

Plenco 5488 Phenolic, Granular, Injection Molded

Category : Polymer , Thermoset , Filled/Reinforced Thermoset , Phenolic

Material Notes:

PLENCO 05488 is a woodflour and graphite filled phenolic molding compound offering improved abrasion resistance. UL recognized under component file E40654. 05488 is available in brown. 05488 is not recommended for electrical insulating applications. Information supplied by Plenco.

Order this product through the following link:

http://www.lookpolymers.com/polymer_Plenco-5488-Phenolic-Granular-Injection-Molded.php

Physical Properties	Metric	English	Comments
Bulk Density	0.650 g/cc	0.0235 lb/in ³	ASTM D1895
Density	1.45 g/cc	0.0524 lb/in ³	ASTM D792
Water Absorption	0.267 %	0.267 %	ASTM D570
Linear Mold Shrinkage	0.0083 cm/cm	0.0083 in/in	ASTM D955

Mechanical Properties	Metric	English	Comments
Hardness, Rockwell E	82	82	ASTM D785
Tensile Strength, Ultimate	61.0 MPa	8850 psi	ASTM D638
Elongation at Break	0.91 %	0.91 %	ASTM D638
Tensile Modulus	8.50 GPa	1230 ksi	ASTM D638
Flexural Strength	93.0 MPa	13500 psi	ASTM D790
Flexural Modulus	7.60 GPa	1100 ksi	ASTM D790
Compressive Strength	189 MPa	27400 psi	ASTM D695
Poissons Ratio	0.35	0.35	ASTM D638
Shear Modulus	3.15 GPa	457 ksi	Calculated
Izod Impact, Notched	0.166 J/cm	0.311 ft-lb/in	ASTM D256
Charpy Impact, Notched	0.178 J/cm ²	0.847 ft-lb/in ²	ASTM D256
Impact	100	100	J/m Drop Ball Impact; PLENCO

Thermal Properties	Metric	English	Comments
CTE, linear	46.0 $\mu\text{m}/\text{m}\cdot^{\circ}\text{C}$	25.6 $\mu\text{in}/\text{in}\cdot^{\circ}\text{F}$	TMA; ASTM E831
	@Temperature 40.0 -	@Temperature 104 -	

Thermal Properties	130 °C Metric	266 °F English	Comments
Thermal Conductivity	0.510 W/m-K @Temperature 100 °C	3.54 BTU-in/hr-ft ² -°F @Temperature 212 °F	ASTM E1461
Maximum Service Temperature, Air	201 °C	394 °F	Heat Resistance; ASTM D570D
Deflection Temperature at 1.8 MPa (264 psi)	155 °C	311 °F	ASTM D648
Flammability, UL94	V-0 @Thickness 3.00 mm	V-0 @Thickness 0.118 in	
Oxygen Index	27.5 %	27.5 %	ASTM D2863
Shrinkage	0.269 %	0.269 %	72 hr, 120°C; ASTM D1299

Electrical Properties	Metric	English	Comments
Volume Resistivity	8.00e+10 ohm-cm	8.00e+10 ohm-cm	ASTM D247
Dielectric Constant	10.2	10.2	ASTM D150
Dissipation Factor	0.061	0.061	ASTM D150
Arc Resistance	137 sec	137 sec	ASTM D495
Comparative Tracking Index	175 V	175 V	ASTM D3638

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