

Nymax[™] GF 1200 A 33 HR HS Natural Polyamide 66

Key Characteristics

Product Description

The Nymax® GF 1200 Series of glass fiber-reinforced nylon 6/6 compounds have been specifically formulated for applications requiring high stiffness, tensile properties, heat resistance, and durability in harsh environments. These materials are available in a broad range of reinforcement levels depending upon stiffness characteristics desired and have been formulated to offer ease of processing in most standard thermoplastic processing equipment

General				
Material Status	Commercial: Active			
Regional Availability	 North America 	 South America 		
Filler / Reinforcement	 Glass Fiber Reinforcement, 33% Filler by Weight 			
Additive	Heat Stabilizer	 Hydrolysis Resistant 		
Features	General Purpose	 Heat Stabilized 		
Uses	Automotive ApplicationsConstruction Applications	Consumer ApplicationsGeneral Purpose	 Industrial Applications 	
Appearance	 Natural Color 			
Forms	Pellets			
Processing Method	Injection Molding			

Technical Properties 1

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Physical	Typical Value (English)	Typical Value (SI)	Test Method
Specific Gravity	1.38	1.38	ASTM D792
Molding Shrinkage - Flow	0.0030 to in/in 0.0050	0.30 to 0.50 %	ASTM D955
Water Absorption (24 hr, 0.125 in (3.18 mm))	1.0 %	1.0 %	ASTM D570
Mechanical	Typical Value (English)	Typical Value (SI)	Test Method
Tensile Modulus	1.00E+6 psi	6890 MPa	ASTM D638
Tensile Strength ² (Break)	26500 psi	183 MPa	ASTM D638
Tensile Elongation ² (Break)	3.0 to 4.0 %	3.0 to 4.0 %	ASTM D638
Flexural Modulus	1.00E+6 psi	6890 MPa	ASTM D790
Flexural Strength	28000 psi	193 MPa	ASTM D790
mpact	Typical Value (English)	Typical Value (SI)	Test Method
Notched Izod Impact			ASTM D256A
73°F (23°C), 0.125 in (3.18 mm), Injection Molded	2.00 ft·lb/in	107 J/m	
Thermal	Typical Value (English)	Typical Value (SI)	Test Method
Deflection Temperature Under Load		<u> </u>	ASTM D648
264 psi (1.8 MPa), Unannealed, 0.125 in (3.18 mm)	473 °F	245 °C	

Additional Properties

Molded Test Bars: Dry as Molded

Notes

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¹ Typical values are not to be construed as specifications.

² Type I, 0.20 in/min (5.1 mm/min)

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