

SABIC® HDPE P6006NA

HIGH DENSITY POLYETHYLENE FOR PIPE

DESCRIPTION

P6006NA is a high density Polyethylene (potentially ASTM PE4710 cell class requirements) with multimodal distribution of the molecular mass. This is natural color grade suitable for pipe extrusion with excellent combination of properties. It is also suitable for use in telecommunication ducting, corrugated pipes and spiral pipes.

TYPICAL APPLICATIONS

P6006NA is a natural High Density Polyethylene (HDPE) resin specifically designed for Pipe Extrusion. It provides excellent stress crack resistance properties (ESCR) combined with very long-term hydrostatic strength.

TYPICAL PROPERTY VALUES

Revision 20170425

PROPERTIES	TYPICAL VALUES	UNITS	TEST METHODS
POLYMER PROPERTIES			
Melt Flow Rate ⁽¹⁾			
@ 190°C & 5 kg load ⁽¹⁾	0.23	g/10 min	ISO 1133
@ 190°C & 21.6 kg load ⁽¹⁾	6.2	g/10 min	ISO 1133
Density at 23°C ⁽¹⁾	949	kg/m ³	ISO 1183
MECHANICAL PROPERTIES			
Hardness (Shore D) ⁽²⁾	63	-	ISO 868
Tensile Strength at Yield ⁽³⁾	23	MPa	ISO 527-2
Tensile Elongation at Yield ⁽³⁾	10	%	ISO 527-2
Tensile Modulus ⁽³⁾	850	MPa	ISO 899
Charpy Impact Notched @ 23°C ⁽²⁾	25	kJ/m ²	ISO 179
Flexural Creep Modulus (4point, 1min) ⁽³⁾	1050	MPa	DIN 19537-2
THERMAL PROPERTIES			
Vicat Softening Point @ 50N (VST/B)	74	°C	ISO 306
OIT (210°C)	> 20	min	EN 728

(1) Typical values & not to be construed as specification limits.

(2) Test specimen according to ISO 527-2 type 1 BA, thickness 2mm with 50mm/min test speed.

(3) Based on compression molded sheet

PROCESSING CONDITIONS

Typical processing conditions for P6006NA: Melt temperature: 190-220°C



HEALTH, SAFETY AND FOOD CONTACT REGULATIONS

Detailed information provided in relevant Material Safety Datasheet and or Standard Food Declaration; Additional specific information can be requested via your local Sales Office...

STORAGE AND HANDLING

Polyethylene material / compound should be stored in a manner to prevent a direct exposure to sunlight and/or heat. The storage area should also be dry and preferably don't exceed 50°C. SABIC would not give warranty to bad storage conditions lead to quality deterioration and inadequate product performance. It is advisable to process PE resin within 6 months after delivery.

DISCLAIMER

The information contained herein may include typical properties of our products or their typical performances when used in certain typical applications. Actual properties of our products, in particular when used in conjunction with any third party material(s) or for any non-typical applications, may differ from typical properties.

It is the customer's responsibility to inspect and test our product(s) in order to satisfy itself as to the suitability of the product(s) for its and its customers particular purposes. The customer is responsible for the appropriate, safe and legal use, processing and handling of all product(s) purchased from us.

Nothing herein is intended to be nor shall it constitute a warranty whatsoever, in particular, warranty of merchantability or fitness for a particular purpose.

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