

Technical data sheet

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ERACLENE ® BB 76

HDPE

High density polyethylene

Eraclene BB 76 is a high density polyethylene resin (HDPE), with antioxidants, suitable for blow moulding application.

It is especially recommended for the production of containers up to 30 liters. Eraclene BB 76 combines an excellent stress cracking resistance with a good rigidity and a high impact strength. For its overall characteristics, Eraclene BB 76 can be used to produce containers able to achieve UN homologation.

Main Application

Eraclene BB 76 is the ideal resin for packaging of household and industrial chemicals, detergents, fertilizers, adhesives and pesticides. Eraclene BB 76 can be also extruded to obtain profiles and sheets.

Main Properties

Resin Properties	Value	Unit	Test Method
Melt Flow Rate (190 °C/2,16 kg)	-	g/10min	ISO 1133
Melt Flow Rate (190 °C/5 kg)	0,4	g/10min	ISO 1133
Melt Flow Rate (190 °C/21,6 kg)	10	g/10min	ISO 1133
Density	0,952	g/cm3	ISO 1183
Melting point	131	°C	Internal method
Brittleness temperature	< -60	°C	ASTM D 746
Vicat softening point (1 kg)	126	°C	ISO 306/A

Mechanical Properties *	Value	Unit	Test Method
Tensile stress at yield	27	MPa	ISO 527-3
Tensile stress at break	30	MPa	ISO 527-3
Tensile strain at yield	-	%	ISO 527-3
Elongation at break	> 600	%	ISO 527-3
Flexural modulus	1200	MPa	ISO 178
Hardness Shore D	65	-	ISO 868 A
Falling Weight	-	J	ISO 6603-2
Izod impact strength, notched	250	J/m	ASTM D 256
Environmental Stress Cracking Resistance (ESCR) **	> 750	h	ASTM D 1693 (B)

^(*) Values are referred to compression moulded specimens. Actual properties are typical and may vary depending upon operating conditions. (**) 100% surface-active agent – Condition B.

Processing notes

Eraclene BB 76 can be processed in the latest blow moulding machines with excellent results. Moulded parts exhibit outstanding surface quality.

Typical moulding conditions:

Temperature setting, barrel zone 1 (°C) 180 - 190
Temperature setting, barrel zone 2-4 (°C) 1-0 - &\$)
Temperature setting, head and die (°C) 200 - 210
Operation temperature (°C) 200 - 210

Storage and Handling

Eraclene BB 76 is supplied in pellet form. This material may readily be conveyed and bulk fed through equipment designed for conventional pelletised polyethylene resin, provided the equipment is designed to prevent accumulation of the fines and dust particles that are contained in all polyethylene resins. These fines and dust particles can, under certain conditions, pose an explosion hazard. We recommend that the conveying system used be equipped with filters of adequate size, operated and maintained in such a manner to ensure that no leaks develop and earthed adequately. We further recommend that good housekeeping should be practised throughout your facility.

The product should be stored in dry conditions at temperatures below 50 °C and protected from sunlight. Improper storage can initiate degradation which results in odour generation, colour changes and can have negative effects on the physical properties of the product.

Before using this product it is recommended to read and understand the relevant Safety Data Sheet.

Availability

Contact the Versalis sales office nearest to you regarding availability and your specific application requirements.

Food Contact Status

Eraclene BB 76 complies with the rules and regulations of the European Union, as well as other countries, regarding the use of plastic materials in food contact applications. Certificates of compliance are available upon request.

Technical Management Polyethylene

Center and South Europe and Americas	North Europe and ROW
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IMPORTANT: please consult the relevant safety data sheet for more detailed information. The information and data presented herein are to the best of our knowledge true and accurate but no warranty or guarantee, expressed or implied, is made nor is any liability accepted with respect to the use of such information and data. Versalis is available to provide the guaranteed values for each product on demand.

DISCLAIMER: it is the sole responsibility of the end-user to determine the safety, the regulatory compliance as well as the technical suitability of the product for the intended application. The product is not intended for use in medical devices and pharmaceutical applications; Versalis declines all responsibility and cannot be held liable in case of use in the above mentioned applications.