



TRADEMARK POLYSTYRENE

PS820

Technical Data Sheet

High Impact Injection Molding

Applications

- Household Items
- Displays
- Retail Shelving
- Part Requiring High Flow

Properties

- Excellent Toughness
- Low/Medium Gloss
- Good Flow Characteristics
- Good Rigidity

Properties	Value	Method
Melt Flow (gm/10 min)	8.0	ASTM D1238
Specific Gravity (gm/cc)	1.03	ASTM D792
Tensile Strength ⁽¹⁾ , 2 in/min (psi)	3250	ASTM D638
Tensile Modulus ⁽¹⁾ , 2 in/min (psi)	290000	ASTM D638
Tensile Elongation ⁽¹⁾ , 2 in/min (%)	44	ASTM D638
Flexural Strength ⁽²⁾ , 0.1 in/min (psi)	5900	ASTM D790B
Flexural Modulus ⁽²⁾ , 0.1 in/min (psi)	283500	ASTM D790B
Notched Izod at 73°F ⁽¹⁾ , (ft-lb/in)	2.1	ASTM D256
Vicat Softening Temp. ⁽²⁾	201	ASTM D1525
Deflection Temp. Under Load ⁽²⁾⁽³⁾ (F°)	171	ASTM D648
Mold Shrinkage, 24 hours (in / in)	0.004-0.008	ASTM D955

FDA

This material complies with FDA regulations in 21 CFR, section 177.1640.

Reference Notes

- (1) Thickness of sample tested, 0.125 inch.
- (2) Thickness of sample tested, 0.250 inch.
- (3) Testing condition is at 264 psi.

Processing

Recommended mold surface temperatures for polystyrene range from 60° to 150° F. Use the highest temperature possible where you can maintain the desired cycle time. Please contact your Trademark representative for further details.

