SABIC Innovative Plastics™

LNP* Thermotuf* Compound WF006I

Americas: COMMERCIAL

Also known as: WF-1006 HI
Product Reorder Name: WF006I

LNP THERMOTUF* WF006I is a compound based on Polyester, TP resin containing Glass Fiber. Added features of this material include: High Impact.

Property

TYPICAL PROPERTIES (1)			
MECHANICAL	Value	Unit	Standard
Tensile Stress, yield	107	MPa	ASTM D 638
Tensile Stress, break	106	MPa	ASTM D 638
Tensile Strain, yield	3.2	%	ASTM D 638
Tensile Strain, break	3.9	%	ASTM D 638
Tensile Modulus, 50 mm/min	8960	MPa	ASTM D 638
Flexural Stress	173	MPa	ASTM D 790
Flexural Modulus	7510	MPa	ASTM D 790
Tensile Stress, yield	109	MPa	ISO 527
Tensile Strain, yield	2.1	%	ISO 527
Tensile Strain, break	2.8	%	ISO 527
Tensile Modulus, 1 mm/min	6520	MPa	ISO 527
Flexural Stress	181	MPa	ISO 178
Flexural Modulus	8620	MPa	ISO 178
IMPACT	Value	Unit	Standard
Izod Impact, unnotched, 23°C	998	J/m	ASTM D 4812
Izod Impact, notched, 23°C	186	J/m	ASTM D 256
Instrumented Impact Energy @ peak, 23°C	17	J	ASTM D 3763
Izod Impact, unnotched 80*10*4 +23°C	64	kJ/m²	ISO 180/1U
Izod Impact, notched 80*10*4 +23°C	20	kJ/m²	ISO 180/1A
THERMAL	Value	Unit	Standard
HDT, 1.82 MPa, 3.2mm, unannealed	210	°C	ASTM D 648
PHYSICAL	Value	Unit	Standard
Density	1.474	g/cm³	ASTM D 792
Mold Shrinkage, flow, 24 hrs	0.3	%	ASTM D 955
Mold Shrinkage, xflow, 24 hrs	1.3	%	ASTM D 955
Mold Shrinkage, flow, 24 hrs	0.29	%	ISO 294
Mold Shrinkage, xflow, 24 hrs	1.29	%	ISO 294
Density	1.47	g/cm³	ISO 1183

Source GMD, last updated:10/02/2004

Processing

Parameter		
Injection Molding	Value	Unit
Drying Temperature	120	°C
Drying Time	4	hrs
Maximum Moisture Content	0.05	%

Melt Temperature	240 - 265	°C
Front - Zone 3 Temperature	260 - 270	°C
Middle - Zone 2 Temperature	245 - 255	°C
Rear - Zone 1 Temperature	220 - 230	°C
Mold Temperature	80 - 100	°C
Back Pressure	0.2 - 0.3	MPa
Screw Speed	30 - 60	rpm

Source GMD, last updated:10/02/2004

THESE PROPERTY VALUES ARE NOT INTENDED FOR SPECIFICATION PURPOSES.

PLEASE CHECK WITH YOUR (LOCAL SALES OFFICE) FOR AVAILABILITY IN YOUR REGION

(1) Typical values only. Variations within normal tolerances are possible for various colors. All values are measured after at least 48 hours storage at 23°C/50% relative humidity. All properties, except the melt volume and melt flow rates, are measured on injection molded samples. All samples tested under ISO test standards are prepared according to ISO 294.
(2) Only typical data for selection purposes. Not to be used for part or tool design.
(3) This rating is not intended to reflect hazards presented by this or any other material under actual fire conditions.
(4) Internal measurements according to UL standards.