# BMC 501E

### Thermoset Polyester

Bulk Molding Compounds, Inc.

#### Message:

BMC 501E molding compound is a mineral filled, glass-fiber-reinforced polyester compound suitable for compression and transfer molding. It is a product with good overall electrical properties, flame resistance, and low water absorption. Distinguished from other materials by its very soft flow, it is an excellent compound for encapsulating delicate components. Typical applications include coil and solenoid Encapsulation. BMC 501E molding compound is produced in extruded form in a range on industrial colors. Because of the soft consistency of this product, it is only available in logs from 3 inches to 12 inches in length and from 1" to 2 <sup>1</sup>/<sub>2</sub>" in diameter. Within this range, smaller diameters are supplied as multiple extrusions.

General Information					
Filler / Reinforcement	Glass\Mineral				
Features	Flame Retardant				
	Good Electrical Properties				
	Low to No Water Absorption				
Uses	Coating Applications				
Appearance	Colors Available				
Forms	BMC - Bulk Molding Compound				
Processing Method	Compression Molding				
Physical	Nominal Value	Unit	Test Method		
Specific Gravity	1.77	g/cm³	ASTM D792		
Molding Shrinkage - Flow (Compression		<i></i>			
Molded)	0.0 to 0.15	%	ASTM D955		
Water Absorption (23°C, 24 hr)	0.10	%	ASTM D570		
Hardness	Nominal Value	Unit	Test Method		
Barcol Hardness	5.0		ASTM D2583		
Mechanical	Nominal Value	Unit	Test Method		
Tensile Strength (Yield, Compression Molded)	34.5	MPa	ASTM D638		
Flexural Strength (Compression Molded)	75.8	MPa	ASTM D790		
Compressive Strength	89.6	MPa	ASTM D695		
Impact	Nominal Value	Unit	Test Method		
Notched Izod Impact (Compression					
Molded)	120	J/m	ASTM D256		
Thermal	Nominal Value	Unit	Test Method		
Deflection Temperature Under Load (1.8 MPa, Unannealed, Compression Molded)	204	°C	ASTM D648		
Electrical	Nominal Value	Unit	Test Method		
Dielectric Strength <sup>1</sup>	12	kV/mm	ASTM D149		
Dielectric Constant (60 Hz)	4.90		ASTM D150		
Dissipation Factor (60 Hz)	7.0E-3		ASTM D150		
Arc Resistance	180	sec	ASTM D495		

Comparative Tracking Index (CTI)	500	V	UL 746
Flammability	Nominal Value	Unit	Test Method
Flame Rating			UL 94
1.59 mm	V-0		
3.18 mm	V-0		
6.35 mm	V-0		
Injection	Nominal Value	Unit	
Mold Temperature	138 to 166	°C	
NOTE			
1.	Method A (Short-Time)		

The information and data on this page are provided by manufacturers and document providers. SHANGHAI SUSHENG assumes no legal liability. It is strongly recommended to verify all technical data with material suppliers before final material selection. All rights belong to the original authors. If any infringement occurs, please contact us immediately.

#### Recommended distributors for this material

## Susheng Import & Export Trading Co.,Ltd.

Tel: +86 21 5895 8519

Phone: +86 13424755533

Email: sales@su-jiao.com

No. 215, Lianhe North Road, Fengxian District, Shanghai, China

