

## Data Sheet for Extruded Acrylic Sheets

Property <sup>(a)</sup>	ASTM Method	Typical Value ( 0.250" Thickness) <sup>(b)</sup>		
<b>Mechanical</b>	Specific Gravity	D 792	1.19	
	Tensile Strength	D 638	10,000 psi (69 MPa)	
	Elongation, Rupture		4.5%	
	Modulus of Elasticity		400,000 psi (2800 MPa)	
	Flexural Strength	D 790	17,000 psi ( 117 MPa)	
	Modulus of Elasticity		480,000 psi (3300 MPa)	
	Compressive Strength ( Yield)	D 695	17,000 psi (117 MPa)	
	Impact Strength	D 256	0.4 ft. lbs/in. of notch	
	Izod Milled Notch		(21.6 J/m of notch)	
	Rockwell Hardness	D 785	M-93	
	Barcol Hardness	D 2583	48	
	<b>Optical</b>	Refractive Index	D 542	1.49
		Light Transmission, Total	D 1003	92%
<b>Thermal</b>	Forming Temperature	-	Approx. 300°F (149°C)	
	Deflection Temperature under load, 264 psi	D 648	195°F (91°C)	
	Vicat Softening Point	D 1525	220°F (105°C)	
	Maximum recommended Continuous Service Temperature	-	160°F <sup>(c)</sup> (71°C)	
	Coefficient of Linear Thermal Expansion	D 696	0.000040 in/in - °F (0.000072 m/m - °C)	
	Coefficient of Thermal Conductivity	Cenco-Fitch	1.3 BTU/ (Hr) (Sq. Ft.) (°F / in.) (0.19 w/m·K)	
	Flammability, Burning Rate ( 0.125"thickness)	D 635	1.0 in/min. (25 mm/min.)	
	Self Ignition Temperature	D 1929	850°F(455°C)	
	Specific Heat @ 77°F		0.35 BTU/(lb.) (°F)(1470J/Kg·K)	
	Smoke Density Rating	D 2843	4.8%	
	<b>Electrical</b>	Dielectric Strength Short Time ( 0.125")	D 149	430 volts/mil (17 KV/mm)
		Dielectric Constant	D 150	
		60 Hertz		3.6
1,000 Hertz			3.3	
1,000,000 Hertz			2.8	
Dissipation Factor		D 150		
60 Hertz			0.06	
1,000 Hertz			0.04	
1,000,000 Hertz			0.02	
Volume Resistivity		D 257	10 <sup>16</sup> ohm-cm	
Surface Resistivity	D 257	10 <sup>16</sup> ohms		
<b>Water Absorption</b> 24 hrs @ 73°F	D 570	0.2%		
<b>Odor</b>	-	-		
<b>Taste</b>	-	-		

(a) Typical values; should not be used for specification purposes.

(b) Values shown are for 0.250" thickness. Some values will change with thickness or pigmentation.

(c) It is recommended that temperatures not exceed 160°F for continuous service, or 190°F for short intermittent use.

## Canada Plastics & Belting

100 Dynamic Drive Units 5-7 Scarborough ON M1V5C1 Canada.

Toll Free: 1-866-399-4835

Email: [info@canada-plastics.com](mailto:info@canada-plastics.com), Website: [www.canada-plastics.com](http://www.canada-plastics.com)