

Bergamid™ B70 G60 Black Polyamide 6

Key Characteristics

Description	

Bergamid B70 G60 Black is a Polyamide 6 (Nylon 6) product filled with 60% glass fiber. It can be processed by injection molding.

General	
Material Status	Commercial: Active
Regional Availability	Europe
Filler / Reinforcement	Glass Fiber, 60% Filler by Weight
Appearance	Black
Forms	Pellets
Processing Method	Injection Molding

Technical Properties 1

Physical	Typical Value (English)	Typical Value (SI)	Test Method
Density (73°F (23°C))	1.70 g/cm³	1.70 g/cm ³	ISO 1183
Mechanical	Typical Value (English)	Typical Value (SI)	Test Method
Tensile Modulus			ISO 527-2/1
73°F (23°C), 0.157 in (4.00 mm), Injection Molded	2.18E+6 psi	15000 MPa	
Tensile Strength ²			ISO 527
73°F (23°C), 0.157 in (4.00 mm), Injection Molded	26100 psi	180 MPa	
Tensile Strain ³			ISO 527
Break, 73°F (23°C), 0.157 in (4.00 mm), Injection Molded	2.0 %	2.0 %	
Impact	Typical Value (English)	Typical Value (SI)	Test Method
Charpy Notched Impact Strength (73°F (23°C))	5.7 ft·lb/in²	12 kJ/m²	ISO 179
Charpy Unnotched Impact Strength			ISO 179
73°F (23°C)	24 ft·lb/in²	50 kJ/m²	
Thermal	Typical Value (English)	Typical Value (SI)	Test Method
Heat Deflection Temperature			ISO 75-2/A
264 psi (1.8 MPa), Unannealed	419°F	215 °C	
Melting Temperature (DSC)	428 to 437 °F	220 to 225 °C	ISO 3146
Electrical	Typical Value (English)	Typical Value (SI)	Test Method
Surface Resistivity	1.0E+14 ohms	1.0E+14 ohms	IEC 60093
Volume Resistivity	1.0E+16 ohms·cm	1.0E+16 ohms·cm	IEC 60093

Processing Information

Injection	Typical Value (English)	Typical Value (SI)	
Drying Temperature	176 °F	80 °C	
Drying Time	4.0 hr	4.0 hr	
Processing (Melt) Temp	482 to 536 °F	250 to 280 °C	
Mold Temperature	122 to 194 °F	50 to 90 °C	

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- ¹ Typical values are not to be construed as specifications.
- ² 0.20 in/min (5.0 mm/min)
- ³ 0.20 in/min (5 mm/min)

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