Bergaflex™ BFI 40D-3121

Thermoplastic Elastomer

Key Characteristics

Product Description
Bergaflex™ BFI 40D-3121 is an easy processing, general purpose thermoplastic elastomer based on styrenic block copolymers. Material is semi-filled and is therefore opaque and has a medium density.

General			
Material Status	• Commercial: Active		
Regional Availability	• Asia Pacific	• Europe	• North America
Features	• General Purpose	• Good Flow	• Good Processability
Uses	• Appliances • Automotive Applications	• Consumer Applications • General Purpose	• Industrial Applications
RoHS Compliance	• RoHS Compliant		
Appearance	• Black	• Natural Color	
Forms	• Pellets		
Processing Method	• Injection Molding		

Technical Properties [1]

Physical	Typical Value (English)	Typical Value (SI)	Test Method
Density / Specific Gravity	0.990	0.990	ISO 1183
Elastomers	**Typical Value (English)**	**Typical Value (SI)**	**Test Method**
Tensile Stress (100% Strain)	1160 psi	8.00 MPa	ISO 37
Tensile Stress (300% Strain)	1450 psi	10.0 MPa	ISO 37
Tensile Stress [2]			ISO 37
Break, 73°F (23°C), 0.0787 in (2.00 mm)	2900 psi	20.0 MPa	
Tensile Elongation [2]			ISO 37
Break, 73°F (23°C), 0.0787 in (2.00 mm)	560 %	560 %	
Compression Set			ISO 815
73°F (23°C), 72 hr	40 %	40 %	
158°F (70°C), 22 hr	68 %	68 %	
Hardness	**Typical Value (English)**	**Typical Value (SI)**	**Test Method**
Shore Hardness (Shore D, 10 sec)	40	40	ISO 48-4

Processing Information

Injection	Typical Value (English)	Typical Value (SI)
Suggested Max Regrind	20 %	20 %
Rear Temperature	329 to 347 °F	165 to 175 °C
Middle Temperature	347 to 365 °F	175 to 185 °C
Front Temperature	365 to 410 °F	185 to 210 °C
Nozzle Temperature	383 to 419 °F	195 to 215 °C
Mold Temperature	68 to 104 °F	20 to 40 °C
Back Pressure	290 to 1450 psi	2.00 to 10.0 MPa
Screw Speed	40 to 100 rpm	40 to 100 rpm

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Injection Notes

Purge thoroughly before and after use of this product with a low flow (0.5 - 2.5 MFR) polyethylene (PE) or polypropylene (PP).

Regrind levels up to 20% can be used with Bergaflex™ BFI 40D-3121 with minimal property losses, provided that the regrind is free of
contamination. To minimize losses during molding, the melt temperature should be as low as possible. The final determination of regrind
effectiveness should be determined by the customer.

Bergaflex BFI 40D-3121 has excellent melt stability. Maximum residence times may vary, depending on the size of the barrel. Generally,
the barrel should be emptied if it is idle for periods of 8-10 minutes or longer.

Drying is not Required

Notes

[1] Typical values are not to be construed as specifications.

[2] 7.9 in/min (200 mm/min)

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