fibreglass reinforced, highly dielectric



TFO-G-SI is an electrically insulating thermally conductive silicone foil for an optimised thermal coupling between electronic packages and heat sinks. Through the specific formulation and filling with thermally conductive ceramic particles a high thermal conductivity is reached. Under pressure the total thermal resistance is minimised. The material is characterised by its very high dielectric properties. The fibreglass reinforcement provides for an outstanding mechanic stability and cut-through resistance as well as easy handling. For an easy and reliable pre-assembly the interface material is available with low tack pressure sensitive adhesive on one side.



Technical Data Sheet

PROPERTIES

- ☐ Thermal conductivity: 1.6 W/mK
- High thermal contact
- Outstanding mechanic stability through fibreglass reinforcement
- Very high dielectric strength
- Extraordinary chemical resistance and longterm stability
- □ Residue-free removal after use

AVAILABILITY

- Sheet
- Roll 290 mm x 50 m
- Non tacky
- (TFO-GXXX-SI)
- ☐ Tacky on one side (TFO-GXXX-SI-A1)
- Die cut parts
- Kiss cut parts on sheet or roll

APPLICATION EXAMPLES

Thermal link of:

- MOSFETs or IGBTs
- Power diodes or AC/DC converters
- Power modules

For use in Switch mode power supplies / Motor control units / High voltage hybrid automotive applications / PS units / Solar systems

PROPERTY	UNIT	TF0-G230-SI
MATERIAL		Ceramic filled silicone
Colour		Pink
Reinforcement		Fibreglass
Thickness	mm	0.23 +0.023
Tensile Strength¹	kpsi	2.9
UL Flammability	UL 94	VO
RoHS Conformity	2015 / 863 / EU	Yes
THERMAL		
Resistance ² @ 150 PSI	°C-inch²/W	0.49
Resistance ² @ 30 PSI	°C-inch²/W	0.71
Thermal Conductivity	W/mK	1.6
Operating Temperature Range	°C	- 50 to + 180
ELECTRICAL		
Breakdown Voltage³	kV AC	5.5
Volume Resistivity	0hm - cm	1.0 x 10 ¹¹

Measurement technique according to: 'ASTM D 412, 'ASTM D 5470, 'ASTM D 149. All data without warranty and subject to change. Please contact us for further data and information. $Shelf\ life\ adhesive: 6\ months\ when\ stored\ in\ original\ packaging\ at\ room\ temperature\ and\ 50\%\ relative\ humidity.$

Thicknesses: 0.23 mm

Rth vs. N/cm² (PSI)

