWM II A/B External or Internal wiring

NS Not Specified  
 VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
 Only the average thickness of insulation should be taken into account.

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 omerin@omerin.com

**omerin**  
 LES CABLES DE L'EXTREME

# PLASTHERM® Style 1015-HAR

## UL, cUL and USE <HARD> approval

### -30 °C to +105 °C



#### Approvals - standards

- UL approval as per standard UL 758  
File no.: E101965.
- cUL approval (up to 4 mm<sup>2</sup> included)  
as per standard CSA C22.2 N° 210 -  
File no.: E101965.
- USE <HARD> approval  
as per NF EN 50525-2-31.
- "Horizontal flame test" as per UL approval.
  - "FT1 flame rating" as per cUL approval.
  - Resistance to vertical flame propagation  
for a single insulated wire: IEC 60332-1-2 /  
EN 50265-2-1 / NF C 32-070 test C2.

#### Applications

- Internal cabling for electrical and electronic appliances.

#### Options

- Tin-plated copper core.

#### Style 1015-HAR

##### Flexible core • class 5 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
--	-------------------	---	--------------------------------------	-----------------------	-----------------------------------

##### Type H05V2-K

0.5	16 x 0.20	39.0	0.76	2.45	9.9
0.75	24 x 0.20	26.0	0.76	2.65	12.6
1	32 x 0.20	19.5	0.76	2.8	15.1

##### Type H07V2-K

1.5	30 x 0.25	13.3	0.76	3.1	20.1
2.5	50 x 0.25	7.98	0.80	3.6	30.1
4	56 x 0.30	4.95	0.80	4.3	46.8
6	84 x 0.30	3.30	0.80	4.8	65.2
10	80 x 0.40	1.91	1.15	6.6	117
16*	126 x 0.40	1.21	1.15	7.7	168
25	192 x 0.40	0.78	1.52	10.0	274
35	259 x 0.40	0.554	1.52	11.4	359

For this product, please contact:

\* Nominal cross-section only available in Style 10271 <HARD>.

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LES CABLES DE L'EXTREME

# PLASTHERM® Style 20199

## 2-conductor flat cable

### 105°C PVC insulation

### UL approval

### -30 °C to +105 °C



#### Approvals - standards

- UL approval as per standard UL 758 - File no.: E101965.

#### Applications

- Internal cabling for electric, electronic, audio and video appliances.

#### Options

- Identification using a coloured longitudinal stripe on one of the two conductors: contact us.

#### Characteristics

##### General

- Continuous operating temperatures: -30 °C to +105 °C.
- Very good flexibility.
- Good alternate bending strength.
- Easy stripping and separating of conductors.

##### Electrical

- Rated voltage: 300 V.
- Test voltage: as per standard UL 758.

#### Standard products

- Standard insulation colour: white.
- Identification by marking on one of the two conductors.

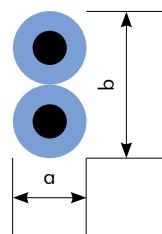
#### Style 20199

##### FLEXIBLE CORE

Nominal cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km) (bare copper core)
2 x 24	2 x 0.22	87.6
2 x 22	2 x 0.34	55.4
-	2 x 0.5	39.0
2 x 20	2 x 0.6	34.6

##### INSULATED CABLE

Nominal outer dimensions (mm)	a	b	Approximate linear weight (kg/km)
	1.4	3.0	7.5
	1.5	3.2	9.8
	1.7	3.6	13.0
	1.7	3.6	15.7



For this product, please contact:

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LES CABLES DE L'EXTREME

**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**PLASTHERM®  
MY2-Y2 and MY2-EY2  
-30 °C to +105 °C**

**Applications**

- Cabling in an environment potentially reaching +105°C (electrical appliances, light fittings, electronics, motor cars, etc.).

**Options**

- Silver-plated (ref. MY2-AY2) or nickel-plated (ref. MY2-CNY2) copper core: contact us.
  - Electrical shielding:
- > Tin-plated copper braid: ref. MY2BE-Y2 or MY2BE-EY2.
- > Aluminium tape + continuity wire: ref. MY2BAL-Y2 or MY2BAL-EY2.
  - Insulation and/or outer sheath made of PVC 80°C: contact us.
  - Insulation and/or outer sheath made of PVC 125 °C: contact us.
- Insulation made of silicone rubber: contact us.
- Insulation made of fluorinated polymer ETFE, FEP or PFA: contact us.
  - Other nominal metric or American cross-sections: contact us.
  - Other nominal stranding: contact us.
  - Other outer sheath colours: contact us.
  - Other options and/or combinations of the options outlined above: contact us.
- Other numbers of conductors: contact us.

**THERMOPLASTIC INSULATED WIRES AND CABLES**



- 1 • Flexible bare (ref. MY2-Y2) or tin-plated (ref. MY2-EY2) copper core.
- 2 • Insulation: PVC 105 °C.
- 3 • Outer sheath: PVC 105 °C.

**Characteristics**

**General**

- Continuous operating temperatures: -30 °C to +105 °C.
- Good resistance to thermal shock.
- Good mechanical strength.
- Good resistance to common chemical environments.

**Electrical**

- Rated voltage: up to 600/1000 V.
- Test voltage: up to 3000 V.

**Standard products**

- Standard conductor colours: see table below.
- Standard outer sheath colours: grey or black.

**Standard conductor colours:**

Number of conductors	With an earth wire	Without an earth wire
2	-	blue – brown
3	yellow/green – blue – brown	brown – black – grey
4	yellow/green – brown – black – grey	blue – brown – black – grey
5	yellow/green – blue – brown – black – grey	blue – brown – black – grey – black
≥6	yellow/green – grey numbered	grey numbered

**Identification**

Multi-conductor cables without an earth wire are identified as follows:

< Number of conductors > X < Cross-section > (mm<sup>2</sup>) (example: 3 X 1.5 mm<sup>2</sup>).

Multi-conductor cables with an earth wire are identified by the symbol G in the place of the X (example 3 G 1.5 mm<sup>2</sup>).

**Flexible core • class 5 as per IEC 60228**

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	INSULATED CONDUCTORS		SHEATHED CABLE	
			Nominal thickness of insulation (mm)	Nominal diameter (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
2 x 0.22	7 x 0.20	92.5	0.3	1.2	3.4	14.8
3 x 0.22	7 x 0.20	92.5	0.3	1.2	3.6	17.7
4 x 0.22	7 x 0.20	92.5	0.3	1.2	3.9	21.2
5 x 0.22	7 x 0.20	92.5	0.3	1.2	4.4	26.9
7 x 0.22	7 x 0.20	92.5	0.3	1.2	4.8	34.2
19 x 0.22	7 x 0.20	92.5	0.3	1.2	7.6	84.4
2 x 0.34	7 x 0.25	59.2	0.4	1.6	4.4	24.3
3 x 0.34	7 x 0.25	59.2	0.4	1.6	4.7	29.0
4 x 0.34	7 x 0.25	59.2	0.4	1.6	5.1	34.8
5 x 0.34	7 x 0.25	59.2	0.4	1.6	5.5	41.1
7 x 0.34	7 x 0.25	59.2	0.4	1.6	6.0	52.9
19 x 0.34	7 x 0.25	59.2	0.4	1.6	9.6	132

For this product, please contact:

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LES CABLES DE L'EXTREME

## Flexible core • class 5 as per IEC 60228

## INSULATED CONDUCTORS

## SHEATHED CABLE

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
2 x 0.5	16 x 0.20	40.1	0.4	1.8	4.8	30.0
3 x 0.5	16 x 0.20	40.1	0.4	1.8	5.1	36.4
4 x 0.5	16 x 0.20	40.1	0.4	1.8	5.5	44.1
5 x 0.5	16 x 0.20	40.1	0.4	1.8	6.1	52.4
7 x 0.5	16 x 0.20	40.1	0.4	1.8	6.6	68.0
19 x 0.5	16 x 0.20	40.1	0.4	1.8	11.0	180
2 x 0.6	19 x 0.20	33.7	0.6	2.2	5.6	39.5
3 x 0.6	19 x 0.20	33.7	0.6	2.2	6.0	47.8
4 x 0.6	19 x 0.20	33.7	0.6	2.2	6.5	57.8
5 x 0.6	19 x 0.20	33.7	0.6	2.2	7.5	75.2
7 x 0.6	19 x 0.20	33.7	0.6	2.2	8.2	96.7
19 x 0.6	19 x 0.20	33.7	0.6	2.2	13.2	243
2 x 0.75	24 x 0.20	26.7	0.6	2.3	5.8	43.7
3 x 0.75	24 x 0.20	26.7	0.6	2.3	6.2	53.4
4 x 0.75	24 x 0.20	26.7	0.6	2.3	6.7	65.0
5 x 0.75	24 x 0.20	26.7	0.6	2.3	7.8	84.2
7 x 0.75	24 x 0.20	26.7	0.6	2.3	8.5	109
19 x 0.75	24 x 0.20	26.7	0.6	2.3	13.7	275
2 x 0.93	19 x 0.25	21.6	0.6	2.4	6.0	48.8
3 x 0.93	19 x 0.25	21.6	0.6	2.4	6.4	60.2
4 x 0.93	19 x 0.25	21.6	0.6	2.4	7.0	73.7
5 x 0.93	19 x 0.25	21.6	0.6	2.4	8.1	95.1
7 x 0.93	19 x 0.25	21.6	0.6	2.4	8.8	124
19 x 0.93	19 x 0.25	21.6	0.6	2.4	14.2	314
2 x 1	32 x 0.20	20.0	0.6	2.5	6.2	51.9
3 x 1	32 x 0.20	20.0	0.6	2.5	6.6	64.1
4 x 1	32 x 0.20	20.0	0.6	2.5	7.6	84.9
5 x 1	32 x 0.20	20.0	0.6	2.5	8.4	101
7 x 1	32 x 0.20	20.0	0.6	2.5	9.1	132
19 x 1	32 x 0.20	20.0	0.6	2.5	14.7	334
2 x 1.34	19 x 0.30	15.0	0.6	2.7	6.6	62.0
3 x 1.34	19 x 0.30	15.0	0.6	2.7	7.0	77.5
4 x 1.34	19 x 0.30	15.0	0.6	2.7	8.1	102
5 x 1.34	19 x 0.30	15.0	0.6	2.7	8.9	122
7 x 1.34	19 x 0.30	15.0	0.6	2.7	9.7	161
2 x 1.5	30 x 0.25	13.7	0.6	2.8	6.8	66.0
3 x 1.5	30 x 0.25	13.7	0.6	2.8	7.6	89.1
4 x 1.5	30 x 0.25	13.7	0.6	2.8	8.3	109
5 x 1.5	30 x 0.25	13.7	0.6	2.8	9.2	131
7 x 1.5	30 x 0.25	13.7	0.6	2.8	10.0	172
2 x 2.5	50 x 0.25	8.21	0.7	3.4	8.4	104
3 x 2.5	50 x 0.25	8.21	0.7	3.4	8.9	131
4 x 2.5	50 x 0.25	8.21	0.7	3.4	9.8	162
5 x 2.5	50 x 0.25	8.21	0.7	3.4	11.2	204
7 x 2.5	50 x 0.25	8.21	0.7	3.4	12.2	269
2 x 4	56 x 0.30	5.09	0.8	4.2	10.0	153
3 x 4	56 x 0.30	5.09	0.8	4.2	11.1	205
4 x 4	56 x 0.30	5.09	0.8	4.2	12.1	253
5 x 4	56 x 0.30	5.09	0.8	4.2	13.5	311
7 x 4	56 x 0.30	5.09	0.8	4.2	14.8	412
2 x 6	84 x 0.30	3.39	0.8	4.8	11.6	216
3 x 6	84 x 0.30	3.39	0.8	4.8	12.4	276
4 x 6	84 x 0.30	3.39	0.8	4.8	13.8	350
5 x 6	84 x 0.30	3.39	0.8	4.8	15.8	444
7 x 6	84 x 0.30	3.39	0.8	4.8	17.2	588
2 x 10	77 x 0.40	1.95	1.0	6.4	15.0	350
3 x 10	77 x 0.40	1.95	1.0	6.4	16.6	468
4 x 10	77 x 0.40	1.95	1.0	6.4	18.2	581
5 x 10	77 x 0.40	1.95	1.0	6.4	19.9	693
7 x 10	77 x 0.40	1.95	1.0	6.4	21.8	926
2 x 16	119 x 0.40	1.24	1.2	7.8	18.4	532
3 x 16	119 x 0.40	1.24	1.2	7.8	19.6	681
4 x 16	119 x 0.40	1.24	1.2	7.8	21.4	840
5 x 16	119 x 0.40	1.24	1.2	7.8	23.7	1019
7 x 16	119 x 0.40	1.24	1.2	7.8	26.2	1382

**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**PLASTHERM® 80 °C**  
**PVC insulation**  
**PVC sheathing**  
**UL and cUL approval**



**Characteristics**  
**General**

- Continuous operating temperatures: -30 °C to +80 °C.
- Good resistance to common chemical environments.

**Electrical**

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

**Standard products**

- Single conductors: UL and cUL approved PVC insulated conductors ( $\geq 80$  °C).
- Standard outer sheath colours: black or grey.
- Stranding of conducting cores: contact us.

**Approvals - standards**

- UL approval as per standard UL 758 - File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 - File no.: E101965.
  - "Cable flame test" as per UL approval.
  - "FT1 flame rating" as per cUL approval.

**Applications**

- External or internal cabling for electrical appliances.

**Options**

- Electrical shielding: Tin-plated copper braid, or aluminium tape + continuity wire.
- Other outer sheath colours: contact us.
- Other nominal cross-sections: contact us.
- Other style nos. available: styles no. 20871, 21061, 21047, 2610, 2655, 2656, 20212, 20295, 2463, 20207, 21058.

**KEY**

Conducting metals

B Tin-plated copper

B\* Tin-plated copper ( $\varnothing > 0.38$  mm)

C Nickel-plated copper

D Silver-plated copper

E Nickel

F Bare copper

F\* Bare copper ( $\varnothing > 0.38$  mm)

G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse

AWM I A/B Internal wiring

AWM II A/B External or Internal wiring

NS Not Specified

VNS Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.

Only the average thickness of insulation or the sheathing should be taken into account.

For this product, please contact:

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LES CABLES DE L'EXTREME

**THERMOPLASTIC INSULATED WIRES AND CABLES**



1 • UL and cUL approved conductors with PVC insulation.  
2 • Outer sheath: PVC.

**Style no.**

**Approval**

**2464-Y80**

**80 °C - 300 V**  
**AWM II A/B**

No. of cond.	Nominal AWG	Nominal cross-section (mm²)	Nominal diameter* of the cond. (mm)	Nominal diameter* of the cable (mm)	Conducting metal	BCDEFG
2	26	0.13	1.25	4.0	2	5.7
3	26	0.13	1.25	4.2	2	6.1
4	26	0.13	1.25	4.5	2	6.6
5	26	0.13	1.25	4.9	2	7.2
7	26	0.13	1.25	5.3	2	7.8
2	24	0.22	1.4	4.3	2	5.9
3	24	0.22	1.4	4.5	2	6.3
4	24	0.22	1.4	4.9	2	6.8
5	24	0.22	1.4	5.3	2	7.5
7	24	0.22	1.4	5.7	2	8.1
2	22	0.34	1.5	4.5	2	6.1
3	22	0.34	1.5	4.8	2	6.5
4	22	0.34	1.5	5.1	2	7.1
5	22	0.34	1.5	5.6	2	7.7
7	22	0.34	1.5	6.0	2	8.4
2	-	0.5	1.75	5.0	2	6.4
3	-	0.5	1.75	5.3	2	6.8
4	-	0.5	1.75	5.7	2	7.4
5	-	0.5	1.75	6.2	2	8.1
7	-	0.5	1.75	6.8	2	8.9
2	20	0.6	1.75	5.0	2	6.7
3	20	0.6	1.75	5.3	2	7.1
4	20	0.6	1.75	5.7	2	7.8
5	20	0.6	1.75	6.2	2	8.5
7	20	0.6	1.75	6.8	2	9.3
2	-	0.75	1.9	5.3	2	6.8
3	-	0.75	1.9	5.6	2	7.2
4	-	0.75	1.9	6.1	2	7.9
5	-	0.75	1.9	6.7	2	8.7
7	-	0.75	1.9	7.2	2	9.5
2	18	0.93	2.0	5.5	2	7.1
3	18	0.93	2.0	5.8	2	7.6
4	18	0.93	2.0	6.3	2	8.3
5	18	0.93	2.0	6.9	2	9.1
7	18	0.93	2.0	7.5	2	9.9
2	-	1	2.1	5.7	2	7.1
3	-	1	2.1	6.1	2	7.6
4	-	1	2.1	6.6	2	8.3
5	-	1	2.1	7.2	2	9.1
7	-	1	2.1	7.8	2	9.9
2	16	1.34	2.3	6.1	2	7.5
3	16	1.34	2.3	6.5	2	8.0
4	16	1.34	2.3	7.1	2	8.8
5	16	1.34	2.3	7.7	2	9.6
7	16	1.34	2.3	8.4	2	10.5
2	-	1.5	2.4	6.3	2	7.7
3	-	1.5	2.4	6.7	2	8.2
4	-	1.5	2.4	7.3	2	9.0
5	-	1.5	2.4	8.0	2	9.9
7	-	1.5	2.4	8.7	2	10.8
2	14	-	2.7	6.9	2	8.4
3	14	-	2.7	7.4	2	9.0
4	14	-	2.7	8.0	2	9.8
5	14	-	2.7	8.8	2	10.8
7	14	-	2.7	9.6	2	11.9

**2570-Y80**

**80 °C - 600 or 1000 V**  
**AWM II A/B**

Conducting metal	BCDEFG	BCDEFG
2	5.7	5.7
2	6.1	6.1
2	6.6	6.6
2	7.2	7.2
2	7.6	7.6
2	8.0	8.0
2	8.8	8.8
2	9.6	9.6
2	10.5	10.5
2	7.7	7.7
2	8.2	8.2
2	9.0	9.0
2	9.9	9.9
2	10.8	10.8
2	11.9	11.9

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**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**PLASTHERM® 90 °C**  
*PVC insulation*  
*PVC sheathing*  
**UL and cUL approval**



**Characteristics**  
**General**

- Continuous operating temperatures: -30 °C to +90 °C.
- Good resistance to common chemical environments.

**Electrical**

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

**Standard products**

- Single conductors: UL and cUL approved PVC insulated conductors ( $\geq 90$  °C).
- Standard outer sheath colours: black or grey.
- Stranding of conducting cores: contact us.

**Approvals - standards**

- UL approval as per standard UL 758 - File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 - File no.: E101965.
- "Cable flame test" as per UL approval.
- "FT1 flame rating" as per cUL approval.

**Applications**

- External or internal cabling for electrical appliances.

**Options**

- Electrical shielding: Tin-plated copper braid, or aluminium tape + continuity wire.
- Other outer sheath colours: contact us.
- Other nominal cross-sections: contact us.
- Other style nos. available: styles no. 2549, 20132, 2550, 2653.

**KEY**

Conducting metals  
A Tin-plated copper  
B\* Tin-plated copper ( $\varnothing > 0.38$  mm)  
C Nickel-plated copper  
D Silverplated copper  
E Nickel  
F Bare copper  
F\* Bare copper ( $\varnothing > 0.38$  mm)  
G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
AWM I A/B Internal wiring  
AWM II A/B External or Internal wiring

NS Not Specified  
VNS Voltage Not Specified

■ UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.

Only the average thickness of insulation or the sheathing should be taken into account.

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**omerin**  
LES CABLES DE L'EXTREME

**THERMOPLASTIC INSULATED WIRES AND CABLES**

2

1

PLASTHERM 90C 300V 2654 AWM



1 • UL and cUL approved conductors with PVC insulation.

2 • Outer sheath: PVC.

**Style no.**

**2654-Y90**

**Approval**

**90 °C - 300 V**

**AWM II A/B**

No. of cond.	Nominal cross-section	Nominal diameter* of the cond. (mm)	Nominal diameter* of the cable (mm)	Nominal diameter* of the cond. (mm)	Nominal diameter* of the cable (mm)
2	26	0.13	1.2	3.9	5.7
3	26	0.13	1.2	4.1	6.1
4	26	0.13	1.2	4.4	6.6
5	26	0.13	1.2	4.8	7.2
7	26	0.13	1.2	5.1	7.8
2	24	0.22	1.4	4.3	5.9
3	24	0.22	1.4	4.5	6.3
4	24	0.22	1.4	4.9	6.8
5	24	0.22	1.4	5.3	7.5
7	24	0.22	1.4	5.7	8.1
2	22	0.34	1.6	4.7	6.1
3	22	0.34	1.6	5.0	6.5
4	22	0.34	1.6	5.4	7.1
5	22	0.34	1.6	5.8	7.7
7	22	0.34	1.6	6.3	8.4
2	-	0.5	1.7	4.9	6.4
3	-	0.5	1.7	5.2	6.8
4	-	0.5	1.7	5.6	7.4
5	-	0.5	1.7	6.1	8.1
7	-	0.5	1.7	6.6	8.9
2	20	0.6	1.8	5.1	6.7
3	20	0.6	1.8	5.4	7.1
4	20	0.6	1.8	5.9	7.8
5	20	0.6	1.8	6.4	8.5
7	20	0.6	1.8	6.9	9.3
2	-	0.75	1.9	5.3	6.8
3	-	0.75	1.9	5.6	7.2
4	-	0.75	1.9	6.1	7.9
5	-	0.75	1.9	6.7	8.7
7	-	0.75	1.9	7.2	9.5
2	18	0.93	2.05	5.6	7.1
3	18	0.93	2.05	5.9	7.6
4	18	0.93	2.05	6.5	8.3
5	18	0.93	2.05	7.1	9.1
7	18	0.93	2.05	7.7	9.9
2	-	1	2.1	5.7	7.1
3	-	1	2.1	6.1	7.6
4	-	1	2.1	6.6	8.3
5	-	1	2.1	7.2	9.1
7	-	1	2.1	7.8	9.9
2	16	1.34	2.3	6.1	7.5
3	16	1.34	2.3	6.5	8.0
4	16	1.34	2.3	7.1	8.8
5	16	1.34	2.3	7.7	9.6
7	16	1.34	2.3	8.4	10.5
2	-	1.5	2.4	6.3	7.7
3	-	1.5	2.4	6.7	8.2
4	-	1.5	2.4	7.3	9.0
5	-	1.5	2.4	8.0	9.9
7	-	1.5	2.4	8.7	10.8
2	14	-	2.7	6.9	8.4
3	14	-	2.7	7.4	9.0
4	14	-	2.7	8.0	9.8
5	14	-	2.7	8.8	10.8
7	14	-	2.7	9.6	11.9

**Conducting metal**

**BCDEFG**

**BCDEFG**

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HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS

# PLASTHERM® 105 °C

*PVC insulation*  
*PVC sheathing*  
**UL and cUL approval**



## 2

## 1



1 • UL and cUL approved conductors with PVC insulation.  
2 • Outer sheath: PVC.

### Characteristics

#### General

- Continuous operating temperatures: -30 °C to +105 °C.
- Good resistance to common chemical environments.

#### Electrical

- Rated voltage: as per style no.
- Test voltage: 10 x Rated voltage.

### Standard products

- Single conductors: UL and cUL approved PVC insulated conductors ( $\geq 105$  °C).
  - Outer sheath colours: black or grey.
- Stranding of conducting cores: contact us.

### Approvals - standards

- UL approval as per standard UL 758 - File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 - File no.: E101965.
  - "Cable flame test" as per UL approval.
  - "FT1 flame rating" as per cUL approval.

### Applications

- External or internal cabling for electrical appliances.
- Options
  - Electrical shielding: Tin-plated copper braid, or aluminium tape + continuity wire.
  - Other outer sheath colours: contact us.
  - Other nominal cross-sections: contact us.
- Other style nos. available: styles no. 2589, 2661, 2662, 2501, 2516, 2907, 20155, 20213, 20214, 20811, 20883, 20903.
- Vertical flame test VW-1 for styles 2517 300V, 2586 600V and 2586 1000 V: please consult us.

### KEY

A	Conducting metals
B	Tin-plated copper
B*	Tin-plated copper ( $\varnothing > 0.38$ mm)
C	Nickel-plated copper
D	Silverplated copper
E	Nickel
F	Bare copper
F*	Bare copper ( $\varnothing > 0.38$ mm)
G	Nickel-plated copper 27%

AWM I A	Internal wiring, not subject to mechanical abuse
AWM I A/B	Internal wiring
AWM II A/B	External or Internal wiring
NS	Not Specified
VNS	Voltage Not Specified

■: UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.

Only the average thickness of insulation or the sheathing should be taken into account.

For this product, please contact:

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## THERMOPLASTIC INSULATED WIRES AND CABLES

Conducting metal BCDEFG

Conducting metal BCDEFG

Conducting metal BCDEFG

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**omerin**  
LES CABLES DE L'EXTREME

# PLASTHERM® 90 °C

## Polyolefin insulation

### UL and cUL approval



#### Characteristics General

- Continuous operating temperatures: -20 °C to +90 °C.
- Good resistance to chemical influences.

#### Electrical

- Rated voltage: 600 V.
- Test voltage: 6,000 V.

#### Standard products

- All colours including two-coloured.
- Stranding of conducting cores: contact us.

#### Approvals - standards

- UL approval as per standard UL758 and cUL approval (CSA) as per standard C22.2 No. 210, File no. E101 965.
- "Horizontal flame test" as per UL758 standard.

#### Applications

- Internal cabling for electrical appliances.

#### Options

- Other nominal cross-sections: contact us.

#### KEY

conducting metals  
 B Tin-plated copper  
 B\* Tin-plated copper ( $\varnothing > 0.38$  mm)  
 C Nickel-plated copper  
 D Silverplated copper  
 E Nickel  
 F Bare copper  
 F\* Bare copper ( $\varnothing > 0.38$  mm)  
 G Nickel-plated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
 AWM I A/B Internal wiring  
 AWM II A/B External or Internal wiring

NS Not Specified  
 VNS Voltage Not Specified

■ : UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.

Only the average thickness of insulation should be taken into account.



1 • Bare or tin-plated copper core.  
 2 • Insulation: polyolefin.

Style no. 10900

#### Approval

90 °C - 600 V

AWM I A/B

AWG	Nominal cross-section (mm <sup>2</sup> )	Average thickness of insulation (mm)	Nominal diameter* (mm)
30	0.05	0.38	1.1
28	0.09	0.38	1.1
26	0.13	0.38	1.2
24	0.22	0.38	1.4
22	0.34	0.38	1.5
-	0.5	0.38	1.7
20	0.6	0.38	1.75
-	0.75	0.38	1.9
18	0.93	0.38	2.0
-	1	0.76	2.9
16	1.34	0.76	3.0
-	1.5	0.76	3.1
14	-	0.76	3.4
-	2.5	0.76	3.6
12	-	0.76	3.9
-	4	0.76	4.2
10	-	0.76	4.5
-	6	0.76	4.7
8	-	0.76	5.5
-	10	0.76	6.1
6	-	0.76	6.9
-	16	0.76	7.2
4	-	0.76	8.1
-	25	0.76	8.6
2	35	0.76	9.7
1	-	1.52	12.4
-	50	1.52	12.8
1/0	-	1.52	13.5
2/0	70	1.52	14.6
3/0	-	1.52	16.2
-	95	1.52	16.3
4/0	-	1.52	18.1

Conducting metal

BF

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 LES CABLES DE L'EXTREME

# PLASTHERM® PHF2

## Halogen-free insulation flame retardant

**-40 °C to +105 °C**

### Approvals - standards

- Resistance to vertical flame propagation for a single insulated wire. IEC 60332-1-2 / NF C 32-070 test C2
- Tests on electric cables under fire conditions as per IEC 60332-3-22 (category A): ISSEP test reports no. 1524/2015
- Classification C1 as per NF C 32-070 test no. 1 (LCIE report no. 12/108571-616378A)
- Halogen-free, low corrosivity and acidity of gases evolved during combustion: EN 60754-1 and EN 60754-2
- Low smoke opacity: EN 61034-2

### Applications

- Internal cabling for electrical and electronic appliances

### Characteristics General

- Continuous operating temperatures: -40 °C to +105 °C.
- Halogen-free, flame retardant, low toxicity, corrosivity and smoke opacity
- Good flexibility and mechanical strength, excellent resistance to abrasion.

### Electrical

- Rated voltage: 600/1 000 V.
- Test voltage: 3 000 V.

### Standard products

- All solid colours + two-coloured yellow/green

### Options

- Solid bare copper core, class 1 as per IEC 60228: ref. PHF2R, see table below).
- American cross-sections AWG: Contact us

### PLASTHERM PHF2 and PHF2E

#### Flexible core • class 5 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)		Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
		PHF2	PHF2E			
0.5	16 x 0.20	39.0	40.1	0.6	2.20	9.1
0.75	24 x 0.20	26.0	26.7	0.6	2.40	11.9
1	32 x 0.20	19.5	20.0	0.7	2.70	15.2
1.5	30 x 0.25	13.3	13.7	0.8	3.10	22.3
2.5	50 x 0.25	7.98	8.21	0.8	3.60	33.4
4	56 x 0.30	4.95	5.09	0.9	4.30	50.1
6	84 x 0.30	3.30	3.39	0.9	5.00	72.5
10	80 x 0.40	1.91	1.95	0.9	6.10	113
16	126 x 0.40	1.21	1.24	1.0	7.10	170
25	196 x 0.40	0.78	0.795	1.0	8.70	256
35	276 x 0.40	0.554	0.565	1.1	10.3	364
50	396 x 0.40	0.386	0.393	1.1	12.1	510
70	360 x 0.50	0.272	0.277	1.1	13.9	692
95	485 x 0.50	0.206	0.210	1.4	16.6	972
120	608 x 0.50	0.161	0.164	1.4	18.2	1202
150	756 x 0.50	0.129	0.132	1.6	20.2	1503
185	944 x 0.50	0.106	0.108	1.6	22.4	1849
240	1221 x 0.50	0.0801	0.0817	1.8	25.4	2376
300	1525 x 0.50	0.0641	0.0654	1.8	27.6	2909

#### Option: PLASTHERM PHF2R

#### Solid core • class 1 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.5	1 x 0.80	36.0	0.6	2.00	9.35
0.75	1 x 0.98	24.5	0.6	2.20	12.2
1	1 x 1.13	18.1	0.7	2.60	15.1
1.5	1 x 1.38	12.1	0.7	2.80	21.6
2.5	1 x 1.77	7.41	0.8	3.40	32.1
4	1 x 2.24	4.61	0.8	4.00	48.7

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356 PLASTHERM PHF2 1000 VOLT 1.5mm

- Flexible bare copper (PHF2) or tin-plated (PHF2E) core – Class 5 as per IEC 60228.
- Halogen-free, flame-retardant thermoplastic insulation.

### Standard products

- All solid colours + two-coloured yellow/green

### INSULATED WIRE OR CABLE

Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.6	2.20	9.1
0.6	2.40	11.9
0.7	2.70	15.2
0.8	3.10	22.3
0.8	3.60	33.4
0.9	4.30	50.1
0.9	5.00	72.5
0.9	6.10	113
1.0	7.10	170
1.0	8.70	256
1.1	10.3	364
1.1	12.1	510
1.1	13.9	692
1.4	16.6	972
1.4	18.2	1202
1.6	20.2	1503
1.6	22.4	1849
1.8	25.4	2376
1.8	27.6	2909

### INSULATED WIRE OR CABLE

Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.6	2.00	9.35
0.6	2.20	12.2
0.7	2.60	15.1
0.7	2.80	21.6
0.8	3.40	32.1
0.8	4.00	48.7

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LES CABLES DE L'EXTREME

# PLASTHERM® PHF2E IRD

*Halogen-free,  
flame-retardant insulation  
with reduced walls  
-40 °C to +105 °C*

## Approvals - standards

- Resistance to vertical flame propagation for a single insulated wire. IEC 60332-1-2 / NF C 32-070 test C2
- Halogen-free, low corrosivity and acidity of gases evolved during combustion: EN 60754-1 and EN 60754-2
- Low smoke opacity: EN 61034-2

## Applications

- Internal cabling for electrical and electronic appliances

## Characteristics

### General

- Continuous operating temperatures: -40 °C to +105 °C.
- Halogen-free, flame retardant, low toxicity, corrosivity and smoke opacity
- Good flexibility and mechanical strength, excellent resistance to abrasion.

### Electrical

- Rated voltage: 250 V.
- Test voltage: 1 500 V.

## Standard products

- All solid colours
- Surface marking (except AWG24)

## PLASTHERM PHF2E IRD

### Concentric tin-plated copper core

Nominal cross-section (mm <sup>2</sup> )	Equivalent cross-section AWG	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)
0.22	24	7 x 0.20	92.5
0.34	22	7 x 0.25	59.2
0.6	20	19 x 0.20	33.7
0.93	18	19 x 0.25	21.6
1.34	16	19 x 0.30	15.0

### INSULATED WIRE OR CABLE

Nominal thickness of insulation (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
0.25	1.10	2.9
0.25	1.30	4.4
0.40	1.75	7.6
0.40	2.00	11.1
0.45	2.35	15.9

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LES CABLES DE L'EXTREME

# PLASTHERM® PHFLEX

**Cable resistant to  
alternate bending,  
halogen-free insulation  
-35 °C to +90 °C**

3 2 1



1 • Flexible tin-plated copper core – Class 6 as per IEC 60228.  
2 • Halogen-free, flame-retardant thermoplastic insulation.  
3 • Halogen-free, flame-retardant thermoplastic insulation.

## Aprovals - standards

As per EN 45545-2

- Resistance to vertical flame propagation for a single insulated wire as per EN 60332-1-2 report LAPI n° 1477.0CI0010/21.
- Low smoke opacity as per standard EN 61034-2 LAPI n° 1477.0CI0260/21.
- Tests on electric cables under fire conditions as per EN 50305 LAPI n° 1477.1CI0120/21.

## Applications

- Cabling for electrical systems requiring high cable flexibility and specific conditions of use (fire, smoke, mechanical fatigue) for railway rolling stock.

## Characteristics

### General

- Continuous operating temperatures: -35 °C to +90 °C.
- Halogen-free, flame retardant, low smoke toxicity and opacity
- Excellent flexibility and resistance to alternate bending, excellent resistance to abrasion.

### Electrical

- Rated voltage: 450 / 750 V.
- Test voltage: 2 500 V.

## Standard products

- Dual layer insulation.
- Solid inner layer, black outer layer or dual-colour yellow/green.

## PLASTHERM PHFLEX

### Extra-flexible core - class 6 as per IEC 60228

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)
0.5	105 x 0.08	40.1
0.75	152 x 0.08	26.7
1	210 x 0.08	20.0
1.5	192 x 0.10	13.7

### INSULATED WIRE OR CABLE

Nominal thickness of insulation (mm)	Nominal diameter (mm)	Minimum bending radius (mm)
0.6	2.20	10
0.6	2.50	20
0.7	2.70	40
0.8	3.30	50

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LES CABLES DE L'EXTREME

**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**PLASTHERM®  
Style 21209**  
**Polyurethane sheathing  
UL and cUL approval**



**Characteristics**  
**General**

- Continuous operating temperatures: -20 °C to +90 °C.
- Excellent resistance to common chemical environments.
- Excellent mechanical strength and resistance to abrasion.

**Electrical**

- Rated voltage: 125 to 1 000 V according to style no. of single conductors used.
- Test voltage: 10 x Rated voltage.

**Standard products**

- Single conductors: UL and cUL approved PVC insulated conductors ( $\geq 90$  °C -125 °C at 1 000 V).
  - Standard outer sheath colour: black.
- Stranding of conducting cores: contact us.

**Approvals - standards**

- UL approval as per standard UL 758 - File no.: E101965.
- cUL approval (CSA) as per standard C22.2 No. 210 - File no.: E101965.
  - "Cable flame test" as per UL approval.
  - "FT1 flame rating" as per cUL approval.

**Applications**

- External or internal cabling for electrical appliances.

**Options**

- Other outer sheath colours: contact us.
- Other nominal cross-sections: contact us.

**KEY**

conducting metals  
**A** Tin-plated copper  
**B** Tin-plated copper ( $\varnothing > 0.38$  mm)  
**C** Nickelplated copper  
**D** Silver-plated copper  
**E** Nickel  
**F** Bare copper  
**F\*** Bare copper ( $\varnothing > 0.38$  mm)  
**G** Nickelplated copper 27 %

AWM I A Internal wiring, not subject to mechanical abuse  
 AWM I A/B Internal wiring  
 AWM II A/B External or Internal wiring  
 NS Not Specified  
 VNS Voltage Not Specified  
 ■ : UL approved nominal cross-sections only.

\* The diameter is provided for information purposes as it may vary depending on the stranding of the core.  
 Only the average thickness of insulation or the sheathing should be taken into account.

For this product, please contact:

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LES CABLES DE L'EXTREME

**THERMOPLASTIC INSULATED WIRES AND CABLES**



1 • UL approved conductors.  
 2 • Outer sheath: Polyurethane

Style no.			21209-E90		21209-W12		21209-F90	
Approval Single conductor style no.			90 °C - 300 V Style 10125 AWM I/II A/B		90 °C - 600 V Style 10900 AWM I/II A/B		90 °C - 1,000 V Style 10203 AWM I/II A/B	
No. of cond.	AWG	Nominal cross-section (mm <sup>2</sup> )	Nominal diameter* of the cond. (mm)	Nominal diameter* of the cable (mm)	Nominal diameter* of the cond. (mm)	Nominal diameter* of the cable (mm)	Nominal diameter* of the cond. (mm)	Nominal diameter* of the cable (mm)
2	26	0.13	0.75	3.1	1.2	4.0	1.5	4.6
3	26	0.13	0.75	3.2	1.2	4.1	1.5	4.8
4	26	0.13	0.75	3.4	1.2	4.5	1.5	5.2
5	26	0.13	0.75	3.6	1.2	4.8	1.5	5.6
7	26	0.13	0.75	3.8	1.2	5.2	1.5	6.1
2	24	0.22	0.9	3.4	1.4	4.4	1.65	4.9
3	24	0.22	0.9	3.5	1.4	4.6	1.65	5.1
4	24	0.22	0.9	3.7	1.4	4.9	1.65	5.5
5	24	0.22	0.9	4.0	1.4	5.4	1.65	6.0
7	24	0.22	0.9	4.3	1.4	5.8	1.65	6.5
2	22	0.34	1.05	3.7	1.5	4.6	1.8	5.2
3	22	0.34	1.05	3.8	1.5	4.8	1.8	5.4
4	22	0.34	1.05	4.1	1.5	5.2	1.8	5.9
5	22	0.34	1.05	4.4	1.5	5.6	1.8	6.4
7	22	0.34	1.05	4.7	1.5	6.1	1.8	7.0
2	-	0.5	1.25	4.1	1.7	5.0	1.95	5.5
3	-	0.5	1.25	4.2	1.7	5.2	1.95	5.8
4	-	0.5	1.25	4.6	1.7	5.7	1.95	6.3
5	-	0.5	1.25	4.9	1.7	6.2	1.95	6.8
7	-	0.5	1.25	5.3	1.7	6.7	1.95	7.4
2	20	0.6	1.3	4.2	1.75	5.1	2	5.6
3	20	0.6	1.3	4.4	1.75	5.3	2	5.9
4	20	0.6	1.3	4.7	1.75	5.8	2	6.4
5	20	0.6	1.3	5.1	1.75	6.3	2	7.0
7	20	0.6	1.3	5.5	1.75	6.8	2	7.6
2	-	0.75	1.4	4.4	2.0	5.6	2.1	5.8
3	-	0.75	1.4	4.6	2.0	5.9	2.1	6.1
4	-	0.75	1.4	4.9	2.0	6.4	2.1	6.6
5	-	0.75	1.4	5.4	2.0	7.0	2.1	7.3
7	-	0.75	1.4	5.8	2.0	7.6	2.1	7.9
2	18	0.93	1.55	4.7	2.1	5.8	2.25	6.1
3	18	0.93	1.55	4.9	2.1	6.1	2.25	6.4
4	18	0.93	1.55	5.3	2.1	6.6	2.25	7.0
5	18	0.93	1.55	5.8	2.1	7.3	2.25	7.7
7	18	0.93	1.55	6.2	2.1	7.9	2.25	8.3
2	-	1	1.65	4.9	2.9	7.4	2.3	6.2
3	-	1	1.65	5.1	2.9	7.8	2.3	6.5
4	-	1	1.65	5.5	2.9	8.6	2.3	7.1
5	-	1	1.65	6.0	2.9	9.4	2.3	7.8
7	-	1	1.65	6.5	2.9	10.3	2.3	8.5
2	16	1.34	1.9	5.4	3.0	7.6	2.5	6.6
3	16	1.34	1.9	5.6	3.0	8.0	2.5	6.9
4	16	1.34	1.9	6.1	3.0	8.8	2.5	7.6
5	16	1.34	1.9	6.7	3.0	9.7	2.5	8.3
7	16	1.34	1.9	7.3	3.0	10.6	2.5	9.1
2	-	1.5	2	5.6	3.1	7.8	2.55	6.7
3	-	1.5	2	5.9	3.1	8.2	2.55	7.0
4	-	1.5	2	6.4	3.1	9.0	2.55	7.7
5	-	1.5	2	7.0	3.1	10.0	2.55	8.5
7	-	1.5	2	7.6	3.1	10.9	2.55	9.2
2	14	-	2.25	6.1	3.4	8.4	2.9	7.4
3	14	-	2.25	6.4	3.4	8.9	2.9	7.8
4	14	-	2.25	7.0	3.4	9.8	2.9	8.6
5	14	-	2.25	7.7	3.4	10.8	2.9	9.4
7	14	-	2.25	8.3	3.4	11.8	2.9	10.3

Conducting metal

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BCDF

BCDF

BCDF

BCDF

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**HIGH TEMPERATURE WIRES AND CABLES  
FOR THE GENERAL MARKET • SECTION II:  
FLUOROPOLYMERS AND THERMOPLASTICS**

**THERMOPLASTIC INSULATED WIRES AND CABLES**

# PLASTHERM® MYBE-EY-CSI

**-20 °C to +80 °C  
INTRINSIC SAFETY**

## Applications

- Cable intended for instrumentation and control, for fixed intrinsic safety circuit installations.

## Options

- Insulation and/or outer sheath made of PVC 105 °C: contact us.
- Other nominal cross-sections: contact us.
  - Other nominal stranding: contact us.
- Other numbers of conductors: contact us.

## Characteristics

### General

- Continuous operating temperatures: -20 °C to +80 °C.
- Good resistance to thermal shock.
- Good mechanical strength.
- Good resistance to common chemical environments and hydrocarbons (except aromatic).

### Electrical

- Rated voltage: 600/1 000 V.
- Test voltage: 3 000 V.

## Other characteristics

- Flame retardant: Category C2 cables (NF C 32-070 and IEC 60 332-1)
- Overlapping of electrical shield ≥ 60 %

## Standard products

- Standard conductor colours: black with white numbers.
- Standard outer sheath colour: blue.

## Identification

Multi-conductor cables without an earth wire are identified as follows:

< Number of conductors > X < Cross-section > (mm<sup>2</sup>) (example: 3 X 0.75 mm<sup>2</sup>).

Multi-conductor cables with an earth wire are identified by the symbol G in the place of the X (example 3 G 0.75 mm<sup>2</sup>).

Flexible core • class 5 as per IEC 60228			INSULATED CONDUCTORS		SHEATHED CABLE	
Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20 °C (Ω/km)	Nominal thickness of insulation (mm)	Nominal diameter (mm)	Nominal diameter (mm)	Approximate linear weight (kg/km)
2 x 0.75	24 x 0.20	26.7	0.6	2.35	7.3	75
3 x 0.75	24 x 0.20	26.7	0.6	2.35	7.7	95
4 x 0.75	24 x 0.20	26.7	0.6	2.35	8.3	105
5 x 0.75	24 x 0.20	26.7	0.6	2.35	9.0	125
7 x 0.75	24 x 0.20	26.7	0.6	2.35	9.6	160
12 x 0.75	24 x 0.20	26.7	0.6	2.35	12.9	240
19 x 0.75	24 x 0.20	26.7	0.6	2.35	15.1	350
27 x 0.75	24 x 0.20	26.7	0.6	2.35	17.9	495
37 x 0.75	24 x 0.20	26.7	0.6	2.35	15.4	655
48 x 0.75	24 x 0.20	26.7	0.6	2.35	18.5	837
61 x 0.75	24 x 0.20	26.7	0.6	2.35	20.9	1053

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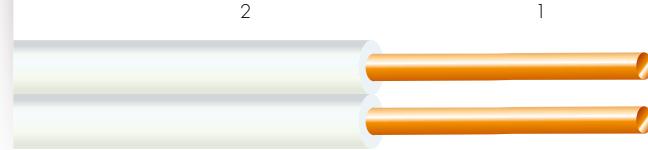
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LES CABLES DE L'EXTREME

# PLASTHERM® HP-U

## 2-conductor flat cable

### Thin insulation

### -20 °C to +80 °C



1 • Solid bare copper core.  
2 • Insulation: PVC.

#### Applications

- Internal cabling for electric, electronic, audio and video appliances.

#### Options

- Tin-plated copper core.
- Other nominal cross-sections: contact us.
- Identification using a coloured longitudinal stripe on one of the two conductors: contact us.

#### Characteristics

##### General

- Continuous operating temperatures: -20°C to +80°C.
- Compact design with thin insulation.
- Easy stripping and separating of conductors.

##### Electrical

- Rated voltage: 400 V.
- Test voltage: 4000 V.

#### Standard products

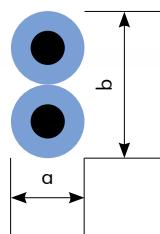
- All colours including two-coloured.

#### SOLID CORE

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20°C (Ω/km) (bare copper core)
2 x 0.20	1 x 0.50	93.1
2 x 0.28	1 x 0.60	64.7
2 x 0.38	1 x 0.70	36.0
2 x 1.00	1 x 1.13	18.1

#### INSULATED WIRE

Nominal outer Dimensions (mm)	a	b	Approximate linear weight (kg/km)
1.2		2.7	0.6
1.4		3.0	0.85
1.75		4.0	1.2
2.4		5.1	2.8



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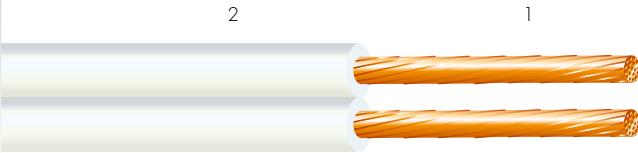
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# PLASTHERM® HP-M

## 2-conductor flat cable

### Thin insulation

### -20 °C to +80 °C



1 • Flexible bare copper core.  
2 • Insulation: PVC.

#### Applications

- Internal cabling for electric, electronic, audio and video appliances.

#### Options

- Tin-plated copper core.
- Other nominal cross-sections: contact us.
- Identification using a coloured longitudinal stripe on one of the two conductors: contact us.

#### Characteristics

##### General

- Continuous operating temperatures: -20°C to +80°C.
- Compact design with thin insulation.
- Easy stripping and separating of conductors.

##### Electrical

- Rated voltage: 400 V.
- Test voltage: 4000 V.

#### Standard products

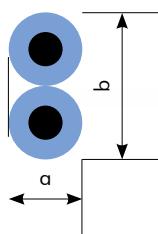
- All colours including two-coloured.

#### FLEXIBLE CORE

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20°C (Ω/km) (bare copper core)
2 x 0.38	12 x 0.20	52.0
2 x 0.50	16 x 0.20	39.0
2 x 0.75	24 x 0.20	26.0
2 x 1	32 x 0.20	19.5
2 x 1.5	30 x 0.20	13.3
2 x 2.5	49 x 0.20	7.98

#### INSULATED CABLE

Nominal outer Dimensions (mm)	a	b	Approximate linear weight (kg/km)
1.3		3.0	0.95
1.6		3.6	1.3
2.2		4.5	2.0
2.5		5.2	2.8
3.0		6.2	4.0
3.7		7.8	6.3



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LES CABLES DE L'EXTREME

# PLASTHERM® HP-M-HT

## 2-conductor flat cable

### Thin insulation

### -20 °C to +105 °C

## THERMOPLASTIC INSULATED WIRES AND CABLES

2 1



1 • Flexible bare copper core.  
2 • Insulation: PVC 105°C.

**Applications**

- Internal cabling for electric, electronic, audio and video appliances.

**Options**

- Tin-plated copper core.
- Other nominal cross-sections: contact us.
- Identification using a coloured longitudinal stripe on one of the two conductors: contact us.

**Characteristics****General**

- Continuous operating temperatures: -20°C to +105°C.
- Compact design with thin insulation.
- Easy stripping and separating of conductors.

**Electrical**

- Rated voltage: 400 V.
- Test voltage: 4000 V.

**Standard products**

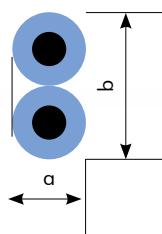
- All colours including two-coloured.

**FLEXIBLE CORE**

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Maximum linear resistance at 20°C (Ω/km) (bare copper core)
2 x 0.38	12 x 0.20	52.0
2 x 0.50	16 x 0.20	39.0
2 x 0.75	24 x 0.20	26.0
2 x 1	32 x 0.20	19.5
2 x 1.5	30 x 0.20	13.3
2 x 2.5	49 x 0.20	7.98

**INSULATED CABLE**

Nominal outer Dimensions (mm)	a	b	Approximate linear weight (kg/km)
1.3		3.0	0.95
1.6		3.6	1.3
2.2		4.5	2.0
2.5		5.2	2.8
3.0		6.2	4.0
3.7		7.8	6.3



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FLUOROPOLYMERS AND THERMOPLASTICS

THERMOPLASTIC INSULATED WIRES AND CABLES

# PLASTHERM® 41

**-40°C to +125°C**



1 • Flexible bare copper core (other metal in option) – according to IEC 60228.  
2 • Special thermoplastic elastomer.

## Approvals - standards

- Flame resistance: meets UL758 VW-1 test.

## Applications

- Industry: industrial wiring in hot atmospheres.
- Household electrical appliances: wiring of household heating appliances.
- Electronics: wiring of measuring devices and systems.

## Options

- Tin-plated, nickel-plated or silver-plated copper core.
  - Other nominal cross-sections: contact us.
  - Other nominal stranding: contact us.
  - Other colour of insulation: contact us.

## Characteristics

### General

- Continuous operating temperatures: -40°C to +125°C.

### Electrical

- Rated voltage: 300 V.
- Test voltage: 3000 V.

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Nominal wall thickness of insulation (mm)	Nominal external diameter (mm)	Maximum linear resistance at 20 °C (Ω/km)
0.22	7x0.20	0.25	1.15	89.9
0.34	7x0.25	0.25	1.30	57.5
0.5	16x0.20	0.30	1.50	39.0
0.75	24x0.20	0.30	1.80	26.0
1	32x0.20	0.35	2.00	19.5
1.5	30x0.25	0.40	2.40	13.3
2.5	50x0.25	0.40	2.90	7.98

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LES CABLES DE L'EXTREME

# PLASTHERM® E43

**-40°C to +150°C**



1 • Flexible tin-plated copper core (other metal in option) – according to IEC 60228.  
2 • Special thermoplastic elastomer.

## Applications

- Industry: industrial wiring in hot atmospheres.
- Household electrical appliances: wiring of household heating appliances.
- Electronics: wiring of measuring devices and systems.

## Options

- Bare, nickel-plated or silver-plated copper core.
- Other nominal cross-sections: contact us.
  - Other nominal stranding: contact us.
  - Other colour of insulation: contact us.
- Canadian cUL approval (CSA) as per standard C22.2 No. 210 - File no.: E101965 (cross section 0.22mm<sup>2</sup> and 0.34mm<sup>2</sup>)

## Characteristics

### General

- Continuous operating temperatures: -40°C to +150°C.
- Excellent resistance to abrasion.
- Good resistance to chemical aggression.
- Halogen free.

### Electrical

- Rated voltage: 600 V.
- Test voltage: 6000 V.

Nominal cross-section (mm <sup>2</sup> )	Nominal stranding	Nominal wall thickness of insulation (mm)	Nominal external diameter (mm)	Maximum linear resistance at 20 °C (Ω/km)
0.22	7x0.20	0.15	0.95	92.5
0.34	7x0.25	0.15	1.10	59.2
0.5	16x0.20	0.20	1.35	40.1
0.75	24x0.20	0.20	1.60	26.7
1	32x0.20	0.25	1.90	20.0
1.5	30x0.25	0.30	2.20	13.7
2.5	50x0.25	0.30	2.70	8.21

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