

Preliminary Technical Data Sheet

FeedBond® FP-1725-SC1

Snap Cure Conductive Adhesive

Introduction:

FeedBond®FP-1725-SC1 electrically conductive adhesive is designed for attaching small to medium size dies to silver and gold-plated leadframes. FP-1725-SC1 can be snap cured, hot plate cured or fast cured in oven.

Characteristics:

- Snap cure, hot plate cure and oven cure
- Minimal bleeding and minimal volatiles
- Good bonding on silver-plated leadframe

UNCURED PROPERTIES		TEST DESCRIPTION	TEST METHOD
Density	3.2 g/cc	Pycnometer	FT-P001
Appearance	Silver		
Viscosity @ 25°C	15000 cps	Brookfield DV-III/CP-51 @ 5rpm	FT-P006
Thixotropic Index @ 25°C	3.5	Brookfield DV-III/CP-51 Visc. @ 0.5rpm/Visc. @ 5rpm	FT-P008
Grind	< 25 μ m	Grind meter	FT-P026
Moisture Content	< 0.5 %	Moisture Titrator	FT-P002
Work Life @ 25°C	24 hrs	25% increase in visc. @ 5rpm	FT-P024
Shelf Life@ -40°C	6 months		FT-P018
CURE CONDITION		TEST DESCRIPTION	TEST METHOD
Standard Cure Condition		20 sec on hot plate @200°C	

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PHYSIOCHEMICAL PROPERTIES- POST CURE	TEST DESCRIPTION	TEST METHOD
Glass Transition Temperature (Tg) 140°C Coefficient of Thermal Expansion Below Tg(α_1) 43 ppm/°C Above Tg(α_2) 151 ppm/°C Storage Modulus @ -60°C 4530MPa @ 25°C 3845MPa @ 150°C 60MPa @ 250°C 39MPa	DMA 3 Point Bending Mode TMA Expansion Mode Dynamic Mechanical Thermal Analysis using <1.6mm thick specimen	FT-M014 FT-M016 FT-M019
THERMAL ELECTRICAL PROPERTIES- POST CURE	TEST DESCRIPTION	TEST METHOD
Volume resistivity <0.01 $\Omega \cdot \text{cm}$	Cure 20 sec on hot plate @200°C 4-point probe	FT-P017
MECHANICAL PROPERTIES- POST CURE	TEST DESCRIPTION	TEST METHOD
Die Shear Strength @ 25°C 5 kg/die	80mil × 80mil Si die on Ag LF Cure 20 sec on hot plate @200°C	FT-M012

p.s. The tables shown above are typical values only. If you need to write a specification, please request our current Standard Release Specification.

Instruction**Thawing**

Place the container to stand vertically for 30min ~90min. **DO NOT** open the container before adhesive reaches ambient temperature to prevent the moisture condensation. Any moisture that collects on the thawed container should be removed prior to use. Adhesives that appear to have separated should not be used.

Storage

Adhesive should be stored @ -40°C. The shelf life of the material is only valid when the material has been stored at the correct storage condition.

Availability

FeedBond adhesives are packaged in syringes or pots per customer specification. For the details, please contact our Customer Service or sales department.