

RTP Compounds 200 UV

Polyamide 66

RTP Company



Prospector

Product Description

Warning: The status of this material is 'Commercial: Limited Issue'

The data for this material has not been recently verified.
Please contact RTP Company for current information prior to specifying this grade.

RTP 200 UV is a UV stabilized nylon 6/6 general purpose resin.

General

Material Status	• Limited Issue		
Availability	• Africa & Middle East • Asia Pacific	• Europe • Latin America	• North America • South America
Additive	• UV Stabilizer		
Features	• Good UV Resistance		
RoHS Compliance	• Contact Manufacturer		
Appearance	• Black	• Natural Color	
Forms	• Pellets		
Processing Method	• Injection Molding		

Physical	Dry	Conditioned	Unit	Test Method
Specific Gravity	1.14	1.14	(g/cm ³)	ASTM D792
Molding Shrinkage - Flow (0.125 in (3.18 mm))	0.015 (1.5)	--	in/in (%)	ASTM D955
Water Absorption (73°F (23°C), 24 hr)	1.2	--	%	ASTM D570

Mechanical	Dry	Conditioned	Unit	Test Method
Tensile Strength	12000 (82.7)	9000 (62.1)	psi (MPa)	ASTM D638
Tensile Elongation (Break)	5.0	30	%	ASTM D638
Flexural Modulus	420000 (2900)	190000 (1310)	psi (MPa)	ASTM D790
Flexural Strength	17000 (117)	6000 (41.4)	psi (MPa)	ASTM D790

Impact	Dry	Conditioned	Unit	Test Method
Notched Izod Impact (0.125 in (3.18 mm))	1.0 (53)	2.0 (110)	ft-lb/in (J/m)	ASTM D256
Unnotched Izod Impact (0.125 in (3.18 mm))	15 ft-lb/in (800 J/m)	No Break		ASTM D256

Hardness	Dry	Conditioned	Unit	Test Method
Rockwell Hardness (R-Scale)	121	110		ASTM D785

Thermal	Dry	Conditioned	Unit	Test Method
Deflection Temperature Under Load				ASTM D648
66 psi (0.45 MPa), Unannealed	450 (232)	430 (221)	°F (°C)	
264 psi (1.8 MPa), Unannealed	195 (90.6)	160 (71.1)	°F (°C)	
CLTE - Flow	0.000040 (0.000072)	--	in/in/°F (cm/cm/°C)	ASTM D696
Thermal Conductivity	1.7 (0.25)	--	Btu-in/hr/ft ² /°F (W/m/K)	ASTM C177

Electrical	Dry	Conditioned	Unit	Test Method
Volume Resistivity	1.0E+15	1.0E+13	ohm·cm	ASTM D257
Dielectric Strength	560 (22)	540 (21)	V/mil (kV/mm)	ASTM D149
Dielectric Constant (1 MHz)	3.70	4.70		ASTM D150
Dissipation Factor (1 MHz)	0.020	0.10		ASTM D150

Electrical	Dry	Conditioned	Unit	Test Method
Flammability	Dry	Conditioned	Unit	Test Method
Flame Rating - UL				UL 94
--	--	V-2		
0.0625 in (1.59 mm)	V-2	--		

Additional Information
 Dry The value listed as Flammability, UL 94, was tested in accordance with RTP test standards.

Injection	Dry (English)	Dry (SI)
Drying Temperature	175 °F	79.4 °C
Drying Time	4.0 hr	4.0 hr
Suggested Max Moisture	0.20 %	0.20 %
Suggested Max Re grind	20 %	20 %
Rear Temperature	525 to 550 °F	274 to 288 °C
Middle Temperature	525 to 550 °F	274 to 288 °C
Front Temperature	525 to 550 °F	274 to 288 °C
Mold Temperature	150 to 225 °F	65.6 to 107 °C
Injection Pressure	12000 to 18000 psi	82.7 to 124 MPa

Notes

¹ Typical properties: these are not to be construed as specifications.