

LNP* Thermocomp* Compound RF0039S

Americas: COMMERCIAL

Also known as: RF-1003 FR HS
Product Reorder Name: RF0039S

LNP THERMOCOMP* RF0039S is a compound based on Nylon 66 resin containing Glass Fiber, Flame Retardant. Added features of this material include: Flame Retardant.

Property

TYPICAL PROPERTIES ⁽¹⁾			
MECHANICAL	Value	Unit	Standard
Tensile Stress, break	100	MPa	ASTM D 638
Tensile Strain, break	3	%	ASTM D 638
Tensile Modulus, 50 mm/min	6060	MPa	ASTM D 638
Flexural Stress	160	MPa	ASTM D 790
Flexural Modulus	5170	MPa	ASTM D 790
Tensile Stress, break	98	MPa	ISO 527
Tensile Strain, break	2.9	%	ISO 527
Tensile Modulus, 1 mm/min	6300	MPa	ISO 527
Flexural Stress	164	MPa	ISO 178
Flexural Modulus	600	MPa	ISO 178
IMPACT	Value	Unit	Standard
Izod Impact, unnotched, 23°C	523	J/m	ASTM D 4812
Izod Impact, notched, 23°C	42	J/m	ASTM D 256
Instrumented Impact Energy @ peak, 23°C	5	J	ASTM D 3763
Multiaxial Impact	1	J	ISO 6603
Izod Impact, unnotched 80*10*4 +23°C	38	kJ/m ²	ISO 180/1U
Izod Impact, notched 80*10*4 +23°C	5	kJ/m ²	ISO 180/1A
THERMAL	Value	Unit	Standard
HDT, 0.45 MPa, 3.2 mm, unannealed	251	°C	ASTM D 648
HDT, 1.82 MPa, 3.2mm, unannealed	226	°C	ASTM D 648
HDT/Af, 1.8 MPa Flatw 80*10*4 sp=64mm	219	°C	ISO 75/Af
PHYSICAL	Value	Unit	Standard
Density	1.487	g/cm ³	ASTM D 792
Moisture Absorption, 50% RH, 24 hrs	0.49	%	ASTM D 570
Mold Shrinkage, flow, 24 hrs	0.9	%	ASTM D 955
Mold Shrinkage, xflow, 24 hrs	1.3	%	ASTM D 955
Mold Shrinkage, flow, 24 hrs	0.89	%	ISO 294
Mold Shrinkage, xflow, 24 hrs	1.29	%	ISO 294
Density	1.48	g/cm ³	ISO 1183
FLAME CHARACTERISTICS	Value	Unit	Standard
UL Compliant, 94V-0 Flame Class Rating (3)(4)	1.7	mm	UL 94 by GE

Source GMD, last updated:10/02/2004

Processing

Parameter	Value	Unit
Injection Molding		

Drying Temperature	80	°C
Drying Time	4	hrs
Maximum Moisture Content	0.15 - 0.25	%
Melt Temperature	275 - 290	°C
Front - Zone 3 Temperature	295 - 305	°C
Middle - Zone 2 Temperature	280 - 295	°C
Rear - Zone 1 Temperature	265 - 275	°C
Mold Temperature	80 - 95	°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.

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