

# Premi-Glas® 3100-20

## Bulk Molding Compound

### PRODUCT DESCRIPTION

Glass fiber reinforced Polyester BMC suitable for electrical and flame retardant applications

### GENERAL

<b>Material Status</b>	• Commercial: Active	
<b>Availability</b>	• North America • Asia Pacific	• Europe • South America
<b>Filler/Reinforcement</b>	• Glass Fiber and mineral filler	
<b>Features (two rows only)</b>	• Excellent thermal resistance • UL Recognized—File E69414	• Excellent property retention in cold/hot environments • UL94-V0 @1.5 mm
<b>Processing Method</b>	• This BMC product is generally intended to be compression, injection or transfer molded in matched metal die molds, typically at 300°F (150°C) and 500 to 1,000 psi (35-65 BAR) molding pressure. Strength values may be affected by the molding process. Available in extrusions	
<b>Resin</b>	• Unsaturated Polyester Composite	

PHYSICAL	Typical	Unit	Test Method
Density	1.70-1.85	g/cm <sup>3</sup>	ASTM D792
Mold Shrinkage (RT mold/RT part)	0.0015-0.0035	in/in	ASTM D955
CLTE, X-Y plane	25	ppm/°C	ASTM E831
CLTE, Z plane	35	ppm/°C	ASTM E831
Poisson's Ratio	0.36		ASTM D638

MECHANICAL (As cut)	Typical	Unit	Test Method
Tensile Modulus	1.8 x 10 <sup>6</sup> (12)	psi (GPa)	ASTM D638
Tensile Strength	5,500 (38)	psi (MPa)	ASTM D638
Flexural Modulus (RT)	1.5 x 10 <sup>6</sup> (10)	psi (GPa)	ASTM D790
Flexural Strength	16,000 (110)	psi (MPa)	ASTM D790

# Premi-Glas® 3100-20

## Bulk Molding Compound

<b>IMPACT</b>	<b>Typical</b>	<b>Unit</b>	<b>Test Method</b>
Izod Notched Impact Strength	8 (450)	ft-lb/in (J/m)	ASTM D256
Unnotched Impact Strength	10 (530)	ft-lb/in (J/m)	ASTM D4812
<b>THERMAL</b>	<b>Typical</b>	<b>Unit</b>	<b>Test Method</b>
Thermal Conductivity, 25°C	0.3	W/m-°K	ASTM E1461
UL RTI, Electrical	266 (130)	°F (°C)	UL 746C
UL RTI, Mechanical with Impact	266 (130)	°F (°C)	UL 746C
UL RTI, Mechanical without Impact	266 (130)	°F (°C)	UL 746C
<b>FLAMMABILITY</b>	<b>Typical</b>	<b>Unit</b>	<b>Test Method</b>
Flammability	Pass 0.060 (1.5)	in (mm)	UL94 V-0
<b>ELECTRICAL</b>	<b>Typical</b>	<b>Unit</b>	<b>Test Method</b>
Dielectric Strength	380 (15)	Volts/mil (kV/mm)	ASTM D149
Arc Track Resistance	180+	seconds	ASTM D495

UL File Number E69414



For additional information, please contact:

**A. Schulman Inc., Engineered Composites**  
 1600 Powis Ct, West Chicago, IL 60185  
 p: 630-377-1065  
 f: 630-377-7395  
[www.aschulman.com](http://www.aschulman.com)

The information and recommendations contained in this document are based upon data collected by A. Schulman and are believed to be reliable; however, because A. Schulman cannot anticipate or control the many different conditions under which this information and/or product may be used, no representation is made and no warranty is given of any kind, express or implied, for completeness, accuracy, availability, suitability, usefulness, commercial value, or non-violation of intellectual property rights of information, recommendation, and products and services directly or indirectly provided. A. Schulman assumes no responsibility for the results of the use of products and processes described herein and expressly disclaims the implied warranties of merchantability and fitness for a particular use.