Electrafil® PA6/6 CF30 BK

Techmer Polymer Modifiers - *Polyamide 66*

General		
Material Status	• Commercial: Active	
Availability	• North America	
Filler / Reinforcement	• Carbon Fiber, 30% Filler by Weight	
Additive	• Lubricant	
Features	• Conductive	• Lubricated
Appearance	• Black	
Forms	• Pellets	
Processing Method	• Injection Molding	

Properties [1]

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	1.27		ASTM D792
Molding Shrinkage - Flow (0.125 in)	2.0E-3	in/in	ASTM D955
Water Absorption (24 hr)	0.48	%	ASTM D570
Mechanical	**Nominal Value**	**Unit**	**Test Method**
Tensile Strength (Break)	34000	psi	ASTM D638
Tensile Elongation (Break)	2.0 to 3.0	%	ASTM D638
Flexural Modulus	2.80E+6	psi	ASTM D790
Flexural Strength	50000	psi	ASTM D790
Impact	**Nominal Value**	**Unit**	**Test Method**
Notched Izod Impact (73°F, 0.125 in)	1.5	ft·lb/in	ASTM D256
Unnotched Izod Impact (0.125 in)	12	ft·lb/in	ASTM D4812
Hardness	**Nominal Value**	**Unit**	**Test Method**
Rockwell Hardness (M-Scale)	97		ASTM D785
Thermal	**Nominal Value**	**Unit**	**Test Method**
Deflection Temperature Under Load (66 psi, Unannealed)	500	°F	ASTM D648
Deflection Temperature Under Load (264 psi, Unannealed)	495	°F	ASTM D648
Melting Temperature	505	°F	
CLTE - Flow	1.0E-5	in/in/°F	ASTM D696
Electrical	**Nominal Value**	**Unit**	**Test Method**
Surface Resistivity	1.0E+2 to 2.0E+2	ohms	ASTM D257
Flammability	**Nominal Value**	**Unit**	**Test Method**
Flame Rating	HB		UL 94

Processing Information

Injection	Nominal Value	Unit
Drying Temperature	180	°F
Drying Time	2.0 to 4.0	hr
Suggested Max Moisture	0.10	%
Rear Temperature	540 to 560	°F
Middle Temperature	550 to 570	°F
Front Temperature	530 to 550	°F
Nozzle Temperature	520 to 580	°F
Processing (Melt) Temp	540 to 580	°F
Mold Temperature	175 to 220	°F
Injection Rate	Slow-Moderate	
Back Pressure	0.00 to 50.0	psi

Injection Notes

Screw Speed: Slow
Recommendations for Molding and Tool Conditions: Well vented mold
Moisture Content, as received: Product is packaged at 0.2% or less.