

SABIC Innovative Plastics LNP LUBRICOMP HFG25Z PA 11

Category : Polymer , Thermoplastic , Nylon , Nylon 11

Material Notes:

LNP* Lubricomp* HFG25Z is a compound based on Nylon 11 resin containing 25% Glass Fiber, 10% Graphite. Added features of this material include: Internally Lubricated.

Order this product through the following link:

http://www.lookpolymers.com/polymer_SABIC-Innovative-Plastics-LNP-LUBRICOMP-HFG25Z-PA-11.php

Physical Properties	Metric	English	Comments
Density	1.30 g/cc	0.0470 lb/in ³	ASTM D792
	1.30 g/cc	0.0470 lb/in ³	ISO 1183
Moisture Absorption	0.100 %	0.100 %	50% RH, 24 hrs; ASTM D570
Linear Mold Shrinkage, Flow	0.0047 cm/cm	0.0047 in/in	ISO 294
	@Time 86400 sec	@Time 24.0 hour	
	0.0040 - 0.0060 cm/cm	0.0040 - 0.0060 in/in	ASTM D955
	@Time 86400 sec	@Time 24.0 hour	
Linear Mold Shrinkage, Transverse	0.0080 - 0.010 cm/cm	0.0080 - 0.010 in/in	ASTM D955
	@Time 86400 sec	@Time 24.0 hour	
	0.0093 cm/cm	0.0093 in/in	ISO 294
	@Time 86400 sec	@Time 24.0 hour	

Mechanical Properties	Metric	English	Comments
Tensile Strength at Break	76.0 MPa	11000 psi	ISO 527
	152 MPa	22000 psi	ASTM D638
Tensile Strength, Yield	76.0 MPa	11000 psi	ISO 527
	152 MPa	22000 psi	ASTM D638
Elongation at Break	2.3 %	2.3 %	ISO 527
	2.7 %	2.7 %	ASTM D638
Elongation at Yield	2.2 %	2.2 %	ISO 527
	2.7 %	2.7 %	ASTM D638
Tensile Modulus	6.83 GPa	991 ksi	1 mm/min; ISO 527

Mechanical Properties	11.03 GPa Metric	1600 ksi English	50 mm/min; ASTM D638 Comments
Flexural Strength	96.0 MPa	13900 psi	ASTM D790
	352 MPa	51100 psi	ISO 178
Flexural Modulus	5.51 GPa	799 ksi	ASTM D790
	18.2 GPa	2640 ksi	ISO 178
Izod Impact, Notched	0.690 J/cm	1.29 ft-lb/in	ASTM D256
Izod Impact, Unnotched	4.53 J/cm	8.49 ft-lb/in	ASTM D4812
Izod Impact, Notched (ISO)	7.00 kJ/m ²	3.33 ft-lb/in ²	80*10*4; ISO 180/1A
Izod Impact, Unnotched (ISO)	29.0 kJ/m ²	13.8 ft-lb/in ²	80*10*4; ISO 180/1U
Dart Drop, Total Energy	15.0 J	11.1 ft-lb	Instrumented Impact Energy @ peak; ASTM D3763
Impact Test	3.00 J	2.21 ft-lb	Multiaxial Impact; ISO 6603
Coefficient of Friction, Dynamic	0.41	0.41	ASTM D3702 Modified
Coefficient of Friction, Static	0.45	0.45	ASTM D3702 Modified
K (wear) Factor	117 x 10 ⁻⁸ mm ³ /N-M	58.0 x 10 ⁻¹⁰ in ³ - min/ft-lb-hr	Washer; ASTM D3702 Modified

Thermal Properties	Metric	English	Comments
CTE, linear, Parallel to Flow	91.8 Âµm/m-Â°C	51.0 Âµin/in-Â°F	ASTM E 831
	@Temperature -40.0 - 40.0 Â°C	@Temperature -40.0 - 104 Â°F	
	92.0 Âµm/m-Â°C	51.1 Âµin/in-Â°F	ISO 11359-2
	@Temperature -40.0 - 40.0 Â°C	@Temperature -40.0 - 104 Â°F	
CTE, linear, Transverse to Flow	34.2 Âµm/m-Â°C	19.0 Âµin/in-Â°F	ASTM E 831
	@Temperature -40.0 - 40.0 Â°C	@Temperature -40.0 - 104 Â°F	
	35.0 Âµm/m-Â°C	19.4 Âµin/in-Â°F	ISO 11359-2
	@Temperature -40.0 - 40.0 Â°C	@Temperature -40.0 - 104 Â°F	
Deflection Temperature at 0.46 MPa (66 psi)	182 Â°C	360 Â°F	Flatw 80*10*4 sp=64mm; ISO 75/Bf
	182 Â°C	360 Â°F	unannealed; ASTM D648
	@Thickness 3.20 mm	@Thickness 0.126 in	

Thermal Properties T _g at 1.8 MPa (264 psi)	Metric	English	Comments
	171 Â°C	340 Â°F	unannealed; ASTM D648
	@Thickness 3.20 mm	@Thickness 0.126 in	

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