



**Product Data Sheet &
General Processing Conditions**

RTP 2099 X 121241 B
Bio-Based Polylactic Acid (PLA)
PC-PLA Blend
ESD Protection
Permanently Anti-static
26% Renewable Resource Content

PROPERTIES & AVERAGE VALUES OF INJECTION MOLDED SPECIMENS

PERMANENCE	English	SI Metric	ASTM TEST
Specific Gravity	1.19	1.19	D 792
Molding Shrinkage 1/8 in (3.2 mm) section	0.0060 in/in	0.60 %	D 955

MECHANICAL

Impact Strength, Izod			
notched 1/8 in (3.2 mm) section	1.0 ft-lbs/in	53 J/m	D 256
unnotched 1/8 in (3.2 mm) section	16.0 ft-lbs/in	854 J/m	D 4812
Tensile Strength	5200 psi	36 MPa	D 638
Tensile Elongation	7.0 %	7.0 %	D 638
Tensile Modulus	0.25 x 10 ⁶ psi	1724 MPa	D 638
Flexural Strength	8000 psi	55 MPa	D 790
Flexural Modulus	0.25 x 10 ⁶ psi	1724 MPa	D 790

ELECTRICAL

Volume Resistivity	1E8 - 1E11 ohm.cm	1E8 - 1E11 ohm.cm	D 257
Surface Resistivity	1E10 - 1E12 ohm/sq	1E10 - 1E12 ohm/sq	D 257
Static Decay			
MIL-PRF-81705D, 5kV to 50 V, 12% RH	< 2.00 s	< 2.00 s	FTMS101C 4046.1

THERMAL

Deflection Temperature			
@ 66 psi (455 kPa)	185 °F	85 °C	D 648
Ignition Resistance*			
Flammability**	HB @ 1/16 in	HB @ 1.5 mm	D 635

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.

** Values per RTP Company testing.

GENERAL PROCESSING FOR INJECTION MOLDING

	English	SI Metric
Injection Pressure	8000 - 15000 psi	55 - 103 MPa
Melt Temperature	430 - 470 °F	221 - 243 °C
Mold Temperature	75 - 160 °F	24 - 71 °C
Drying	4 hrs @ 175 °F	4 hrs @ 79 °C
Moisture Content	0.02 %	0.02 %
Dew Point	-40 °F	-40 °C