

# PARALLEL HEATING CABLES

Electric radiant floor heating, trace heating for pipes, snow melting systems, drum heating

*Elementos*  
**as**  
*Calefactores*



Flexible heating systems



PARALLEL HEATING CABLES – SERIES HEATING CABLES – HEATING MATS – HEATING BLANKETS  
CRANKCASE HEATERS – TEMPERATURE CONTROL SYSTEMS – HEATING COMPLEMENTS

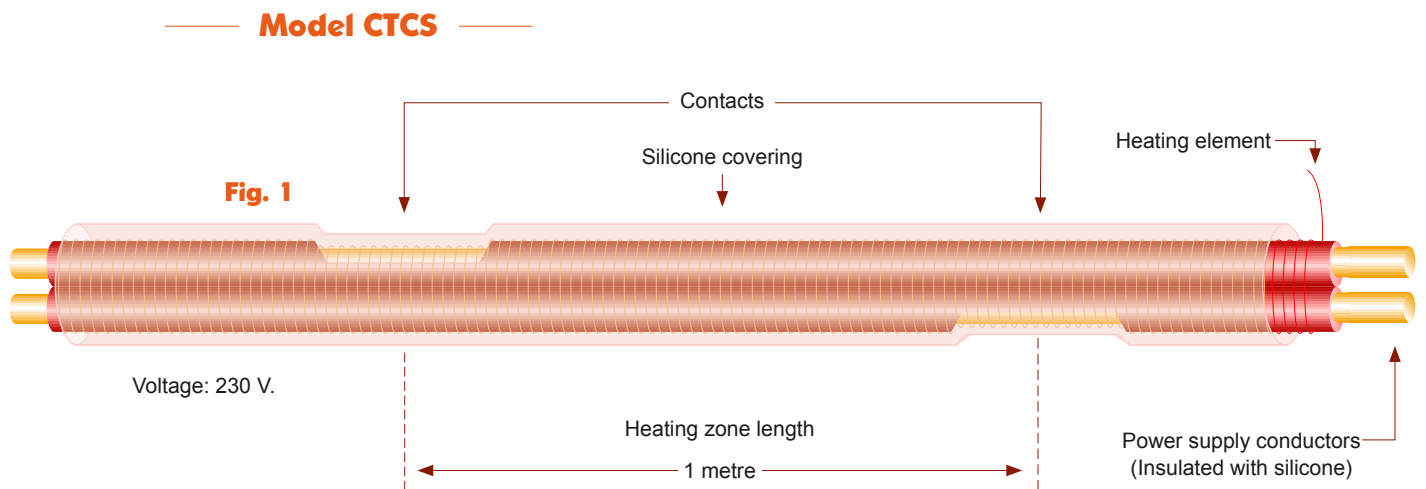
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## Parallel heating cable - Model CTCS

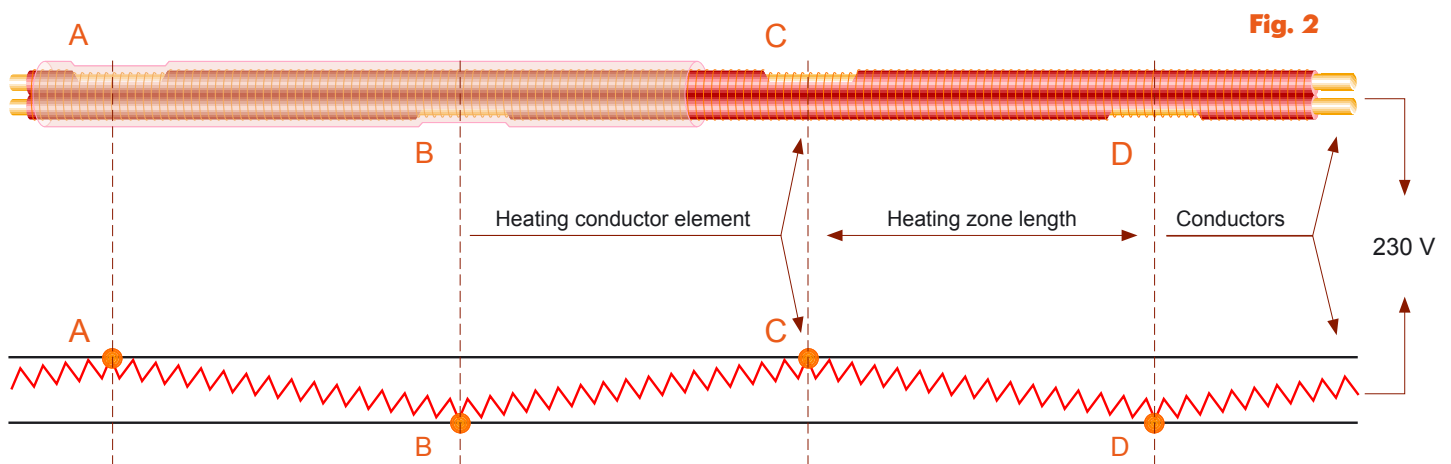
The parallel heating cable, model **CTCS**, provides constant power per lineal metre, that allows to be cut-to-length and finished on site. The heating element it's coiled around the two conductors. The two conductors are insulated from the heating element except at certain contact interval points.

The cable forms a system of many resistances in parallel, and each resistance is independent from the others. The two conductors supply power to these resistances.

The **CTCS**, is suitable to all the situations where electric heating is needed: Electric radiant floor, electric trace heating for pipes, de-ice systems, drum heating, snow melting systems, etc.



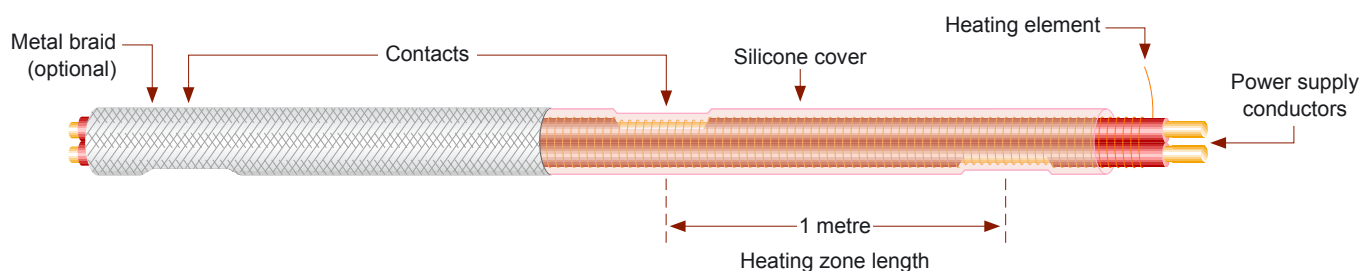
When voltage is applied to the two conductors, the heating conductor receives the same voltage between points of contact: A - B, B - C, C - D, etc. This ensures that the power per linear metre of cable is constant and independent of its length.



## Models CTCS75 and CTCSM75

### Constant power - Silicone insulation

<b>Catalogue number:</b>	CTCS75/25 - CTCSM75/25 and CTCS75/30 - CTCSM75/30
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.



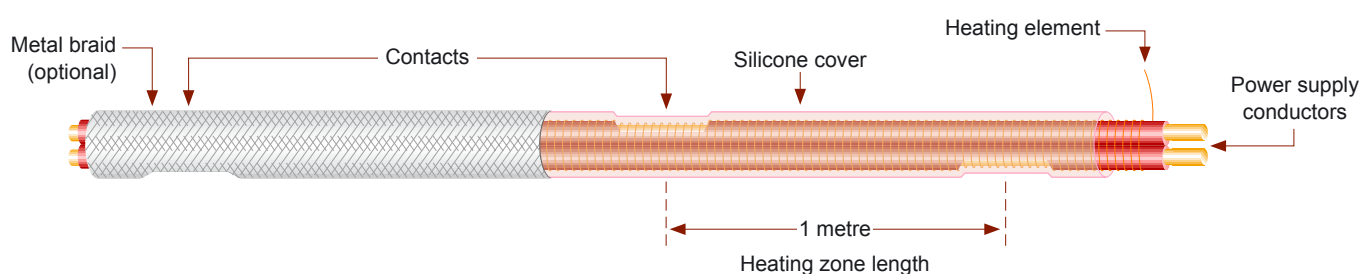
Catalogue number	CTCS75/25	CTCSM75/25	CTCS75/30	CTCSM75/30
<b>Power output at 230 V (W/m):</b>	25 W	25 W	30 W	30 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper Sn - 1 mm <sup>2</sup> )	Without metal braid	90% of covering (copper Sn - 1 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	60°C (connected)	60°C (connected)	60°C (connected)	60°C (connected)
<b>Maximum working temperature:</b>	100°C (disconnected)	100°C (disconnected)	100°C (disconnected)	100°C (disconnected)
<b>Maximum circuit length (m):</b>	80 m	80 m	80 m	80 m
<b>Heating zone length:</b>	1.000 mm	1.000 mm	1.000 mm	1.000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 0,75 mm <sup>2</sup>	2 x 0,75 mm <sup>2</sup>	2 x 0,75 mm <sup>2</sup>	2 x 0,75 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%	± 5%	± 5%
<b>Nominal outer dimensions:</b>	7 x 5 mm	8 x 6 mm	7 x 5 mm	8 x 6 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C	-50°C	-50°C
<b>Standard reel length:</b>	*100 and 150 mts	*100 and 150 mts	*100 and 150 mts	*100 and 150 mts

\*Note: The length of the reels may vary under demand.

Standard: IEC/TR2 61423-1/-2 IEC 60800

## Models CTCS150 and CTCSM150

Constant power - Silicone insulation	
<b>Catalogue number:</b>	CTCS150/15 - CTCSM150/15 and CTCS150/25 - CTCSM150/25
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.



Catalogue number	CTCS150/15	CTCSM150/15	CTCS150/25	CTCSM150/25
<b>Power output at 230 V (W/m):</b>	15 W	15 W	25 W	25 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	115°C (connected)	115°C (connected)	115°C (connected)	115°C (connected)
<b>Maximum working temperature:</b>	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)
<b>Maximum circuit length (m):</b>	150 m	150 m	100 m	100 m
<b>Heating zone length:</b>	1000 mm	1000 mm	1000 mm	1000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 1,5 mm <sup>2</sup>	2 x 1,5 mm <sup>2</sup>	2 x 1,5 mm <sup>2</sup>	2 x 1,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%	± 5%	± 5%
<b>Nominal outer dimensions:</b>	8 x 5,5 mm	9 x 6,5 mm	8 x 5,5 mm	9 x 6,5 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C	-50°C	-50°C
<b>Standard reel length:</b>	*100 mts	*100 mts	*100 mts	*100 mts

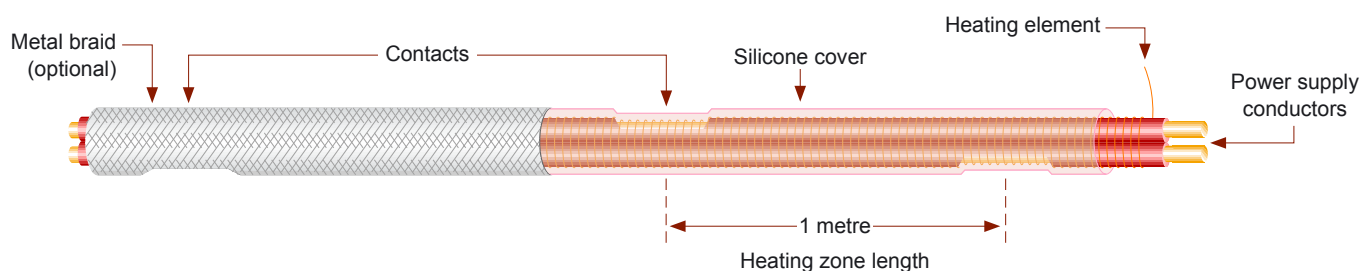
\*Note: The length of the reels may vary under demand.

Standard: IEC/TR2 61423-1/-2 IEC 60800

## Models CTCS150 and CTCSM150

### Constant power - Silicone insulation

<b>Catalogue number:</b>	CTCS150/30 - CTCSM150/30 and CTCS150/35 - CTCSM150/35
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.



Catalogue number	CTCS150/30	CTCSM150/30	CTCS150/35	CTCSM150/35
<b>Power output at 230 V (W/m):</b>	30 W	30 W	35 W	35 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	115°C (connected)	115°C (connected)	115°C (connected)	115°C (connected)
<b>Maximum working temperature:</b>	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)
<b>Maximum circuit length (m):</b>	100 m	100 m	85 m	85 m
<b>Heating zone length:</b>	1000 mm	1000 mm	1000 mm	1000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 1,5 mm <sup>2</sup>	2 x 1,5 mm <sup>2</sup>	2 x 1,5 mm <sup>2</sup>	2 x 1,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%	± 5%	± 5%
<b>Nominal outer dimensions:</b>	8 x 5,5 mm	9 x 6,5 mm	8 x 5,5 mm	9 x 6,5 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C	-50°C	-50°C
<b>Standard reel length:</b>	*100 mts	*100 mts	*100 mts	*100 mts

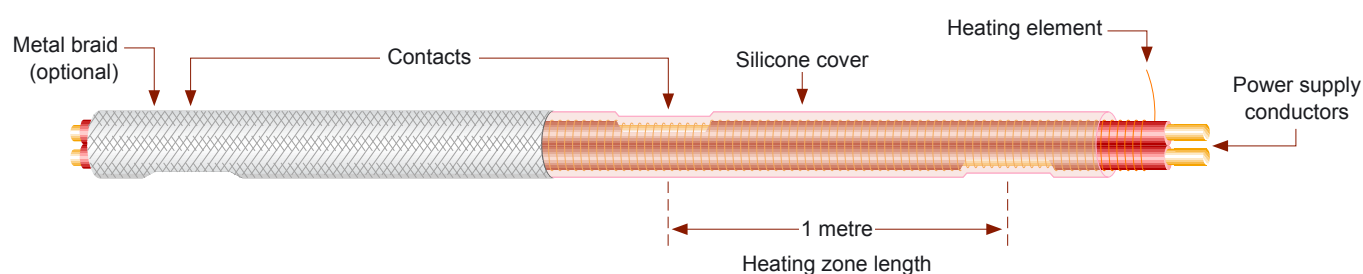
\*Note: The length of the reels may vary under demand.

Standard: IEC/TR2 61423-1/-2 IEC 60800

## Models CTCS250 and CTCSM250

### Constant power - Silicone insulation

<b>Catalogue number:</b>	CTCS250/15 - CTCSM250/15 and CTCS250/20 - CTCSM250/20
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.



Catalogue number	CTCS250/15	CTCSM250/15	CTCS250/20	CTCSM250/20
<b>Power output at 230 V (W/m):</b>	15 W	15 W	20 W	20 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	115°C (connected)	115°C (connected)	115°C (connected)	115°C (connected)
<b>Maximum working temperature:</b>	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)
<b>Maximum circuit length (m):</b>	233 m	233 m	175 m	175 m
<b>Heating zone length:</b>	1000 mm	1000 mm	1000 mm	1000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%	± 5%	± 5%
<b>Nominal outer dimensions:</b>	9 x 11,2 mm	10 x 12,2 mm	9 x 11,2 mm	10 x 12,2 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C	-50°C	-50°C
<b>Standard reel length:</b>	*100 mts	*100 mts	*100 mts	*100 mts

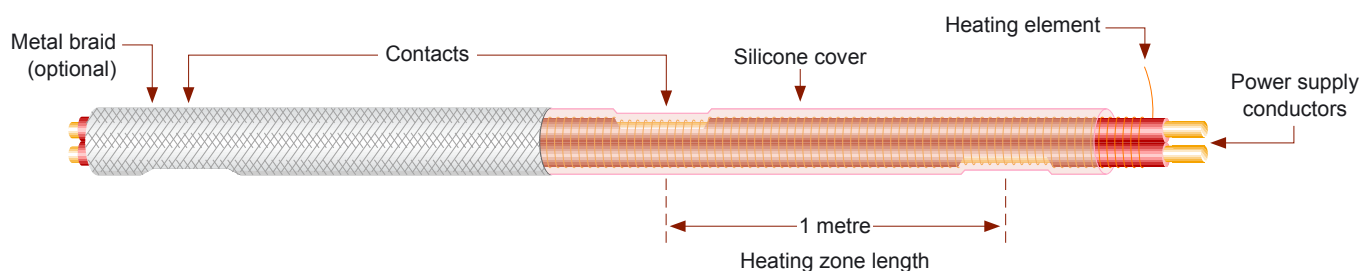
\*Note: The length of the reels may vary under demand.

Standard: IEC/TR2 61423-1/-2 IEC 60800

## Models CTCS250 and CTCSM250

### Constant power - Silicone insulation

<b>Catalogue number:</b>	CTCS250/25 - CTCSM250/25 and CTCS250/30 - CTCSM250/30
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.



Catalogue number	CTCS250/25	CTCSM250/25	CTCS250/30	CTCSM250/30
<b>Power output at 230 V (W/m):</b>	25 W	25 W	30 W	30 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	115°C (connected)	115°C (connected)	115°C (connected)	115°C (connected)
<b>Maximum working temperature:</b>	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)
<b>Maximum circuit length (m):</b>	140 m	140 m	115 m	115 m
<b>Heating zone length:</b>	1000 mm	1000 mm	1000 mm	1000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%	± 5%	± 5%
<b>Nominal outer dimensions:</b>	9 x 11,2 mm	10 x 12,2 mm	9 x 11,2 mm	10 x 12,2 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C	-50°C	-50°C
<b>Standard reel length:</b>	*100 mts	*100 mts	*100 mts	*100 mts

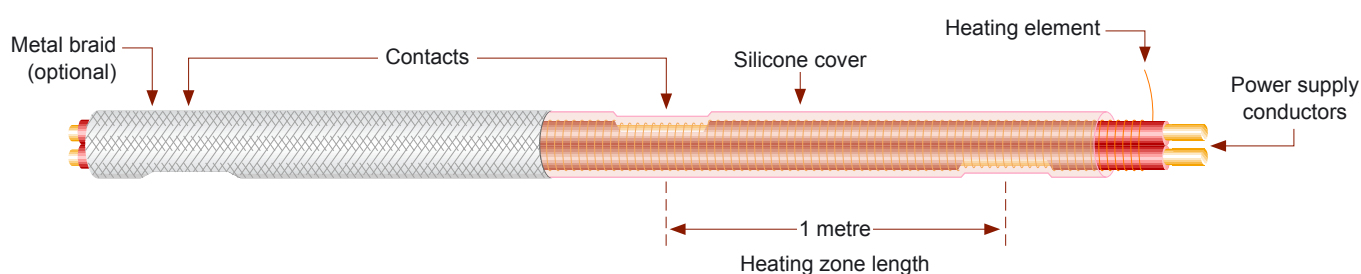
\*Note: The length of the reels may vary under demand.

Standard: IEC/TR2 61423-1/-2 IEC 60800

## Models CTCS250 and CTCSM250

### Constant power - Silicone insulation

<b>Catalogue number:</b>	CTCS250/35 - CTCSM250/35 and CTCS250/40 - CTCSM250/40
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.



Catalogue number	CTCS250/35	CTCSM250/35	CTCS250/40	CTCSM250/40
<b>Power output at 230 V (W/m):</b>	35 W	35 W	40 W	40 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	115°C (connected)	115°C (connected)	115°C (connected)	115°C (connected)
<b>Maximum working temperature:</b>	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)	180°C (disconnected)
<b>Maximum circuit length (m):</b>	100 m	100 m	88 m	88 m
<b>Heating zone length:</b>	1000 mm	1000 mm	1000 mm	1000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%	± 5%	± 5%
<b>Nominal outer dimensions:</b>	9 x 11,2 mm	10 x 12,2 mm	9 x 11,2 mm	10 x 12,2 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C	-50°C	-50°C
<b>Standard reel length:</b>	*100 mts	*100 mts	*100 mts	*100 mts

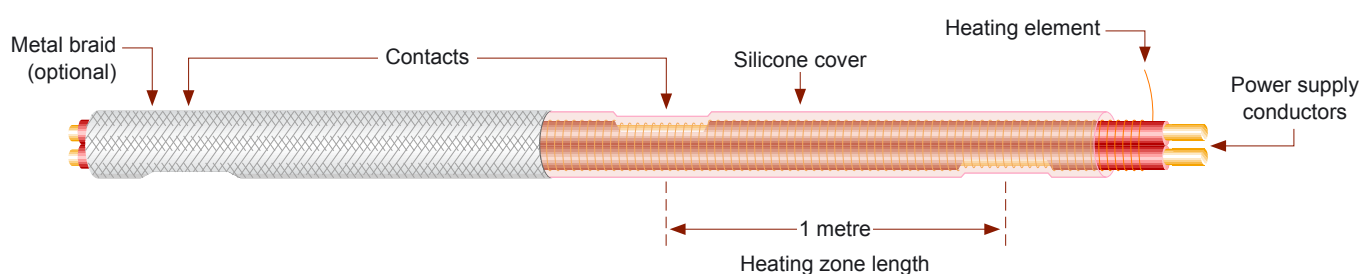
\*Note: The length of the reels may vary under demand.

Standard: IEC/TR2 61423-1/-2 IEC 60800

## Models CTCS250/45/3 and CTCSM250/45/3

### Constant power (380 V) - Silicone insulation

<b>Catalogue number:</b>	CTCS250/45/3 - CTCSM250/45/3
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.

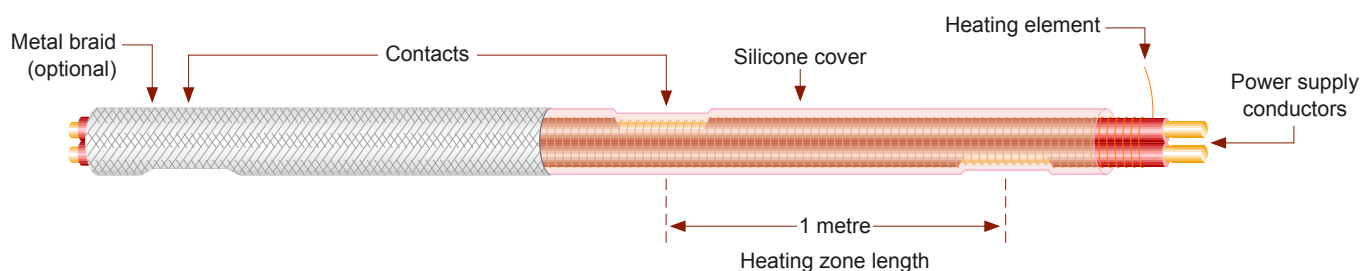


Catalogue number	CTCS250/45/3	CTCSM250/45/3
<b>Power output at 380 V (W/m):</b>	45 W	45 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper/Sn - 1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	115°C (connected)	115°C (connected)
<b>Maximum working temperature:</b>	180°C (disconnected)	180°C (disconnected)
<b>Maximum circuit length (m):</b>	126 m	126 m
<b>Heating zone length:</b>	1.000 mm	1.000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%
<b>Nominal outer dimensions:</b>	9 x 11,2 mm	10 x 12,2 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C
<b>Standard reel length:</b>	*100 mts	*100 mts
<b>*Note: The length of the reels may vary under demand.</b>		Standard: IEC/TR2 61423-1/-2 IEC 60800

## Model CTCS250/10/2 and Model CTCM250/10/2

### Constant power (24 V) - Silicone insulation

<b>Catalogue number:</b>	CTCS250/10/2 - CTCM250/10/2
<b>Covering:</b>	Thermal silicone
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.

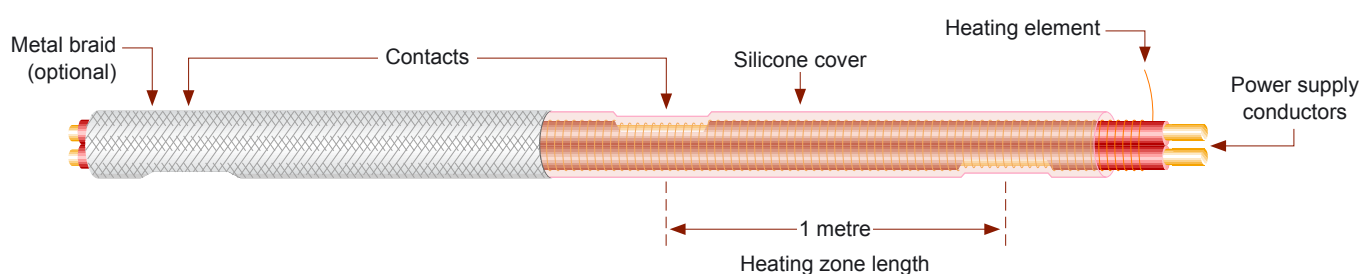


Catalogue number	CTCS250/10/2	CTCSM250/10/2
<b>Power output at 24 V (W/m):</b>	10 W	10 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper/Sn-1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	115°C (connected)	115°C (connected)
<b>Maximum working temperature:</b>	180°C (disconnected)	180°C (disconnected)
<b>Maximum circuit length (m):</b>	36 m	36 m
<b>Heating zone length:</b>	1.000 mm	1.000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	Thermal silicone	Thermal silicone
<b>Electric strength:</b>	1.500 V	1.500 V
<b>Loading tolerance:</b>	± 5%	± 5%
<b>Nominal outer dimensions:</b>	9 x 11,2 mm	10 x 12,2 mm
<b>Minimum temperature installation:</b>	-50°C	-50°C
<b>Standard reel length:</b>	*100 mts	*100 mts
<b>*Note: The length of the reels may vary under demand.</b>	Standard: IEC/TR2 61423-1/-2 IEC 60800	

## Models CTCP250 and CTCPM250 - P.V.C

Constant power - P.V.C insulation - 105° C

<b>Catalogue number:</b>	CTCP250/15 - CTCPM250/15 and CTCP250/30 - CTCPM250/30
<b>Covering:</b>	P.V.C
<b>Suitable for:</b>	Electric radiant floor, Trace heating for pipes, Snow melting systems, Portable heating systems, etc.



Catalogue number	CTCP250/15	CTCPM250/15	CTCP250/30	CTCPM250/30
<b>Power output at 230 V (W/m):</b>	15 W	15 W	30 W	30 W
<b>Metal braid covering:</b>	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )	Without metal braid	90% of covering (copper Sn-1,5 mm <sup>2</sup> )
<b>Maximum working temperature:</b>	70°C (connected)	70°C (connected)	70°C (connected)	70°C (connected)
<b>Maximum working temperature:</b>	90°C (disconnected)	90°C (disconnected)	90°C (disconnected)	90°C (disconnected)
<b>Maximum circuit length (m):</b>	233 m	233 m	115 m	115 m
<b>Heating zone length:</b>	1000 mm	1000 mm	1000 mm	1000 mm
<b>Heating conductor:</b>	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20	Ni/Cr 80/20
<b>Conductor surface:</b>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>	2 x 2,5 mm <sup>2</sup>
<b>Outer covering insulation:</b>	P.V.C	P.V.C	P.V.C	P.V.C
<b>Electric strength:</b>	750 V	750 V	750 V	750 V
<b>Loading tolerance:</b>	± 5%	± 5%	± 5%	± 5%
<b>Nominal outer dimensions:</b>	9 x 11,2 mm	10 x 12,2 mm	9 x 11,2 mm	10 x 12,2 mm
<b>Minimum temperature installation:</b>	-10°C	-10°C	-10°C	-10°C
<b>Standard reel length:</b>	*100 mts	*100 mts	*100 mts	*100 mts

\*Note: The length of the reels may vary under demand.

Standard: IEC/TR2 61423-1/-2 IEC 60800