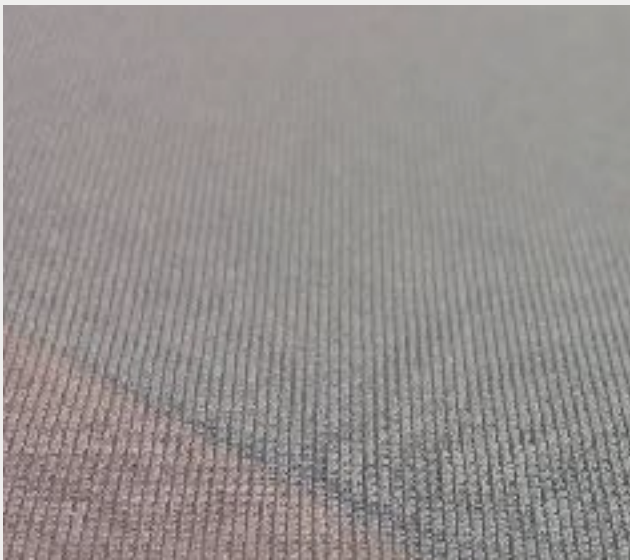


# ComfortFabric Data Sheet

**ComfortFabric** can be combined with any woven or non-woven textile and will generate healthy warmth at almost 100% efficiency.



**ComfortFabrics are soft, compilable and easily combine with products to provide quick acting full surface heating.**

**ComfortFabric** is ideal for heated seats, work and leisure clothing, medical and physical therapy applications, heated blankets or mattresses.

The proprietary conductive fiber heating distribution ensures that 99.7% of the electrical energy is converted into heat energy which is important when low power sources like batteries are being used or maximums energy efficiencies are required.



**DISCLAIMER OF LIABILITY:** This information is offered solely as a guide in material selection. We believe this information to be reliable, but do not guarantee its applicability to the users process or assume any liability arising out of its use of performance. The user, by accepting the product described herein, agrees to be responsible for thoroughly testing any application to determine its suitability before committing to production. It is important for the user to determine the properties of its own commercial compounds when using this or any other material. LaminarHeat makes no warranty of any kind, express or implied, including those of merchantability and fitness for a specific purpose. Statements of this Data Sheet shall not be construed as representations of warranties or as inducements to infringe any patent or violate any law, safety code or insurance regulation.

# ComfortFabric

## Data Sheet

### ENCAPSULATING MATRIX

(Standard)

	Physical Properties	Temperature max.
Polyester Fabric	<ul style="list-style-type: none"> <li>Flexible</li> <li>Non-Perforated</li> </ul>	120°C - 360°F
Polyester Fabric	<ul style="list-style-type: none"> <li>Ultra Flexible</li> <li>Perforated</li> </ul>	120°C - 360°F

### MECHANICAL DATA

Heat conductor thickness	$\mu\text{m}$	100-150
Density	$\text{g/m}^3$	1.38
Max. Tensile Strength	Mpa	20 Warp Directen
Elongation at break	%	5
Modulus of Tension	Gpa	4



### Dimensional Properties

Total Width	mm	1050	700	525	350	210
	inch.	41.3	27.6	20.7	13.8	8.3
Heating Width	mm	<b>1,000</b>	<b>650</b>	<b>475</b>	<b>300</b>	<b>160</b>
	inch.	39.4	25.6	18.7	11.8	6.3
Max. Length	m	<b>500</b>	<b>500</b>	<b>500</b>	<b>500</b>	<b>500</b>
Weight	$\text{g/m}^2$	290	290	290	290	290
Thickness	$\mu\text{m}$	<b>280</b>	<b>280</b>	<b>280</b>	<b>280</b>	<b>280</b>

### Electrical and Physical Properties

		Non-Perforated	Perforated
Resistance	$\Omega/\text{m}^2$	4-37	8 - 134
Resistance/ Lenght	$\Omega/\text{mt}$	0.5-37.0 +/- 7%	1.0-134 +/-7%
Range of use	Volt	0-24 vAC/vDC	0-24vAC/DC
Power	$\text{W/m}^2$	Typ. 0 - 400	Typ. 0 - 400
	$\text{W/inch}^2$	0 - 0.25	0 - 0.25

- Typical temperature application: 0°C to 50°C / 32°F to 122°F
- Cross Bar Copper / Typical Cross section: 20 mm x 0.035 mm
- Open perforated area: 20%