

PBI Performance Products Celazole® TU-60 Unreinforced Melt Processable Polybenzimidazole

Category : Polymer , Thermoplastic , Polybenzimidazole (PBI)

Material Notes:

Celazole® polybenzimidazole (PBI) resin is a unique and highly stable linear hetrocyclic polymer. PBI is characterized by high strength; excellent thermal stability, and broad chemical resistance. Celazole® T-Series products combine the superior mechanical properties and thermal resistance of PBI with the melt process ability of polyaryletherketones. Designed for injection molding and extrusion TU-60 is a high performance unfilled blend, ideal for applications requiring no fillers. This material works well for complex geometries and offers the best process ability. Ideal for lamp sockets, connectors and back up seals. Information provided by PBI Performance Products

Order this product through the following link:

http://www.lookpolymers.com/polymer_PBI-Performance-Products-Celazole-TU-60-Unreinforced-Melt-Processable-Polybenzimidazole.php

Physical Properties	Metric	English	Comments
Specific Gravity	1.30 g/cc	1.30 g/cc	
Moisture Absorption at Equilibrium	6.5 %	6.5 %	ASTM D570
Loss On Ignition	5.0 %	5.0 %	Air; ASTM TGA
	@Temperature 499 °C	@Temperature 930 °F	
	5.0 %	5.0 %	Nitrogen; ASTM TGA
	@Temperature 499 °C	@Temperature 930 °F	

Mechanical Properties	Metric	English	Comments
Hardness, Rockwell A	25	25	ASTM D785
Tensile Strength	100 MPa	14500 psi	ASTM D638
Elongation at Break	2.2 %	2.2 %	
Tensile Modulus	5.00 GPa	725 ksi	
Flexural Strength	175 MPa	25400 psi	ASTM D790
Flexural Modulus	5.00 GPa	725 ksi	
Compressive Strength	206 MPa	29900 psi	ASTM D695
Compressive Modulus	2.90 GPa	421 ksi	

Thermal Properties	Metric	English	Comments
CTE, linear	34.0 µm/m-°C	18.9 µin/in-°F	ASTM TMA
	@Temperature 25.0 -	@Temperature 77.0 -	

Thermal Properties	150 °C Metric	302 °F English	Comments
	70.0 µm/m-°C	38.9 µin/in-°F	
	@Temperature 200 - 300 °C	@Temperature 392 - 572 °F	ASTM TMA

Electrical Properties	Metric	English	Comments
Volume Resistivity	2.00e+16 ohm-cm	2.00e+16 ohm-cm	ASTM D257
Dielectric Constant	3.4	3.4	ASTM D150
	@Frequency 1000 Hz	@Frequency 1000 Hz	
Dielectric Strength	3.4	3.4	ASTM D150
	@Frequency 10000 Hz	@Frequency 10000 Hz	
Dielectric Strength	17.0 kV/mm	432 kV/in	ASTM D149
Dissipation Factor	0.0010	0.0010	ASTM D150
	@Frequency 10000 Hz	@Frequency 10000 Hz	
Arc Resistance	135 sec	135 sec	ASTM D495

Contact Songhan Plastic Technology Co.,Ltd.

Website : www.lookpolymers.com

Email : sales@lookpolymers.com

Tel : +86 021-51131842

Mobile : +86 13061808058

Skype : lookpolymers

Address : United North Road 215,Fengxian District, Shanghai City,China