

# PELPRENE™ P150B

Thermoplastic Polyester Elastomer

TOYOBO America, Inc.

## Technical Data

### General

Material Status	• Commercial: Active
Literature <sup>1</sup>	• <a href="#">Processing - Injection Molding (English)</a>
UL Yellow Card <sup>2</sup>	• <a href="#">E51743-242515</a>
Search for UL Yellow Card	• <a href="#">TOYOBO America, Inc.</a> • <a href="#">PELPRENE™</a>
Availability	• North America
Features	• Copolymer • General Purpose • Good Chemical Resistance • Good Processability • Medium Heat Resistance
Uses	• General Purpose
Forms	• Pellets

Physical	Nominal Value Unit	Test Method
Specific Gravity	1.23 g/cm <sup>3</sup>	ASTM D792
Melt Mass-Flow Rate (MFR) (230°C/2.16 kg)	20 g/10 min	ASTM D1238
Molding Shrinkage - Flow (2.00 mm)	1.3 %	ASTM D955
Water Absorption (Equilibrium, 23°C, 65% RH)	0.36 %	ASTM D570

Mechanical	Nominal Value Unit	Test Method
Tensile Strength (Yield)	38.0 MPa	ASTM D638
Tensile Elongation (Break)	500 %	ASTM D638
Flexural Modulus	289 MPa	ASTM D790
Compressive Modulus	19.1 MPa	ASTM D695
Taber Abrasion Resistance (1000 Cycles)	10.0 mg	ASTM D1044

Elastomers	Nominal Value Unit	Test Method
Tensile Stress (50% Strain)	19.6 MPa	ASTM D412
Tear Strength	177 kN/m	ASTM D624
Compression Set	60 %	ASTM D395

Impact	Nominal Value Unit	Test Method
Notched Izod Impact	No Break	ASTM D256

Hardness	Nominal Value Unit	Test Method
Durometer Hardness (Shore D)	57	ASTM D2240

Thermal	Nominal Value Unit	Test Method
Deflection Temperature Under Load 1.8 MPa, Unannealed	117 °C	ASTM D648
Brittleness Temperature	-65.0 °C	ASTM D746
Vicat Softening Temperature	190 °C	ASTM D1525
Melting Temperature	212 °C	DSC
CLTE - Flow	0.00014 cm/cm/°C	ASTM D696

Electrical	Nominal Value Unit	Test Method
Volume Resistivity	2.0E+14 ohm·cm	ASTM D257
Dielectric Strength	30 kV/mm	ASTM D149

Flammability	Nominal Value Unit	Test Method
Flame Rating	HB	UL 94

### Additional Information

Hardness, JIS k6301, A scale: 98  
10% Compression Modulus, ASTM D695: 19.1 MPa  
Resilience, JIS K6301: 59 %  
Brittle Point, JIS K6301: < -65 °C  
Compression Set, JIS K6301: 60 %  
Coefficient of Linear Thermal Expansion, TMA: 14e-5 1/K

