

mLLDPE**mLLDPE Exceed Flow m 1020****METALLOCENE LINEAR LOW-DENSITY POLYETHYLENE (mLLDPE)**

This grade is an ethylene 1-hexene copolymer metallocene linear low-density polyethylene resin engineered for an outstanding balance between processing ease and film performance, including tensile strength, impact resistance, and puncture resistance. Fluoropolymers and TNPP process aids are not intentionally added to this resin.

Typical Application	Product Characteristics	International Compliance
• Agricultural Film • Blown Film • Cast Film • Cast Stretch Film • Food Packaging • Form Fill And Seal Packaging • Heavy Duty Bags • Lamination Film • Multilayer Packaging Film • Shrink Film • Stand Up Pouches • Stretch Film	• Antiblock 2000 ppm and slip 500 ppm additive package as standard • Thermal stabilizer and alternative processing aid included as standard • Supplied in pellet form	• FDA 21 CFR 177.1520 (food-contact) — compliance documented at the producer level; written Statement of Compliance supplied per lot at order

Film Properties

Properties	Test Method	Typical Value	Unit
Tensile Strength at Yield MD	ASTM D882	9.6	MPa
Tensile Strength at Yield TD	ASTM D882	10	MPa
Tensile Strength at Break MD	ASTM D882	50	MPa
Tensile Strength at Break TD	ASTM D882	50	MPa
Elongation at Break MD	ASTM D882	510	%
Elongation at Break TD	ASTM D882	720	%
Secant Modulus MD - 1% Secant	ASTM D882	200	MPa
Secant Modulus TD - 1% Secant	ASTM D882	230	MPa
Dart Drop Impact	ASTM D1709A	180	g
Elmendorf Tear Strength MD	ASTM D1922	130	g
Elmendorf Tear Strength TD	ASTM D1922	550	g
Puncture Force		47	N
Puncture Energy		3.2	J
Gloss (45°)	ASTM D2457	62	
Haze	ASTM D1003	7.0	%

Physical Properties

Properties	Test Method	Typical Value	Unit
Density / Specific Gravity	ASTM D792	0.920	g/cm ³
Melt Index (190°C/2.16 kg)	ASTM D1238	1.0	g/10 min
Peak Melting Temperature		114	°C
Vicat Softening Temperature		106	°C

Processing Guidelines

Film (1 mil / 25.4 micron) produced on a 2.5 inch (63.5 mm) blown film line with a 2.5:1 blow-up ratio, a melt temperature of 380-400°F (193-204°C), a 30 mil (0.76 mm) die gap, at a rate of 10 lb/hr/in die circumference (1.79 kg/hr/cm).

The nominal properties reported herein are typical of the product and do not reflect normal testing variance; they should not be used for specification purposes.