

Plaslube® PC CF10 TL10 BK

 Techmer Polymer Modifiers - *Polycarbonate*
General Information
General

Material Status	• Commercial: Active
Availability	• North America
Filler / Reinforcement	• Carbon Fiber, 10% Filler by Weight
Additive	• PTFE Lubricant
Features	• Lubricated
Appearance	• Black
Forms	• Pellets
Processing Method	• Injection Molding

Properties ¹

Physical	Nominal Value	Unit	Test Method
Density / Specific Gravity	1.33		ASTM D792
Molding Shrinkage - Flow (0.125 in)	3.0E-3	in/in	ASTM D955
Water Absorption (24 hr)	0.10	%	ASTM D570
Mechanical	Nominal Value	Unit	Test Method
Tensile Strength (Break)	16500	psi	ASTM D638
Tensile Elongation (Break)	2.0	%	ASTM D638
Flexural Modulus	950000	psi	ASTM D790
Flexural Strength	21000	psi	ASTM D790
Coefficient of Friction			ASTM D1894
vs. Steel - Dynamic	0.25		
vs. Steel - Static	0.18		
Wear Factor	36	10 ⁻¹⁰ in ³ ·min/ft·lb·hr	ASTM D3702
Impact	Nominal Value	Unit	Test Method
Notched Izod Impact (73°F, 0.125 in)	1.4	ft·lb/in	ASTM D256
Unnotched Izod Impact (0.125 in)	6.0	ft·lb/in	ASTM D4812
Hardness	Nominal Value	Unit	Test Method
Rockwell Hardness (R-Scale)	118		ASTM D785
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load (66 psi, Unannealed)	292	°F	ASTM D648
Deflection Temperature Under Load (264 psi, Unannealed)	283	°F	ASTM D648
CLTE - Flow	1.1E-5	in/in/°F	ASTM D696
Electrical	Nominal Value	Unit	Test Method
Surface Resistivity	1.0E+5	ohms	ASTM D257
Volume Resistivity	1.0E+4	ohms·cm	ASTM D257
Flammability	Nominal Value	Unit	Test Method
Flame Rating (0.06 in)	V-2		UL 94

Processing Information

Injection	Nominal Value	Unit
Drying Temperature	250	°F
Drying Time	2.0 to 4.0	hr
Suggested Max Moisture	0.10	%
Rear Temperature	575 to 600	°F
Middle Temperature	600 to 630	°F
Front Temperature	590 to 620	°F
Nozzle Temperature	590 to 620	°F



Processing (Melt) Temp	580 to 620 °F
Mold Temperature	160 to 190 °F
Injection Rate	Moderate
Back Pressure	0.00 to 100 psi

Injection Notes

Screw Speed: Medium

Recommendations for Molding and Tool Conditions: Well vented mold

Moisture Content, as received: Product is packaged at 0.2% or less.

Notes

¹ Typical properties: these are not to be construed as specifications.

