

Technical Data Sheet

# Diamond Pc 2009I

Polycarbonate  
LyondellBasell Industries  
Engineering Plastics

General	
Additive	• Impact Modifier
Features	• Impact Modified
Forms	• Pellets

Physical	Nominal Value (English)	Nominal Value (SI)	Test Method
Density / Specific Gravity	1.18	1.18 g/cm <sup>3</sup>	ASTM D792
Melt Mass-Flow Rate (MFR) <sup>1</sup> (300°C/1.2 Kg)	7.9 g/10 min	7.9 g/10 min	ASTM D1238

Mechanical	Nominal Value (English)	Nominal Value (SI)	Test Method
Tensile Strength <sup>2</sup> (Break)	9820 psi	67.7 MPa	ASTM D638
Tensile Elongation <sup>2</sup> (Break)	130 %	130 %	ASTM D638
Flexural Modulus - Chord <sup>3</sup> (0.125 In (3.18 Mm))	342000 psi	2360 MPa	ASTM D790
Flexural Strength <sup>3</sup> (0.125 In (3.18 Mm))	4230 psi	29.1 MPa	ASTM D790

Impact	Nominal Value (English)	Nominal Value (SI)	Test Method
Notched Izod Impact			ASTM D256A
-22°F (-30°C), 0.125 In (3.18 Mm)	12 ft·lb/in	660 J/m	
73°F (23°C), 0.125 In (3.18 Mm)	16 ft·lb/in	830 J/m	
Instrumented Dart Impact <sup>4</sup>			ASTM D3763
-22°F (-30°C), Ductile Failure	602 in·lb	68.0 J	
73°F (23°C), Ductile Failure	522 in·lb	59.0 J	

Thermal	Nominal Value (English)	Nominal Value (SI)	Test Method
Deflection Temperature Under Load			ASTM D648
66 Psi (0.45 Mpa), Unannealed, 0.125 In (3.18 Mm)	265 °F	130 °C	
264 Psi (1.8 Mpa), Unannealed, 0.125 In (3.18 Mm)	243 °F	117 °C	

- Notes**
- <sup>1</sup> Procedure A
  - <sup>2</sup> 2.0 in/min (50 mm/min)
  - <sup>3</sup> 0.051 in/min (1.3 mm/min)
  - <sup>4</sup> 22.0 ft/sec (6.70 m/sec)

**Notes**  
These are typical property values not to be construed as specification limits.