LNP* Thermocomp* RF0049SP

Polyamide 66

SABIC Innovative Plastics

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Technical Data

Product Description

LNP* Thermocomp* RF0049SP is a compound based on Nylon 66 containing Glass Fiber. Characteristics of this grade include: Flame Retardant, Heat Stabilized.

Also known as: LNP* Thermocomp* Compound RF-1004 FR HS
Product reorder name: RF0049SP

General

Material Status	• Commercial: Active	
Literature [1]	• Technical Datasheet	
UL Yellow Card [2]	• E121562-101281598 • E45195-235919	
Search for UL Yellow Card	• SABIC Innovative Plastics • LNP* Thermocomp*	
Availability	• North America	
Filler / Reinforcement	• Glass Fiber Reinforcement	
Additive	• Flame Retardant	• Heat Stabilizer
Features	• Flame Retardant	• Heat Stabilized
Processing Method	• Injection Molding	

Physical	Nominal Value	Unit	Test Method
Specific Gravity	1.55	g/cm³	ASTM D792
Molding Shrinkage			ASTM D955
Flow: 24 hr	0.40 to 0.60	%	
Across Flow: 24 hr	1.0 to 3.0	%	
Mechanical	**Nominal Value**	**Unit**	**Test Method**
Tensile Modulus	9610	MPa	ISO 527-2/1
Tensile Strength			
Break [4]	140	MPa	ASTM D638
Break	140	MPa	ISO 527-2/5
Tensile Elongation			
Yield [4]	2.3	%	ASTM D638
Break [4]	2.4	%	ASTM D638
Break	2.2	%	ISO 527-2/5
Flexural Modulus			
50.0 mm Span [5]	8650	MPa	ASTM D790
-- [6]	8170	MPa	ISO 178
Flexural Strength [5] (Break, 50.0 mm Span)	203	MPa	ASTM D790
Impact	**Nominal Value**	**Unit**	**Test Method**
Notched Izod Impact			
23°C	67	J/m	ASTM D256
23°C [7]	7.0	kJ/m²	ISO 180/1A
Unnotched Izod Impact			
23°C	600	J/m	ASTM D4812
23°C [7]	36	kJ/m²	ISO 180/1U
Multi-Axial Instrumented Impact Energy	2.00	J	ISO 6603-2

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Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load			
0.45 MPa, Unannealed, 3.20 mm	255	°C	ASTM D648
0.45 MPa, Unannealed, 64.0 mm Span [8]	253	°C	ISO 75-2/Bf
1.8 MPa, Unannealed, 3.20 mm	241	°C	ASTM D648
1.8 MPa, Unannealed, 64.0 mm Span [8]	235	°C	ISO 75-2/Af

Injection	Nominal Value	Unit
Drying Temperature	82.2	°C
Drying Time	4.0	hr
Suggested Max Moisture	0.15 to 0.25	%
Rear Temperature	266 to 277	°C
Middle Temperature	282 to 293	°C
Front Temperature	293 to 304	°C
Processing (Melt) Temp	277 to 288	°C
Mold Temperature	82.2 to 93.3	°C
Back Pressure	0.172 to 0.344	MPa
Screw Speed	30 to 60	rpm

Notes

[1] These links provide you with access to supplier literature. We work hard to keep them up to date; however you may find the most current literature from the supplier.

[2] A UL Yellow Card contains UL-verified flammability and electrical characteristics. UL IDES continually works to link Yellow Cards to individual plastic materials in Prospector, however this list may not include all of the appropriate links. It is important that you verify the association between these Yellow Cards and the plastic material found in Prospector. For a complete listing of Yellow Cards, visit the UL Yellow Card Search.

[3] Typical properties: these are not to be construed as specifications.

[4] Type I, 5.0 mm/min

[5] 1.3 mm/min

[6] 2.0 mm/min

[7] 80*10*4

[8] 80*10*4 mm

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Where to Buy

Supplier

SABIC Innovative Plastics
Pittsfield, MA USA
Telephone: 800-845-0600
Web: http://www.sabic-ip.com/

Distributor

Nexeo Solutions
Telephone: 800-531-7106
Web: http://www.nexeosolutions.com/
Availability: North America

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