

# N700A/B

## Non-Silicone Thermal Conductive Pad

LiPOLY N700A/B is made by non-silicon resin material, it's low-molecular-weight siloxanes with non-volatile, can avoid the electrical contact problem. N700 is flexible and with great thermal conduction, makes the thermal resistance as low as possible. The thermal conductivity is 1.5~3.0W/m\*K. It's suitable for optical and sensitive electric components. LiPOLY's ability of research and development is providing our best thermal solution to customers, which can satisfy customer special requirement on advanced product. The product is qualified for UL.



### Features-

- Thermal conductivity: 1.5/3.0 W/m\*K
- It's made by non-silicon resin materials
- low-molecular-weight siloxanes with non-volatile
- Low contact thermal resistance
- With electrical Insulation
- Outstanding thermal conductivity
- Qualified for UL94V-0
- Applicable to optical and sensitive electric components

### Typical Applications-

- HDDS
- Optical appliance

### Specifications-

- Sheet form
- Die-cut parts

PROPERTY	N700A	N700B	TEST METHOD	UNIT
Color	Gray	Red	Visual	-
Surface tack 2-side/1-side	2	2	-	-
Thickness	0.5~5.0	0.5~5.0	ASTM D374	mm
Density	2.2	2.6	ASTM D792	g/cm <sup>3</sup>
Hardness	60	60	ASTM D2240	Shore 00
Application temperature	-60~125	-60~125	-	°C
Tensile Strength.	20	20	ASTM D412	psi
Elongation	40	30	ASTM D412	%
<b>COMPRESSION</b>				
Deflection @10 psi	46	55	-	%
Deflection @20 psi	67	75	-	%
Deflection @30 psi	79	82	-	%
Deflection @40 psi	84	86	-	%
Deflection @50 psi	88	89	-	%
<b>ELECTRICAL</b>				
Dielectric breakdown	>10	>10	ASTM D149	kV/mm
Surface resistivity	>10 <sup>11</sup>	>10 <sup>11</sup>	ASTM D257	Ohm
Volume resistivity	>10 <sup>10</sup>	>10 <sup>10</sup>	ASTM D257	Ohm-m
<b>THERMAL</b>				
Thermal Conductivity	1.5	3	ASTM D5470	W/m*K
Thermal impedance@10 psi	0.708	0.392	ASTM D5470	°C-in <sup>2</sup> /W
Thermal impedance@20 psi	0.445	0.236	ASTM D5470	°C-in <sup>2</sup> /W
Thermal impedance@30 psi	0.293	0.169	ASTM D5470	°C-in <sup>2</sup> /W
Thermal impedance@40 psi	0.225	0.127	ASTM D5470	°C-in <sup>2</sup> /W
Thermal impedance@50 psi	0.182	0.101	ASTM D5470	°C-in <sup>2</sup> /W
<b>FLAME RATING</b>				
UL Flammability class	V-0	V-0	UL94	-

※ These data are provided for reference only. Engineers are reminded to test the material in varied application.