

DuPont™ Zytel® HTN

high performance polyamide resin

Zytel® HTN52G35HSL BK083

Zytel® HTN52G35HSL BK083 is a 35% glass reinforced, heat stabilized, lubricated high performance polyamide resin that can be molded in water heated molds. It is also a PPA resin.

Property	Test Method	Units	Value
			DAM
Identification			
Part Marking Code	ISO 11469		>PA6T/66-GF35<
Part Marking Code	SAE J1344		>PPA-GF35<
Mechanical			
Stress at Break	ISO 527	MPa (kpsi)	187 (27)
Strain at Break	ISO 527	%	2.1
Tensile Modulus	ISO 527	MPa (kpsi)	11600 (1680)
Flexural Modulus	ISO 178	MPa (kpsi)	10300 (1490)
Notched Charpy Impact Strength	ISO 179/1eA	kJ/m ²	8
Unnotched Charpy Impact Strength	ISO 179/1eU	kJ/m ²	45
Thermal			
Deflection Temperature 1.80MPa	ISO 75-1/-2	°C (°F)	285 (545)
Melting Temperature 10°C/min, First Heat	ISO 11357-1/-3	°C (°F)	310 (590)
CLTE, Parallel -40 - 23°C (-40 - 73°F)	ISO 11359-1/-2	E-4/C (E-4/F)	0.21 (0.12)
23 - 55°C (73 - 130°F)			0.21 (0.12)
CLTE, Normal -40 - 23°C (-40 - 73°F)	ISO 11359-1/-2	E-4/C (E-4/F)	0.61 (0.34)
23 - 55°C (73 - 130°F)			0.67 (0.37)
55 - 160°C (130 - 320°F)			0.80 (0.44)

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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Property	Test Method	Units	Value
			DAM
Flammability			
Flammability Classification 0.75mm	UL94		HB
Glow Wire Flammability Index 0.75mm	IEC 60695-2-12	°C	750
1.5mm			700
3.0mm			850
Glow Wire Ignition Temperature 0.75mm	IEC 60695-2-13	°C	775
1.5mm			725
3.0mm			775
Temperature Index			
RTI, Electrical 0.75mm	UL 746B	°C	150
3.0mm			150
RTI, Impact 0.75mm	UL 746B	°C	125
3.0mm			125
RTI, Strength 0.75mm	UL 746B	°C	130
3.0mm			150
Other			
Density	ISO 1183	kg/m ³ (g/cm ³)	1.46 (1460)
Water Absorption Immersion 24h	ISO 62, Similar to	%	0.4
Processing			
Melt Temperature Range		°C (°F)	320-330 (610-625)
Melt Temperature Optimum		°C (°F)	325 (620)
Mold Temperature Range		°C (°F)	85-105 (190-220)
Drying Time, Dehumidified Dryer		h	6-8
Drying Temperature		°C (°F)	100 (210)
Processing Moisture Content		%	<0.10

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