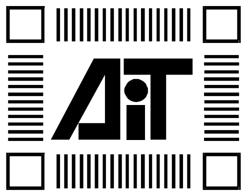

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Rapid Curing Die-Attach

ME8630-RC

100% Solid
Low Temperature Curable
Fine Pitch with Extra-Fine Silver
Long Pot-Life

IDEAL FOR:

In-line Die-Attach
Large and Small Dies
Rapid Curing for Smaller Dies (<10mm)
Low Temperature Curing for Large Dies

DESCRIPTION:

ME8630-RC is an extra fine silver filled 100% solid rapid curing die-attach for finer pitch application. It is a low stress, low temperature curable die-attach adhesive paste. This single component, silver filled paste is electrically and thermally conductive. It is highly thixotropic with outstanding compatibility for bonding different adherends. The relatively medium Tg and modulus made it suitable for bonding both smaller and relatively large devices.

ME8630-RC has been designed to eliminate bleeding on both silver plated copper and alloy 42 leadframes. It maintains more than 150 psi bond strength at 250ºC for high temperature wire-bonding.

AVAILABILITY:

ME8630-RC is available in syringes for automatic needle dispense applications or in jars.

APPLICATION PROCEDURES:

(1) Thaw to ambient temperature for 30 minutes before opening jar or using syringes.

(2) Dispense adhesive onto clean substrate with a suitable pattern to assure full die coverage.

(3) Cure according to one of the recommended cure schedules.

TYPICAL PROPERTIES*

Property	Value
Electrical Resistivity (150 ºC/ 5 min)	<5x10 $^{-4}$ ohm-cm
Dielectric Strength (Volts/mil)	>Not Applicable
Glass Transition Temp.(ºC)	80 ±10%
Current Carrying Capabilities	>20 Amp/mm²
Lap-Shear Strength	>NA
Device Push-off Strength	>2400 psi >16.6 N/mm²
Hardness (Type)	80 (D) ±10%
Cured Density (gm/cc)	3.5 ±10%
Thermal Conductivity	>60 Btu-in/hr-ft²-ºF ±10% >8.6 W/m-ºC ±10%
Linear Thermal Expansion Coeff. (ppm/ºC)	40 ±15%
Maximum Continuous Operation Temp. (ºC)	<150
Pot Life	7 days @ 25ºC
Avg. Viscosity(5 rpm, 25ºC) (Brookfield DV-1,Spindle CP51)	15,000 cp ±20%
Thixotropic Index	

* Properties given are typical values and not intended for use in preparing specifications. The user is advised to evaluate the product in the manner the product is intended to be used in manufacturing and in the final product.

CURE SCHEDULES:

Temperature	Time	Presure
125ºC	30 min.	
150ºC	15 min.	
175ºC	8 min	

SHELF LIFE:

Storage temperature	Shelf Life
-40ºC	1 yr

CAUTION: This product may cause skin irritation. Avoid skin contact. If contact does occur, wash immediately with soap and water. Please refer SDS for more details

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