

## InStruc® PETGF30

Americhem - Polyethylene Terephthalate

### General Information

#### Product Description

InStruc PETGF30 is a 30% glass fiber reinforced Polyethylene Terephthalate.

#### General

Material Status	• Commercial: Active
Availability	• Africa & Middle East • Europe • North America • Asia Pacific • Latin America
Filler / Reinforcement	• Glass Fiber, 30% Filler by Weight
Features	• Filled • High Stiffness • Good Dimensional Stability • High Strength
Uses	• Automotive Applications • Electrical/Electronic Applications • Industrial Applications • Closures • Engineering Parts • Industrial Parts • Connectors • Household Goods • Oil/Gas Applications • Consumer Applications • Housings • Outdoor Applications
Forms	• Pellets
Processing Method	• Injection Molding

### Properties <sup>1</sup>

	Nominal Value	Unit	Test Method
<b>Physical</b>			
Density / Specific Gravity	1.56		ASTM D792
Molding Shrinkage - Flow	1.0E-3 to 3.0E-3	in/in	ASTM D955
Water Absorption (24 hr)	0.050	%	ASTM D570
<b>Mechanical</b>			
Tensile Modulus	1.60E+6	psi	ASTM D638
Tensile Strength	22000	psi	ASTM D638
Tensile Elongation (Yield)	3.0 to 5.0	%	ASTM D638
Flexural Modulus	1.40E+6	psi	ASTM D790
Flexural Strength	32000	psi	ASTM D790
<b>Impact</b>			
Notched Izod Impact (0.125 in)	1.5	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)	430	°F	ASTM D648
<b>Electrical</b>			
Surface Resistivity	1.0E+17	ohms	

### Processing Information

	Nominal Value	Unit
<b>Injection</b>		
Drying Temperature	250	°F
Drying Time	4.0	hr
Processing (Melt) Temp	530 to 550	°F
Mold Temperature	165 to 195	°F
Back Pressure	50.0 to 100	psi
Screw Speed	40 to 70	rpm
Vent Depth	1.5E-3 to 3.0E-3	in

