

**InElec® PEEKCF10HF**

Americhem - Polyetheretherketone

## General Information

**Product Description**

10% CARBON FIBER REINFORCED HIGH FLOW POLYETHERETHERKETONE

**General**

Material Status	• Commercial: Active		
Availability	• Africa & Middle East • Asia Pacific	• Europe • Latin America	• North America
Filler / Reinforcement	• Carbon Fiber, 10% Filler by Weight		
Features	• Filled • Good Dimensional Stability	• High Flow • High Stiffness	• High Strength • Permanent Antistatic
Uses	• Aerospace Applications • Connectors • Consumer Applications • Electrical/Electronic Applications	• Engineering Parts • Industrial Applications • Industrial Parts • Metal Replacement	• Military/Defense Applications • Oil/Gas Applications • Outdoor Applications • Semiconductor Applications
Forms	• Pellets		
Processing Method	• Injection Molding		

 Properties <sup>1</sup>

	Nominal Value	Unit	Test Method
<b>Physical</b>			
Density / Specific Gravity	1.33		ASTM D792
Molding Shrinkage - Flow	2.0E-3 to 3.0E-3	in/in	ASTM D955
Water Absorption (24 hr)	0.10	%	ASTM D570
<b>Mechanical</b>			
Tensile Modulus	1.60E+6	psi	ASTM D638
Tensile Strength	27000	psi	ASTM D638
Tensile Elongation (Yield)	2.0 to 3.0	%	ASTM D638
Flexural Modulus	1.40E+6	psi	ASTM D790
Flexural Strength	38000	psi	ASTM D790
<b>Impact</b>			
Notched Izod Impact (0.125 in)	1.1	ft·lb/in	ASTM D256
Unnotched Izod Impact (0.125 in)	12	ft·lb/in	ASTM D4812
<b>Thermal</b>			
Deflection Temperature Under Load (264 psi, Unannealed)	590	°F	ASTM D648
<b>Electrical</b>			
Surface Resistivity	1.0E+2 to 1.0E+6	ohms	ASTM D257
<b>Flammability</b>			
Flame Rating (0.06 in)	V-0		Internal Method

## Processing Information

	Nominal Value	Unit
<b>Injection</b>		
Drying Temperature	300	°F
Drying Time	2.0 to 4.0	hr
Processing (Melt) Temp	660 to 750	°F
Mold Temperature	325 to 425	°F
Back Pressure	50.0 to 100	psi
Screw Speed	40 to 70	rpm

