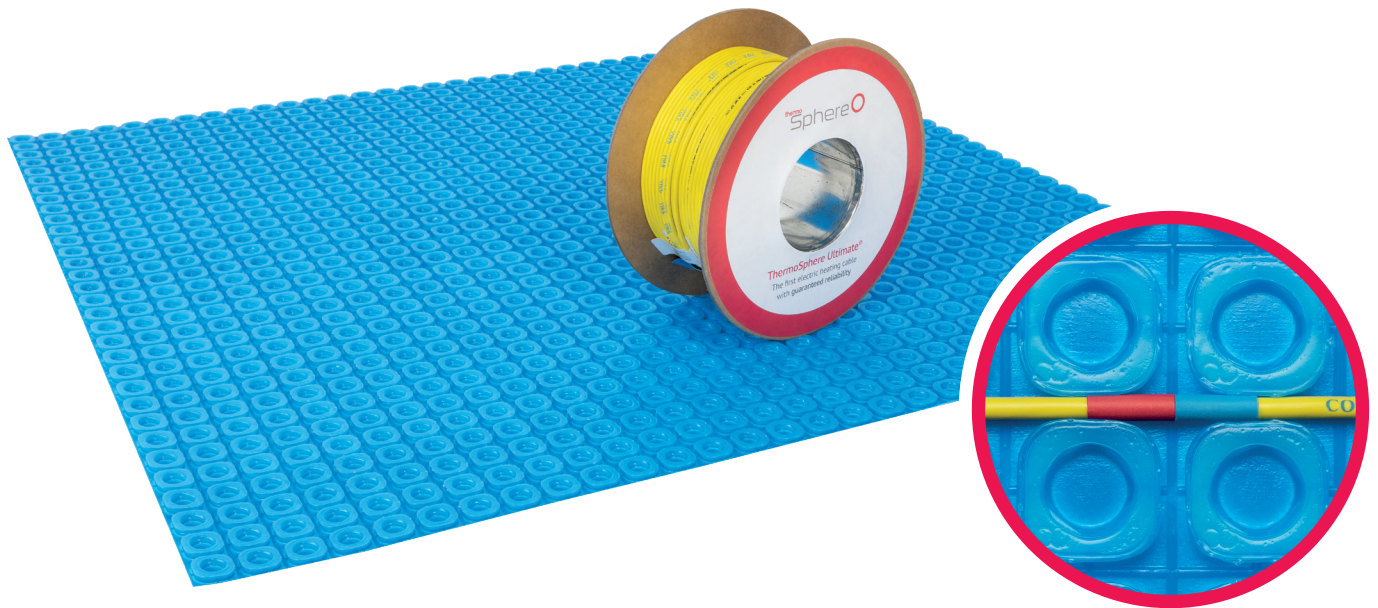


ThermoSphere Ultimate®

The first electric heating cable with guaranteed reliability



ThermoSphere Ultimate® is quick and easy to install, plus it's the most reliable underfloor heating cable.

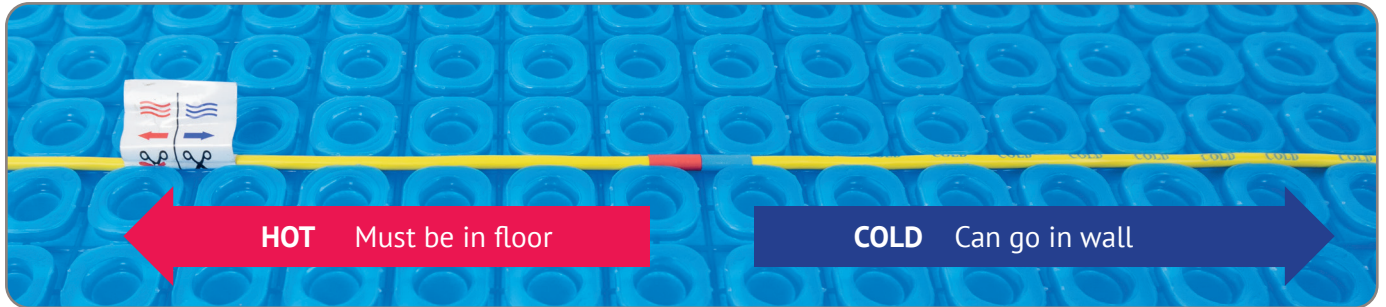
ThermoSphere Ultimate combines a TwistedTwin cable, and in-line joint technology. This removes the risk of damaging the cable during installation, as cutting into the membrane and substrate is no longer required.

- ThermoSphere Ultimate is compatible with all decoupling membrane mats so you can use your preferred brand of decoupling mat with the easiest to install and most reliable heating cable.
- There is no bulky hot/cold joint that needs cutting into the floor - Installation is quick and easy.
- Install ThermoSphere Ultimate into ThermoSphere Membrane or Self-adhesive Membrane at either 130W/m² or 195W/m².
- ThermoSphere Membrane's decoupling properties neutralise lateral movement in the floor and minimise the risk of cracking and delamination.
- Creates a waterproof layer within the floor when used with waterproofing products.
- Fleece backed membrane is adhered with a flexible tile adhesive, and self-adhesive membrane can be laid directly onto a clean plywood sub floor.

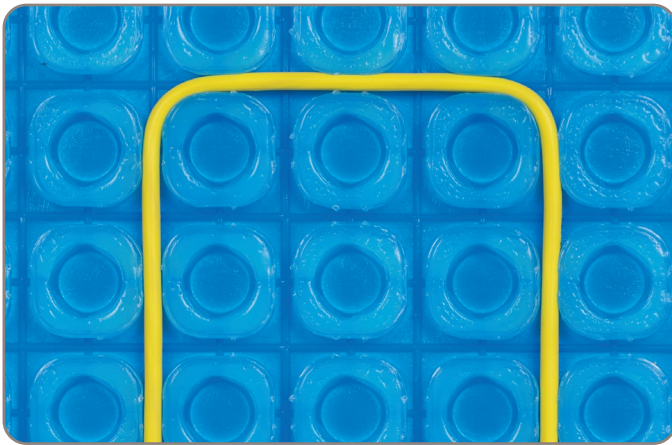
Technical data

Voltage	230V
Outputs	130W/m ² or 195W/m ²
Membrane thickness	5.5mm
Cable length	12 to 200m
Protection rating	IP68
Membrane material	Polyethylene
Cable insulation	FEP and HR-PVC
Robinson test rating	Extra heavy use
Recommended max temp	27°C (limited by controls)
Warranty	Lifetime
Cable made in	India
Membrane made in	Italy

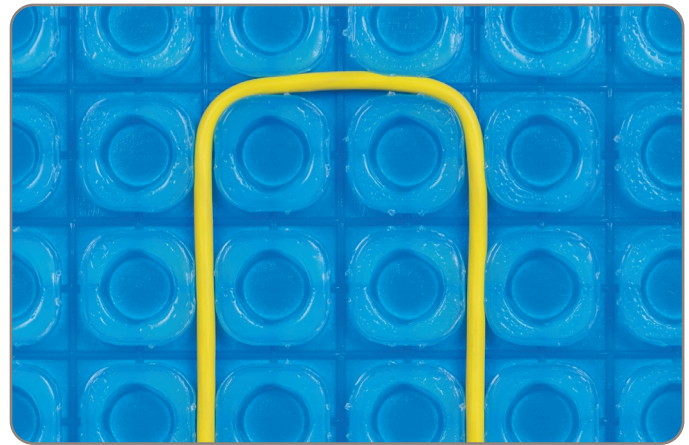
ThermoSphere Ultimate's in-line joint technology removes bulky joints for easier, faster installation



Variable spacing and output per m² in ThermoSphere Membrane

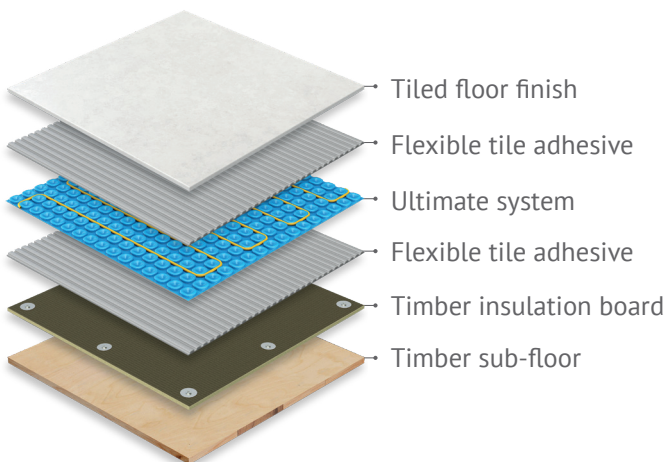


130W/m² at 3 dimple spacing

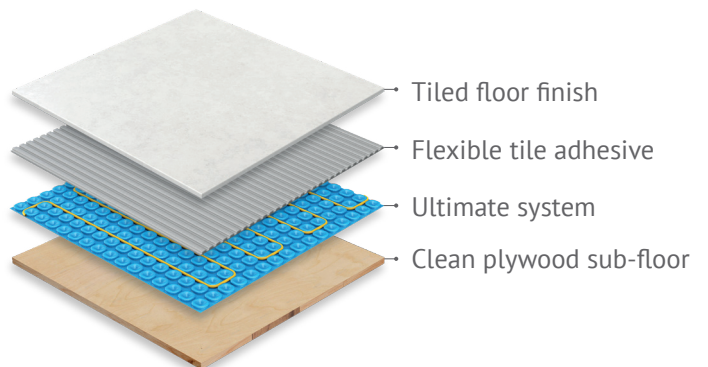


195W/m² at 2 dimple spacing

Fleece backed membrane example build up



Self-adhesive membrane example build up



Cable sizes and outputs

Code	Length (m)	Area (m ²) 130W/m ²	Area (m ²) 195W/m ²	Output (W)	Resistance (Ω)
HDMC-012-0150J	12	1.15	0.77	150	352.67
HDMC-018-0225J	18	1.73	1.15	225	235.11
HDMC-025-0300J	25	2.31	1.54	300	176.33
HDMC-031-0375J	31	2.88	1.92	375	141.07
HDMC-037-0450J	37	3.46	2.31	450	117.56
HDMC-042-525J	42	3.90	2.60	525	100.76
HDMC-050-0600J	50	4.62	3.08	600	88.17
HDMC-055-675J	55	5.10	3.40	675	78.37
HDMC-061-0750J	61	5.77	3.85	750	70.53
HDMC-075-0900J	75	6.92	4.62	900	58.78
HDMC-090-1080J	90	8.32	4.99	1080	48.98
HDMC-100-1200J	100	9.23	6.15	1200	44.08
HDMC-125-1500J	125	11.54	7.69	1500	35.27
HDMC-150-1800J	150	13.85	9.23	1800	29.39
HDMC-175-2100J	175	16.17	10.78	2100	25.19
HDMC-200-2400J	200	18.46	12.31	2400	22.04

Membrane sizes

Code	Description	Area (m ²)	Size (M)	Unit
HDM-001	Fleece backed membrane 1m ²	1	1 x 1	Panel
HDM-005	Fleece backed membrane 5m ²	5	5 x 1	Roll
HDM-015	Fleece backed membrane 15m ²	15	15 x 1	Roll
HDM-SA-001	Self-adhesive membrane 1m ²	1	1 x 1	Panel
HDM-SA-015	Self-adhesive membrane 15m ²	15	15 x 1	Roll

Technical Data

Appearance	Polimeric membrane
Colour	White / Cyan blue
Shelf life	24 months in dry environment avoiding direct sunlight and heat sources
Total thickness	5.5mm (EN 1849 - 2)
Width	1m
Width of non-woven PP	70g / m ² (EN 1849 - 2)
Weight of PP sheet	700g / m ² (EN 1849 - 2)
Rounded square shaped reliefs number	1024 m ²
Compressive strength	600KN / m ²
Longitudinal breaking load	620N / 50 mm (EN 12311 - 1)
Transversal breaking load	550N / 50 mm (EN 12311 - 1)
Longitudinal ultimate elongation	50% (EN 12311 - 1)
Transversal ultimate elongation	50% (EN 12311 - 1)
Crack-bridging ability	1mm
Air volume for vapor management	2,2lt / m ²