TDS

TECHNICAL DATA SHEET

ENTROPY RESINS®

Compression Molding System

High Bio-Content, General Purpose Liquid Epoxy Resin

Product Overview

CPM is a compression molding resin for fast cycle times in heat-assisted molding processes of fiber-reinforced composites. The CPM System delivers a high bio-content, excellent fiber wetting qualities, and thixotropic characteristics to limit sag in high-temperature cure applications. A high modulus combined with excellent elongation properties enable durable yet lightweight composite parts. CPM is a USDA Certified BioPreferred® Product with 30% biobased content

	CPF FAST	CPS SLOW
MECHANICAL DATA		
Tensile Modulus (ASTM D638)	435,700 psi (3.0 GPa)	436,000 psi (3.0 GPa)
Tensile Strength (ASTM D638)	8,860 psi (61.1 MPa)	8990 psi (62.0 MPa)
Elongation (ASTM D638)	6%	6%
Flexural Modulus (ASTM D790)	405,790 psi (2.8 GPa)	412,510 psi (2.8 GPa)
Flexural Strength (ASTM D790)	13,560 psi (93.5 MPa)	13,450 psi (92.7 MPa)
Compression Strength (ASTM D695)	12,630 psi (87.1 MPa)	11,410psi (78.7 MPa)
Tg Ultimate (DSC, midpoint)	159°F/71°C	158°F/70°C
Hardness (Shore D)	70-80	70-80
PROCESSING DATA		
Mix Ratio (by volume)	2:1	2:1
Mix Ratio (by weight)	100:42	100:42
Viscosity (A/B/Mixed @ 77°F/25°C)	1600/1700/2300	1600/530/1600
Component Density (specific density @ 77°F/25°C)	1.13 (resin), 0.99 (hardener)	1.13 (resin), 0.96 (hardener)
Mixed Density (specific density @ 77°F/25°C)	1.09	1.08
Pot Life (@ 77°F/25°C)	20 min	50 min
Tack Free Time (@ 95°F/35°C)	N/A	N/A
Recommended Full Cure	20 min @ 180°F/82°C	40 min @ 180°F/82°C
ENVIRONMENTAL DATA		
VOC Content (ASTM D2369)	0.03 lbs/gal (3.31 g/L)	0.02 lbs/gal (2.18 g/L)
Mixed Biobased Carbon Content (ASTM D6866)	30%	33%

This technical information is provided in good faith and is based on the best knowledge of Gougeon Brothers, Inc. We cannot guarantee this data because conditions of product use are beyond our control.

AMERICAS
ENTROPY RESINS
info@entropyresins.com
310.882.2120

100 Patterson Ave., Bay City, MI 48706
entropyresins.com

SUPER SAP® FORMULATION

USDA CERTIFIED BIOBASED PRODUCT PRODUCT 30%

1% FOR THE PLANET