

Leepoxy Plastics, Inc.

3706 W. Ferguson Rd., Fort Wayne, IN 46809

Phone: (260) 747-7411 Fax: (260) 747-7413

LEECURE 31-43 B BF₃ EPOXY CURING AGENT

LEECURE 31-43 B is a latent amine-based epoxy curative catalyzed with boron trifluoride. The BF₃ catalyst allows a lower temperature and/or faster cure while maintaining the lengthy pot life and excellent physical properties typical of aromatic diamine curatives. A Tg of 187 degrees C. is achievable when curing standard bisphenol A resins with LEECURE 31-43 B. With DGEBA resins, its gel times are similar to those imparted by MDA-based hardeners. It is a low viscosity liquid, easily processed with epoxy resins for applications such as filament winding, resin transfer molding, and casting.

TYPICAL PROPERTIES	
Color	Brown
Viscosity, 25°C, cps	350
Density, lbs/gal	8.6
Specific Gravity, g/ml	1.03

TYPICAL HANDLING PROPERTIES	
Mix ratio ¹ , parts by weight	26
Gel Time, 115°C, 3 g, minutes	30
Work Life, 25°C, 250 g, hours	6
Typical Cure Schedule	40 minutes @ 135°C then 2 hours @ 175°C

1. Mix ratio with Bisphenol A resin (EEW=189)

TYPICAL PERFORMANCE PROPERTIES	
Hardness, shore D	>85
Tensile Strength, psi	9,400
Tensile Modulus, psi	369,000
Elongation, %	4.4
Flexural Strength, psi	13,400
Flexural Modulus, psi	370,000
Tg (DSC), °C	187

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