

ExxonMobil™ HD 6305

High Density Polyethylene

Product Description

ExxonMobil™ HD 6305 is a medium molecular weight distribution high-density polyethylene homopolymer. It possesses excellent processing uniformity and produces bottles with excellent appearance and rigidity. ExxonMobil™ HD 6305 offers the maximum in barrier properties available in high-density polyethylene, and imparts very low odor and taste to the packaged product.

General

Availability ¹	<ul style="list-style-type: none"> Latin America North America
Additive	<ul style="list-style-type: none"> Thermal Stabilizer: Yes
Applications	<ul style="list-style-type: none"> Food Packaging Liquid Food Containers for Milk, Water and Juices Thermoformed Parts Thin Gauge Sheet
Revision Date	<ul style="list-style-type: none"> 09/26/2022

Resin Properties

	Typical Value (English)	Typical Value (SI)	Test Based On
Density	0.963 g/cm ³	0.963 g/cm ³	ASTM D4883
Melt Index (190°C/2.16 kg)	0.48 g/10 min	0.48 g/10 min	ASTM D1238

Thermal

	Typical Value (English)	Typical Value (SI)	Test Based On
Deflection Temperature Under Load (DTUL) at 66psi - Unannealed	264 °F	129 °C	ASTM D648
Vicat Softening Temperature	263 °F	128 °C	ASTM D1525
Peak Melting Temperature	275 °F	135 °C	ExxonMobil Method

Molded Properties

	Typical Value (English)	Typical Value (SI)	Test Based On
Tensile Strength at Yield	4600 psi	32 MPa	ASTM D638
Elongation at Break	420 %	420 %	ASTM D638
Flexural Modulus			ASTM D790
1% Secant	230000 psi	1600 MPa	
Tangent	210000 psi	1400 MPa	
Environmental Stress-Crack Resistance			ASTM D1693
100% Igepal	10 hr	10 hr	
Durometer Hardness (15 sec)	64	64	ASTM D2240

Impact

	Typical Value (English)	Typical Value (SI)	Test Based On
Charpy Notched Impact Strength			ISO 179/1eA
-4°F (-20°C)	4.4 ft·lb/in ²	9.3 kJ/m ²	
73°F (23°C)	5.9 ft·lb/in ²	12 kJ/m ²	

Additional Information

ExxonMobil™ HD 6305 is NSF® -51 Certified.

Legal Statement

Contact your ExxonMobil Chemical Customer Service Representative for potential food contact application compliance (e.g. FDA, EU, HPFB).

This product is not intended for use in medical applications and should not be used in any such applications.

Processing Statement

All molded properties were measured on compression molded plaques.

Notes

Typical properties: these are not to be construed as specifications.

¹ Product may not be available in one or more countries in the identified Availability regions. Please contact your Sales Representative for complete Country Availability.

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