



Bergamid™ B700

Polyamide 6

Key Characteristics

General			
Material Status	• Commercial: Active		
Regional Availability	• Africa & Middle East	• Asia Pacific	• Europe
RoHS Compliance	• RoHS Compliant		
Forms	• Pellets		

Technical Properties ¹

Physical	Typical Value (English)	Typical Value (SI)	Test Method
Density ²	1.13 g/cm ³	1.13 g/cm ³	DIN 53479
K-Value ³	74.0 to 78.0	74.0 to 78.0	
Mechanical	Typical Value (English)	Typical Value (SI)	Test Method
Tensile Modulus (73°F (23°C))	160000 psi	1100 MPa	ISO 527-2/1
Tensile Stress (Yield, 73°F (23°C))	7250 psi	50.0 MPa	ISO 527-2/50
Tensile Strain (Yield, 73°F (23°C))	22 %	22 %	ISO 527-2/50
Impact	Typical Value (English)	Typical Value (SI)	Test Method
Charpy Notched Impact Strength			ISO 179/1eA
-22°F (-30°C)	1.9 ft·lb/in ²	4.0 kJ/m ²	
73°F (23°C)	2.9 ft·lb/in ²	6.0 kJ/m ²	
Charpy Unnotched Impact Strength			ISO 179/1eU
-22°F (-30°C)	No Break	No Break	
73°F (23°C)	No Break	No Break	
Thermal	Typical Value (English)	Typical Value (SI)	Test Method
Heat Deflection Temperature			ISO 75-2/B
66 psi (0.45 MPa), Unannealed	338 °F	170 °C	
Heat Deflection Temperature			ISO 75-2/A
264 psi (1.8 MPa), Unannealed	149 °F	65.0 °C	
Maximum Use Temperature			IEC 60216
-- ⁴	167 °F	75 °C	
Short Time	347 °F	175 °C	
Melting Temperature (DSC)	433 °F	223 °C	ISO 3146
Electrical	Typical Value (English)	Typical Value (SI)	Test Method
Surface Resistivity	1.0E+10 ohms	1.0E+10 ohms	IEC 60093
Volume Resistivity	1.0E+12 ohms·cm	1.0E+12 ohms·cm	IEC 60093
Electric Strength	1500 V/mil	60 kV/mm	IEC 60243-1
Relative Permittivity (1 MHz)	7.00	7.00	IEC 60250
Dissipation Factor (1 MHz)	0.30	0.30	IEC 60250
Comparative Tracking Index (Solution A)	600 V	600 V	IEC 60112
Flammability	Typical Value (English)	Typical Value (SI)	Test Method
Flame Rating (0.031 in (0.8 mm), ALL)	V-2	V-2	Internal Method

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Notes

¹ Typical values are not to be construed as specifications.

² ±0.03 g/cm³

³ 96% H₂SO₄

⁴ Continuous (GTP 50% Tensile)

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