

SABIC® PP 83MF10

PP IMPACT COPOLYMER

DESCRIPTION

This grade combines a very high impact strength, even at low temperatures, with a high stiffness and moderate flow properties. It is typically used by our customers for injection moulding of technical components and containers exposed to heavy loads and needing a high toughness. It is typically used by our customers for extrusion applications like thin sheet, corrugated board and profiles.

Health, Safety and Food Contact regulations: Safety Data Sheets (SDS) and Product Safety declarations are available on our Internet site <http://www.SABIC.com>

The product mentioned herein is in particular not tested and therefore not validated for use in pharmaceutical / medical applications.

This grade material is UL registered under File E111275 (www.ul.com).
IMDS ID: 80775790

TYPICAL PROPERTY VALUES

Revision 20220725

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
POLYMER PROPERTIES			
Melt Flow Rate (MFR)			
at 230 °C and 2.16 kg	1.8	dg/min	ISO 1133
Density	905	kg/m³	ASTM D1505
FORMULATION			
UV stabilized	<input type="checkbox"/>	-	-
Anti static agent	<input type="checkbox"/>	-	-
Nucleating agent	<input type="checkbox"/>	-	-
MECHANICAL PROPERTIES			
Tensile test			
strain at yield ⁽¹⁾	5	%	ISO 527-2 1A
stress at yield	23	MPa	ISO 527-2 1A
tensile modulus ⁽²⁾	1200	MPa	ISO 527-2 1A
Izod impact notched			
at -20 °C	12	kJ/m²	ISO 180/1A
Izod impact notched			
at 23 °C	No Break	kJ/m²	ISO 180/1A
Charpy Impact Strength Notched			
at -20 °C	10	kJ/m²	ISO 179/1eA
at 0 °C	40	kJ/m²	ISO 179/1eA
at 23 °C	75	kJ/m²	ISO 179/1eA
Charpy impact unnotched			
at 23 °C	No Break	kJ/m²	ISO 179/1eU
Hardness Shore D	61	-	ISO 868
THERMAL PROPERTIES			
Heat deflection temperature ⁽³⁾			
at 1.80 MPa (HDT/A)	55	°C	ISO 75
at 0.45 MPa (HDT/B)	85	°C	ISO 75
Vicat Softening Temperature ⁽⁴⁾			
at 10 N (VST/A)	148	°C	ISO 306

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
at 50 N (VST/B)	68	°C	ISO 306

- (1) Speed of testing: 50 mm/min
 (2) Speed of testing: 1 mm/min
 (3) Flat wise (testbar 80*10*4mm)
 (4) Temperature rate: 120°C/h

STORAGE AND HANDLING

Avoid prolonged storage in open sunlight, high temperatures (<50 °C) and /or high humidity as this could well speed up alteration and consequently loss of quality of the material and /or its packaging. Keep material completely dry for good processing.

DISCLAIMER

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