TECHNICAL DATA SHEET EPA0126

25/02/20

DESCRIPTION:

Tacusil™ EPA0126 is one-part heat cure 100% solids epoxy adhesive. It's flowable and long work time under room temperature and designed for small gap potting in Type-C connector. It has good adhesion to versatile substrates, such as metal, ceramic and some engineering plastics.

TYPICAL PROPERTIES:

All properties given are at 25 °C unless otherwise noted.

Property:	*Value:*	*Test Method or Source:*
Color	Gray	Visual
Cure Schedule	30 mins @ 135 °C	
Work Time	> 4 hours @ 25°C	
Viscosity	75,000 cps @1/s	Brookfield DVII,6# spindle
Specific Gravity	1.7	Calculated
Glass Transition Temperature/Tg	110°C	R050-61 by DSC
Hardness	85 Shore D	R050-17/ASTM D2240
Water Absorption	0.13% after 24 hours	R050-35/ASTM D570
Tensile Properties: **Strength** **Elongation** **Modulus**	 7,500 psi 0-1% 500,000 psi	R050-36/ASTM D638
Lap Shear Strength **0.010" bond line Al to Al**	3,000 psi	R050-37/ASTM D1002
Compressive Properties: **Strength** **Modulus**	 18,000 psi 800,000 psi	R050-38/ASTM D695
Thermal Conductivity by LFA	1.1 W / (m.K)	ASTM D 5470
Volume Resistivity	6 x 10^{13} ohm–cm*	
Dielectric Constant	3.5*	
Dielectric Strength	500 V/mil* 20 kV/mm*	
Coefficient of Thermal Expansion by TMA	30 ppm/ °C < Tg 80 ppm/ °C > Tg	455300005340 /ASTM E831 TMA, 5 °C/min
Temperature Rating	-40 to 180 °C**	

* Asterisk denotes values considered typical to associated resin systems or extrapolated from other test results.
** Temperature Rating is based on average design requirements and is not intended as a guarantee of suitability for all applications operating at that temperature.

Approximate time to 95% cure at various temperatures by DSC

Temperature	95% cure
80°C	24 hours
135°C	20 minutes
150°C	15 minutes

NOTE: This chart reflects the thermal response of a very small sample run in a DSC, actual assemblies will require longer times to cure due to heat transfer, mass and method of heating. The cure schedule provided on page 1 provides times and temperatures more in line with use in a typical application.

INSTRUCTIONS:

1. Bring to room temperature for unfreezing prior to dispensing.
2. Apply heat to cure.
3. Allow to cure undisturbed until product is fully gelled or tack-free to the touch.
4. Clean up uncured resin with suitable organic solvent such as MEK, acetone or other organic solvent.

SHELF LIFE AND STORAGE: 6 months at 0~5 °C
Usable shelf life is dependent upon method of application, storage conditions and user requirements.

Note: *Tacusil™* EPA0126 is sensitive to excursions above room temperature. Exposure to higher temperature, or cycling of product temperature, will shorten product shelf life.