

LEXAN™ SGC100X SHEET

PRODUCT DATASHEET

DESCRIPTION

LEXAN™ SGC100x Solar Grade Coextruded sheet for signs combines the impact strength of LEXAN polycarbonate sheet with a proprietary UV-resistant cap layer that provides long-term protection against weathering. LEXAN SGC100x sheet are backed by ten-year limited written warranty against yellowing, loss of light transmission and breakage. Providing long-lasting clarity over a wide range of environments, LEXAN SGC100x sheet offers extended service life and reduced life-cycle material costs. It is an excellent candidate for all types of thermoformed or flat signs, whether screen-printed, painted or decorated with vinyl graphics.

TYPICAL PROPERTY VALUES ◆

PROPERTY	TEST METHOD	UNITS	VALUE
Physical			
Specific gravity	ASTM D792	-	1.20
Light Transmission @ .118" thickness	ASTM D1003	%	87
Rockwell Hardness	ASTM D785	-	M70,R118
Mechanical			
Tensile Strength	ASTM D638	psi	
Ultimate			9,500
Tensile Modulus	ASTM D638	psi	285,000
Flexural Strength	ASTM D790	psi	13,500
Flexural Modulus	ASTM D790	psi	340,000
Compressive Strength	ASTM D695	psi	12,500
Izod Impact Strength, up to 125 mils	ASTM D256A	ft-lbs/in	
Notched			12-16
Drop Ball Impact Strength, 1" dia.dart @ .236 thickness	SABIC Test ##	ft-lbs	
@ 73°F			>200
@ 0°F			>200
Thermal			
Coefficient of Thermal Expansion	ASTM D696	in/in/°F	3.75×10^{-5}
Heat Deflection Temperature	ASTM D648	°F	
@ 264 psi			260
@ 66 psi			280

◆ These typical values are not intended for specification purposes. If minimum certifiable properties are required please contact your local SABIC Innovative Plastics, Specialty Film & Sheet representative.

See actual Product Warranty for conditions that may apply.

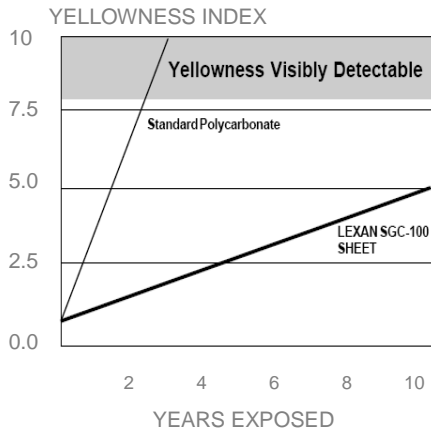
Measured by dropping a 25-pound dart (1" dia. tip) from a height of 8 feet.

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[UL FILE NUMBER: E121562](#)

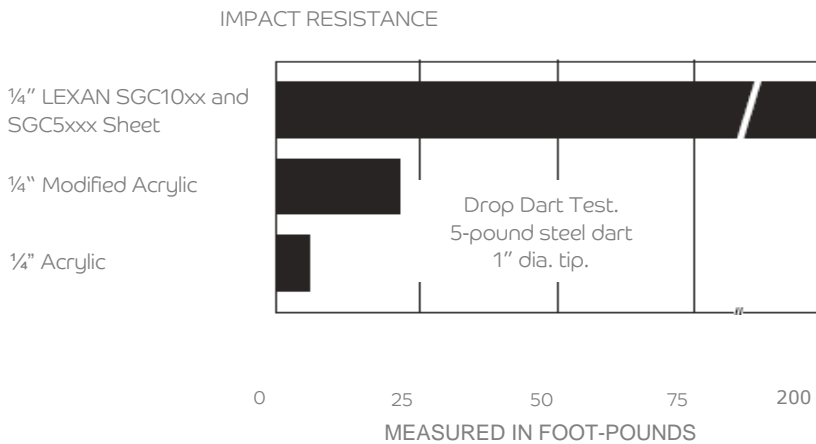
UV RESISTANCE

LEXAN™ SGC10xx sheet was exposed to accelerated QUV weathering. After exposure comparable to 10 years in South Florida, LEXAN SGC10xx and SGC5xxx sheet showed only minimal in yellowness, light transmission and clarity.



IMPACT RESISTANCE

LEXAN SGC10xx and SG5xxx sheet has up to 30 times the impact strength of "Acrylic" and 10 times the impact strength of "Modified Acrylic".



CONTACT US:

Middle East and Africa

SABIC Global Headquarters
PO Box 5101
Riyadh 11422
Saudi Arabia
T +966 (0) 1 225 8000
F +966 (0) 1 225 9000
E info@sabic.com

Americas

Functional Forms
2500 City West
Boulevard Suite 100
Houston, TX 77042
USA
Toll-free (800) 323 3783
F (888) 443 2033
E spinside.sales@sabic.com

Europe

Functional Forms
Plasticslaan 1
4612 PX
Bergen op Zoom
The Netherlands
T +31 (0)164 293678
F +31 (0)164 293272
E ff.info@sabic.com

Asia Pacific

Functional Forms
2550 Xiupu Road
Pudong
201319 Shanghai
China
T +86 21 2037 8188
F +86 21 2037 8288
E ff.info@sabic.com



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