# **DuPont<sup>™</sup> Crastin<sup>®</sup> PBT**

#### thermoplastic polyester resin

### Crastin® LW9320 NC010

Crastin® LW9320 NC010 is a 20% glass fiber reinforced polybutylene terephthalate alloy for injection molding. It

has improved surface aesthetics, excellent dimensional stability and low warpage characteristics.

Property	Test Method	Units	Value
Identification			
Resin Identification	ISO 1043		PBT+SAN-GF20
Part Marking Code	ISO 11469		>PBT+SAN-GF20<
Mechanical			
Stress at Break	ISO 527	MPa (kpsi)	120 (17.4)
Strain at Break	ISO 527	%	2.5
Tensile Modulus	ISO 527	MPa (kpsi)	7400 (1070)
Flexural Modulus	ISO 178	MPa (kpsi)	6500 (940)
Notched Charpy Impact Strength	ISO 179/1eA	$kJ/m^2$	
-30°C (-22°F)			8
23°C (73°F)			8.5
Unnotched Charpy Impact Strength	ISO 179/1eU	$kJ/m^2$	
-30°C (-22°F)			50
23°C (73°F)			55
Thermal			
Deflection Temperature	ISO 75-1/-2	°C (°F)	
1.80MPa			175 (347)
Melting Temperature	ISO 11357-1/-3	°C (°F)	
10°C/min			225 (437)
Electrical			
CTI	UL 746A	V	500

Contact DuPont for Material Safety Data Sheet, general guides and/or additional information about ventilation, handling, purging, drying, etc. ISO Mechanical properties measured at 4.0mm, ISO Electrical properties measured at 2.0mm, and all ASTM properties measured at 3.2mm. Test temperatures are 23°C unless otherwise stated.

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For other medical applications see "DuPont Medical Caution Statement", H-50102.



#### **Product Information**

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Property	Test Method	Units	Value
Flammability			
Flammability Classification	IEC 60695-11-10		
0.75mm			НВ
Flammability Classification	UL94		
0.75mm			НВ
High Amperage Arc Ignition Resistance	UL 746A	arcs	
0.75mm			>136
1.5mm			>139
3.0mm			>150
Hot Wire Ignition	UL 746A	S	
0.75mm			11
1.5mm			20
3.0mm			28
Temperature Index			
RTI, Electrical	UL 746B	°C	
0.75mm			130
RTI, Impact	UL 746B	°C	
0.75mm			125
1.5mm			125
3.0mm			130
RTI, Strength	UL 746B	°C	
0.75mm			130
Other			
Density	ISO 1183	$kg/m^3 (g/cm^3)$	1340 (1.34)
Molding Shrinkage	ISO 294-4	%	
Normal, 2.0mm			0.65
Parallel, 2.0mm			0.4

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Property	Test Method	Units	Value
Processing			
Melt Temperature Range		°C (°F)	240-260 (465-500)
Melt Temperature Optimum		°C (°F)	260 (500)
Mold Temperature Range		°C (°F)	30-130 (85-265)
Mold Temperature Optimum		°C (°F)	100 (210)
Drying Time, Dehumidified Dryer		h	2-4
Drying Temperature		°C (°F)	110-120 (230-250)
Processing Moisture Content		%	< 0.04
Snake Flow		mm (in)	
90MPa, 5x0.30mm			18 (0.7)
90MPa, 5x0.50mm			54 (2.1)
90MPa, 5x0.75mm			103 (4.1)
90MPa, 5x1.00mm			155 (6.1)

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