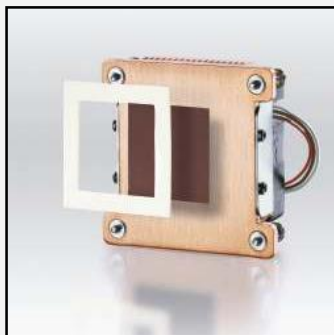


Softtherm®: 86/450



This soft hybrid heat-conducting film has been developed for pressure-sensitive uses in the middle and upper performance ranges. Besides very good thermal and dielectric characteristics the film is also highly suitable for automatic placement.

This carrier-free film is available in thicknesses from 0.5mm to 3.0mm. Special attention was paid to the film's processability and cost optimization.

APPLICATIONS

- SMD Components
- BGA's
- PPGA's
- Automotive Applications
- Embedded Boards

DISCLAIMER: Purchaser shall be solely responsible for determining the adequacy of the product for any and all uses which the purchaser shall apply the product, and the application of the product by the purchaser shall not be subject to any implied warranty of fitness for that purpose.

Properties	symbol	unit	86/450
Color			Chocolate
Thermal Properties			
Thermal Resistance	R_{th}	K/W	< 0.3
Thermal Impedance	R_{ti}	$^{\circ}\text{Cmm}^2/\text{W}$ Kin^2/W	121 0.19
Thermal Conductivity	λ	W/mK	> 4.2
Electrical Properties			
Dielectric Breakdown	$E_{d,ac}$	kV/mm	> 5.0
Volume Resistivity		Ωcm	3.6×10^{12}
Dielectric Loss Factor	$\tan \delta$	1	3.0×10^{-3}
Dielectric Constant	ϵ_r	1	2.5
Mechanical Properties			
Measured Thickness ($\pm 1\%$)		mm	0.5*
Hardness		Shore 00	65 – 75
Youngs Modulus**		N/cm ³	94.5
Physical Properties			
Application Temperature		$^{\circ}\text{C}$	-40 to +180
TML		Ma.-%	< 0.40
Flame class		UL	94V-0
Available Thickness		mm	0.5 – 3.0

** Youngs modulus: sample size 30mmx30mmx2.5mm;
variable contact pressure; compression 50% of measured thickness

Compressibilities of Softtherm 86/450

