

**HiFill® PA6/6 IM1 HS BK**

 Techmer Polymer Modifiers - *Polyamide 66*
**General Information**
**General**

Material Status	• Commercial: Active
Availability	• North America
Filler / Reinforcement	• Glass Fiber, 33% Filler by Weight
Additive	• Heat Stabilizer • Impact Modifier • Lubricant
Features	• Heat Stabilized • Impact Modified • Lubricated
Appearance	• Black
Forms	• Pellets
Processing Method	• Injection Molding

**Properties <sup>1</sup>**

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	1.35		ASTM D792
Molding Shrinkage - Flow (0.125 in)	8.0E-3	in/in	ASTM D955
Water Absorption (24 hr)	0.30	%	ASTM D570
Mechanical	Nominal Value	Unit	Test Method
Tensile Strength (Yield)	22000	psi	ASTM D638
Tensile Elongation (Break)	3.0	%	ASTM D638
Flexural Modulus	1.00E+6	psi	ASTM D790
Flexural Strength	29500	psi	ASTM D790
Impact	Nominal Value	Unit	Test Method
Notched Izod Impact (0.125 in)	2.5	ft·lb/in	ASTM D256
Hardness	Nominal Value	Unit	Test Method
Rockwell Hardness (R-Scale)	114		ASTM D785
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (66 psi, Unannealed)	495	°F	ASTM D648
Deflection Temperature Under Load (264 psi, Unannealed)	473	°F	ASTM D648
Melting Temperature	499	°F	
CLTE - Flow	4.4E-5	in/in/°F	ASTM D696
Electrical	Nominal Value	Unit	Test Method
Surface Resistivity	1.0E+14	ohms	ASTM D257
Volume Resistivity	1.0E+14	ohms·cm	ASTM D257
Dielectric Strength (Method A (Short-Time))	440	V/mil	ASTM D149
Flammability	Nominal Value	Unit	Test Method
Flame Rating (0.06 in)	HB		UL 94

**Processing Information**

Injection	Nominal Value	Unit
Drying Temperature	180	°F
Drying Time	2.0 to 4.0	hr
Suggested Max Moisture	2.0 to 4.0	%
Rear Temperature	510 to 580	°F
Middle Temperature	510 to 580	°F
Front Temperature	510 to 580	°F
Processing (Melt) Temp	500 to 540	°F
Mold Temperature	150 to 200	°F
Back Pressure	50.0 to 100	psi
Screw Speed	30 to 60	rpm

