

# Plexiglas G UF3 Properties



## Typical Properties

Property	Test Method	Units	Values
<b>PHYSICAL</b>			
Nominal thickness		In	0.118
Specific gravity	ASTM D-792	-	1.19
Rockwell hardness	ASTM D-785	M scale	100
<b>OPTICAL</b>			
Refractive index (ND @ 73 °F)	ASTM D-542	-	1.49
Luminous transmittance	ASTM D-1003	%	92
Haze	ASTM D-1003	%	< 2.0
<b>MECHANICAL</b>			
Tensile strength, maximum	ASTM D-638	Psi	10,500
Tensile strength, yield	ASTM D-638	Psi	10,500
Tensile elongation	ASTM D-638	%	4.9
Tensile modulus of elasticity	ASTM D-638	Psi	450,000
Flexural strength, maximum	ASTM D-79	Psi	16,000
Flexural modulus of elasticity	ASTM D-790	Psi	450,000
Notched izod impact @ 73°F (23°C)	ASTM D-256	Ft-lb/in	0.3
Un-notched charpy @ 73°F (23°C)	ASTM D-256	Ft-lb/0.5"x1" section	7.0
<b>THERMAL</b>			
Coefficient temp under flexural load @ 264 psi	ASTM D-648	°F	205
Coefficient of thermal expansion at 60°F	ASTM E-831	in/in/°F x 10 <sup>-5</sup>	3.9
Maximum recommended continuous service temp	N/A	°F	180-200
Recommended thermoforming temp	N/A	°F	290-360
<b>FLAMMABILITY</b>			
Self ignition temperature	ASTM D-1929	°F	860
Standard sheet specification for PMMA acrylic plastic sheet	ASTM D-4802	-	Category A-1, Finish 1, Type UVF
<b>CRAZE RESISTNACE</b>			
Constant stress resistance, IPA <sup>3</sup>	Modified ARTC Method – Mil P-6997	Psi	2,100
Constant stress resistance, Aromatic/alcohol blend	Modified ARTC Method – Mil P-6997	Psi	1,700

These suggestions and data are based on information we believe to be reliable. They are offered in good faith, but without guarantee, as conditions and methods of use are beyond our control. We recommend that the prospective user determines the suitability of our materials and suggestions before adopting them on a commercial scale.