

Number of Components:	Single	Minimum Bond Line Cure Schedule*:	
Mix Ratio By Weight:	N/A	100mW/cm ² for >2 minutes @ 320-500 nm (depending on thickness)	
Specific Gravity:	1.20		
Part A			
Part B			
Pot Life:	N/A		
Shelf Life:	One year at room temperature		

Note: Container(s) should be kept closed in a dark location when not in use. *Please see Applications Note(s) available on our website.

Product Description:

EPO-TEK[®] OG116-31 is a single component, UV curable epoxy adhesive and encapsulant, designed for PCB and circuit assembly applications found in semiconductor, computer, medical, and scientific/OEM industries.

EPO-TEK[®] OG116-31 Advantages & Application Notes:

- Viscosity/rheology adapted to high volume syringe needle dispensing with no tailing.
- Complies with USP Class VI biocompatibility standards.
- Versatility in cure. Product responds to a broad range of UV light, and secondary thermal post-curing.
- Suggested applications:
 - Semiconductor: COB glob top covering IC's and wire bonds; glob top dam; encapsulating and sealing; adhesion to FR4, Kapton, silicon.
 - Fiber Optic: making fiber optic pigtailed; active alignment of optics; adhesion to many types of glass, metals, ceramics and plastics.
 - Opto-electronic:
 - Perimeter/main seal for LCD's, compatible with VAN liquid crystal for LCoS devices.
 - Adhesive technology described in Technical Paper # 55 - <http://www.epotek.com/technical-papers.asp>
- High Tg and low outgassing are indicative of its high temperature performance.

Typical Properties: (To be used as a guide only, not as a specification. Data below is not guaranteed. Different batches, conditions and applications yield differing results; * denotes test on lot acceptance basis; Cure condition: varies as required)

Physical Properties:	
*Color: Cloudy White	Die Shear Strength @ 23°C: ≥ 10 Kg / 3,400 psi
*Consistency: Viscous liquid	Degradation Temp. (TGA): 409°C
*Viscosity (@ 10 RPM/23°C): 20,000 – 30,000 cPs	Weight Loss:
Thixotropic Index: 1.3	@ 200°C: 0.31%
*Glass Transition Temp.(Tg): ≥ 115°C (Dynamic Post-Cure Scan 20—200°C; Ramp -10—200°C @ 20°C/Min)	@ 250°C: 0.68%
Coefficient of Thermal Expansion (CTE):	@ 300°C: 1.18%
Below Tg: 41 x 10 ⁻⁶ in/in/°C	Operating Temp:
Above Tg: 170 x 10 ⁻⁶ in/in/°C	Continuous: - 55°C to 200°C
Shore D Hardness: 83	Intermittent: - 55°C to 300°C
	Storage Modulus @ 23°C: 263,581 psi
	Particle Size: < 20 microns
Optical Properties @ 23°C:	
Refractive Index @ 23°C (uncured): 1.5662 @ 589 nm	Spectral Transmission @ 23°C: >96% @ 660-1640 nm >92% @ 500 nm

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