

Creative Materials, Inc. 12 Willow Road Ayer, MA 01432 ISO 9001 CERTIFIED

T 978.391.4700 F 978.391.4705

121-50

ELECTRICALLY CONDUCTIVE COATING

<u>DESCRIPTION</u>: 121-50 is an electrically conductive ink, coating and adhesive which is particularly useful for electroless plating. This system is designed to maintain stable viscosity during all application methods and has a low odor. The product features excellent adhesion to Kapton, Mylar, glass and a variety of other substrates. Unlike conventional conductive materials, this product is very resistant to abrasion, scratching and thermal aging. Some applications for 121-50 include, but are not limited to, electroless plating, emi/rfi shielding of polyimide flexible circuits, polymer thick film circuitry, membrane switches, conductive ink for polymer thick film circuitry, and coatings for tantalum capacitors.

TYPICAL PROPERTIES:

Viscosity (cps) 500 - 600Filler Silver

Percent Silver (Cured) >83

Volume Resistance, max. (Ω -cm) 0.0001

Solderable No

Hydrolytic Stability Excellent

Useful Temperature Range (°C) -55 to 200
Thermal Stability (°C) Good to 325

SUGGESTED HANDLING & CURING: 121-50 is ready to use as supplied. Further thinning may be accomplished by adding small amounts of CMI Thinner 113-12. Prior to using, be certain to resuspend silver. Best properties, for most applications, result when cured for 1 hour at 175°C. Good properties are obtained on a variety of substrates by curing at temperatures ranging from 50°C to 200°C. End user is advised to experimentally determine temperature and time best suited for individual applications.

STORAGE: Shelf life: 3 months at 25°C; or 6 months at 5°C; or 12 months 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.