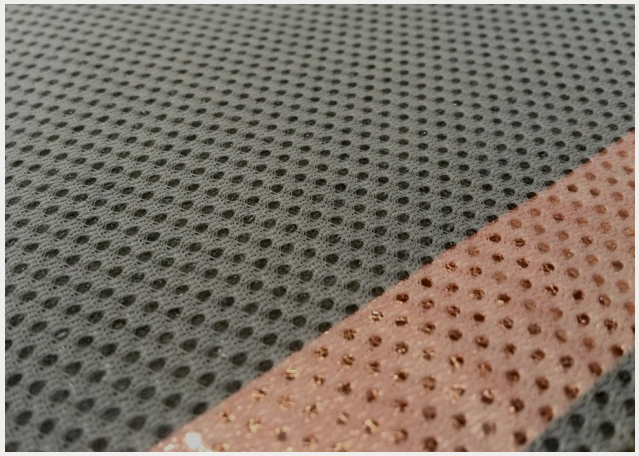
PowerFabric "Plus" Data Sheet

PowerFabric Plus can be embedded in a large range of resins, adhesives and inorganic components. Liquid resins or *Prepregs* penetrate the open fibre structure and allow for an air-free impregnation either under vacuum or higher pressure.



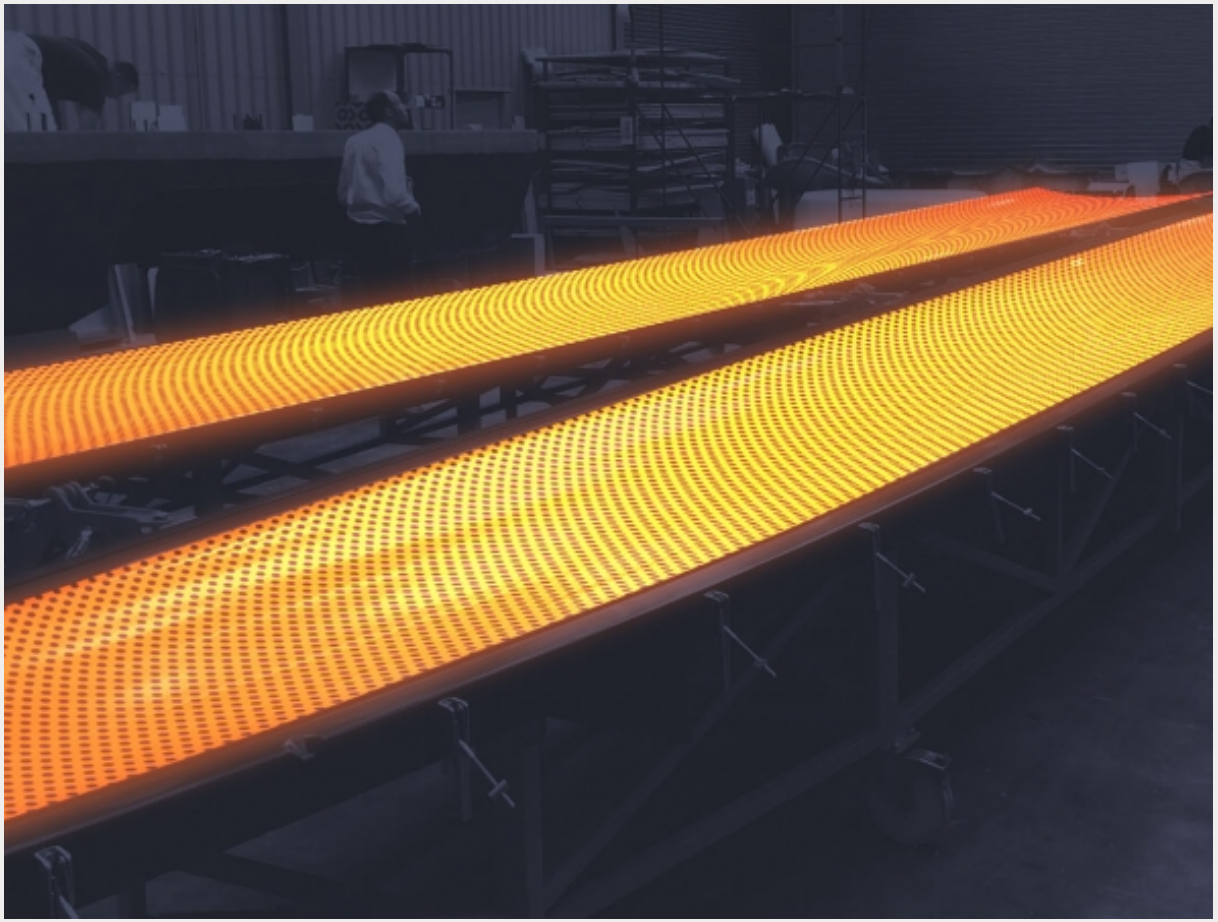
A 0.3 mm thin carbon film heater which provides unbeatable heat.

PowerFabric "Plus" is a flexible textile which can supply higher power and temperatures than the standard ***PowerFabric.***

It is very useful where large heated areas need to be controlled accurately with minimum zones.

It is versatile and can be applied to a large range of applications from de-icing of wind blades and heating of railcar floors, to heating of mould tools where a high performance heating system is required.

It has very good electrical/ flammability properties and meets the requirements of UL 499.



PowerFabric "Plus"

Data Sheet

ENCAPSULATING MATRIX

(Standard)

	Physical Properties	Temperature max.
E GLASS FABRIC	• Flexible • Non-Perforated	180°C - 360°F
E GLASS FABRIC	• Ultra Flexible • Perforated	180°C - 360°F

MECHANICAL DATA

Heat conductor thickness	***µm***	100-150
Density	**g/m³**	1.8
Max. Tensile Strength	**Mpa**	250 Warp Directen
Elongation at break	**%**	4.8
Modulus of Tension	**Gpa**	6

LaminaHeat
Putting heat where it is needed

Dimensional Properties

Total Width	**mm**	**900**	**600**	**450**	**225**
	inch.	35.4	23.6	17.7	8.9
Heating Width	**mm**	**850**	**550**	**400**	**175**
	inch.	33.5	21.7	15.7	6.9
Max. Length	**m**	**500**	**500**	**500**	**500**
Weight	g/m²	290	290	290	290
Thickness	***µm***	**280**	**280**	**280**	**280**

Electrical and Physical Properties

		Non-Perforated	***Perforated***
Resistance	**Ω/m²**	4-37 +/- 7%	8 - 134 +/- 7%
Resistance/ Lenght	**Ω/mt**	0.5-37.0 +/- 7%	1.0-134 +/-7%
Range of use	**Volt**	0-120 vDC & 0-400 vAC	
Power	**kW/m²** **W/inch²**	Up to 15.0 Up to 9.8	Up to 15.0 Up to 9.8

- **Typical temperature application:** 0°C to 180°C or 32°F to 350°F
- **Surface insulation** (Dielectric strength) UL 499>1KV (0-5KV)* *(*Combined with woven glass epoxy 1.5 mm thick)*
- **Cross Bar Copper / Typical Cross section:** 20 mm x 0.035 mm
- **Open perforated area:** 20%
- **Flammability**: UL 499 (PASS)