



Creative Materials, Inc. 12 Willow Road Ayer, MA 01432

T 978.391.4700 F 978.391.4705

## 122-47

## POLYIMIDE ELECTRICALLY CONDUCTIVE DIE ATTACH ADHESIVE

<u>DESCRIPTION</u>: 122-47 is a single component, silver filled, electrically conductive polyimide adhesive suitable for application by stamping, screen printing, dipping and syringe dispensing. This product is designed for die attachment and surface mount applications. Other applications include, but are not limited to assembling electrical and electronic components. The cure schedule allows for rapid processing and the resulting bond exhibits excellent thermal stability and adhesion at high temperatures.

## **TYPICAL CURED PROPERTIES:**

Consistency	Smooth Paste
Filler	Silver
Percent Silver, cured	> 81
Glass Trans. Temp. (°C)	> 250
Volume Resistivity (Ω-cm)	0.00015
Useful Temperature Range (°C)	-55 to +250
Thermal Stability (°C)	Good to 325
T-Shear Strength (psi)	> 1250
Thermal Conductivity (W/m-K)	> 2.4
Coef. of Thermal Expansion Below Tg	41 x 10 <sup>-6</sup>

## **IONIC CONTENT:**

Chloride < 5 ppm Sodium < 5 ppm Potassium < 5 ppm

**SUGGESTED HANDLING & CURING**: 122-47 is ready to use as supplied. Apply adhesive to surface to be bonded by hand and/or automatic method and assemble. Apply slight pressure to assure good mating of surfaces and formation of filet. Best properties for most applications result when pre-curing for half an hour at 150°C to 155°C, followed by curing for half an hour at 275°C. End user is advised to experimentally determine temperature and time best suited for individual applications.

**STORAGE**: Shelf Life: 1 year at -10°C

**SAFETY & HANDLING**: Use with adequate ventilation. Keep away from sparks and open flames. Avoid prolonged contact with skin and breathing of vapors. Wash with soap and water to remove from skin.

All technical information is based on data obtained by CMI personnel and is believed to be reliable. No warranty is either expressed or implied with respect to results or possible infringements on patents.

**REVISION DATE: 11/13/02 REVISION: A**