

ExxonMobil™ LDPE LD 317 Series

Low Density Polyethylene Resin

Product Description

ExxonMobil™ LD 317 Series are fractional melt index, 6 wt% vinyl acetate copolymer film resins. Films made from LD 317 resins offer excellent impact strength, tensile properties, and heat sealability.

General

Additive	- LD 317.PM: Antiblock: No; Slip: No; Thermal Stabilizer: Yes - LD 317.09: Antiblock: No; Slip: No; Thermal Stabilizer: Yes		
Applications	- Agricultural Film - Batch Inclusion Bags - Co-Extrusion Films - Construction Film	- Form Fill And Seal Packaging - Freezer Film - Heavy Duty Bags - Ice Bags	- Poultry Bag - Produce Bags - Profile Extrusion
Form(s)	Pellets		

Resin Properties	Typical Value (English)	Typical Value (SI)	Test Based On
Density	0.926 g/cm ³	0.926 g/cm ³	ASTM D1505
Melt Index (190°C/2.16 kg)	0.30 g/10 min	0.30 g/10 min	ASTM D1238
Vinyl Acetate Content	6.0 wt%	6.0 wt%	ExxonMobil Method
Peak Melting Temperature	214 °F	101 °C	ExxonMobil Method

Thermal	Typical Value (English)	Typical Value (SI)	Test Based On
Vicat Softening Temperature	181 °F	83 °C	ASTM D1525

Film Properties	Typical Value (English)	Typical Value (SI)	Test Based On
Tensile Strength at Yield MD	1100 psi	7.7 MPa	ASTM D882
Tensile Strength at Yield TD	1000 psi	7.1 MPa	ASTM D882
Tensile Strength at Break MD	4800 psi	33 MPa	ASTM D882
Tensile Strength at Break TD	4400 psi	31 MPa	ASTM D882
Elongation at Break MD	310 %	310 %	ASTM D882
Elongation at Break TD	590 %	590 %	ASTM D882
Secant Modulus MD - 1% Secant	17000 psi	120 MPa	ASTM D882
Secant Modulus TD - 1% Secant	20000 psi	140 MPa	ASTM D882
Dart Drop Impact	450 g	450 g	ASTM D1709A
Elmendorf Tear Strength MD	150 g	150 g	ASTM D1922
Elmendorf Tear Strength TD	120 g	120 g	ASTM D1922
Puncture Force	19 lbf	84 N	ExxonMobil Method
Puncture Energy	35 in-lb	3.9 J	ExxonMobil Method

Optical Properties	Typical Value (English)	Typical Value (SI)	Test Based On
Gloss (45°)	63	63	ASTM D2457
Haze	6.7 %	6.7 %	ASTM D1003

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

Film (2.0 mil/50.8 micron) made on a 2.5 inch (63.5 mm) blown film line with a 2.5:1 blow-up ratio, a melt temperature of 360–380°F (182–193°C), a 30 mil (0.76 mm) die gap at a rate of 8 lbs/hr/in die circumference (1.43 kg/hr/cm).