




**Product Data Sheet &  
General Processing Conditions**

**RTP 382 TFE 10 SI 2 HB  
Polycarbonate (PC)  
Carbon Fiber  
PTFE Lubricated  
Silicone Lubricated  
UL94 HB**



**PROPERTIES & AVERAGE VALUES OF INJECTION MOLDED SPECIMENS**

<b>PERMANENCE</b>	<b>English</b>	<b>SI Metric</b>	<b>ASTM TEST</b>
Primary Additive	15 %	15 %	
Specific Gravity	1.30	1.30	D 792
Molding Shrinkage			
1/8 in (3.2 mm) section	0.0005 - 0.0020 in/in	0.05 - 0.20 %	D 955
Water Absorption, 24 hrs @ 23°C	0.100 %	0.100 %	D 570

**MECHANICAL**

Impact Strength, Izod			
notched 1/8 in (3.2 mm) section	1.6 ft-lbs/in	85 J/m	D 256
unnotched 1/8 in (3.2 mm) section	9.0 ft-lbs/in	481 J/m	D 4812
Tensile Strength	15500 psi	107 MPa	D 638
Tensile Elongation	2.0 %	2.0 %	D 638
Tensile Modulus	1.50 x 10 <sup>6</sup> psi	10342 MPa	D 638
Flexural Strength	24000 psi	165 MPa	D 790
Flexural Modulus	1.30 x 10 <sup>6</sup> psi	8964 MPa	D 790

**ELECTRICAL**

Volume Resistivity	< 1E4 ohm.cm	< 1E4 ohm.cm	D 257
Surface Resistivity	< 1E6 ohm/sq	< 1E6 ohm/sq	D 257

**THERMAL**

Deflection Temperature			
@ 264 psi (1820 kPa)	290 °F	143 °C	D 648
@ 66 psi (455 kPa)	300 °F	149 °C	D 648
Ignition Resistance*			
Flammability	HB @ 1/16 in	HB @ 1.5 mm	UL94

**PROPERTY NOTES**

Data herein is typical and not to be construed as specifications.

Unless otherwise specified, all data listed is for natural or black colored materials. Pigments can affect properties.

\* This rating is not intended to reflect hazards of this or any other material under actual fire conditions.

**GENERAL PROCESSING FOR INJECTION MOLDING**

	<b>English</b>	<b>SI Metric</b>
Injection Pressure	10000 - 15000 psi	69 - 103 MPa
Melt Temperature	550 - 600 °F	288 - 316 °C
Mold Temperature	120 - 250 °F	49 - 121 °C
Drying	4 hrs @ 250 °F	4 hrs @ 121 °C
Moisture Content	0.02 %	0.02 %
Dew Point	-20 °F	-29 °C