

LED L Block Acrylic Product Data

LED L Block

Available in 30mm thickness

LED L Block offers an alternative to traditionally constructed letters, by allowing the sign maker to router out channels and embed white or colored LEDs either inside or on a rear plate. The result: chunky, stylish, one-piece letters with an optimized, even light transmission to maximize the environmental and economic benefits of LED technology.

Offering the same ease of fabrication as standard Acrylic, guaranteed outdoor performance as well as its light weight, LED L Block provides new aesthetic opportunities in channel letter construction and signage.



Technical Data Sheet

Property	Test Method	Unit	Value
General			
Density	ISO 1183	g cm ⁻³	1.19
Rockwell Hardness	ISO 2039-2	M scale	102
Water Absorption	ISO 62	%	0.2
Flammability	BS 476 Part 7	Class	3
	DIN 4102	-	B2
	NFP 92-507	-	M4
	UL94	-	HB
	ISO 11925-2	-	E
Optical Properties			
Light Transmission	ASTM D1003	% (3 mm)	> 92
Refractive Index	ISO 489 A	-	1.49
Thermal Properties			
Vicat Softening Point	ISO 306 A	°C	> 110
Coefficient of Thermal Expansion (Linear)	ASTM D696	x 10 ⁻⁵ . K ⁻¹	7.7
Mechanical Properties			
Tensile Strength	ISO 527 (5 mm/min)	MPa	75
Elongation at Break	ISO 527 (5 mm/min)	%	4
Flexural Strength	ISO 178 (2 mm/min)	MPa	116
Flexural Modulus	ISO 178 (2 mm/min)	MPa	3210
Impact Strength – Charpy (unnotched)	ISO 179	kJ M ⁻²	12
Poisson's Ratio	ISO 179	kJ M ⁻²	0.38
Electrical Properties			
Surface Resistivity	IEC 93	Ω.m-2	> 10 ¹⁴
Electrical Strength	IEC 243	kV.mm-1	15