



DOWLEX™ 4056G

Polyethylene Resin

Overview

DOWLEX™ 4056G is a linear low density resin designed for high quality blown film applications requiring a combination of excellent optical properties, tear strength, sealability and excellent processability. DOWLEX 4056G is also designed to offer a low gel level making it ideal for use in lamination films and other specialty packaging applications.

Complies with:

- EU, No 10/2011
- U.S FDA FCN 741

Consult the regulations for complete details.

Additive

- Antiblock: No
- Slip: No
- Processing Aid: No

Physical	Nominal Value (English)	Nominal Value (SI)	Test Method
Density	0.917 g/cm ³	0.917 g/cm ³	ASTM D792
Melt Index (190°C/2.16 kg)	1.3 g/10 min	1.3 g/10 min	ASTM D1238
Films	Nominal Value (English)	Nominal Value (SI)	Test Method
Film Puncture Energy			Dow Method
0.98 mil (25 µm)	15.0 in·lb	1.70 J	
2.0 mil (50 µm)	38.1 in·lb	4.30 J	
Film Puncture Force			Dow Method
0.98 mil (25 µm)	1.93 lbf	8.60 N	
2.0 mil (50 µm)	2.43 lbf	10.8 N	
Film Puncture Resistance			Dow Method
0.98 mil (25 µm)	1240 ft·lb/in ³	103 J/cm ³	
2.0 mil (50 µm)	1500 ft·lb/in ³	124 J/cm ³	
Dart Drop Impact			ASTM D1709A
0.98 mil (25 µm)	250 g	250 g	
2.0 mil (50 µm)	370 g	370 g	
Elmendorf Tear Strength ¹			ASTM D1922
MD : 0.98 mil (25 µm)	280 g	280 g	
MD : 2.0 mil (50 µm)	650 g	650 g	
TD : 0.98 mil (25 µm)	420 g	420 g	
TD : 2.0 mil (50 µm)	750 g	750 g	
Seal Initiation Temperature ²			
0.98 mil (25 µm)	221 °F	105 °C	
2.0 mil (50 µm)	221 °F	105 °C	
Optical	Nominal Value (English)	Nominal Value (SI)	Test Method
Gloss			ASTM D2457
45°, 0.984 mil (25.0 µm)	65	65	
45°, 0.984 mil (25.0 µm) ³	81	81	
45°, 0.984 mil (25.0 µm) ⁴	75	75	
45°, 1.97 mil (50.0 µm)	64	64	
45°, 1.97 mil (50.0 µm) ³	80	80	
45°, 1.97 mil (50.0 µm) ⁴	71	71	



Optical	Nominal Value (English)	Nominal Value (SI)	Test Method
Haze			ASTM D1003
0.984 mil (25.0 μm)	6.30 %	6.30 %	
0.984 mil (25.0 μm) ³	4.20 %	4.20 %	
0.984 mil (25.0 μm) ⁴	4.20 %	4.20 %	
1.97 mil (50.0 μm)	9.60 %	9.60 %	
1.97 mil (50.0 μm) ³	5.10 %	5.10 %	
1.97 mil (50.0 μm) ⁴	5.10 %	5.10 %	

Extrusion	Nominal Value (English)	Nominal Value (SI)
Melt Temperature	423 °F	217 °C

Extrusion Notes

Fabrication Conditions For Blown Film:

- Melt Temperature: 217°C
- Die Diameter: 200 mm.
- Blow-Up Ratio: 2 to 1

Notes

These are typical properties only and are not to be construed as specifications. Users should confirm results by their own tests.

¹ Method B

² Temperatures at which 8.8N/25MM heat seal strength is achieved.

Heat Seal Strengths, Topwave HT Tester 0.5 S dwell, 40 psi bar pressure, pull speed (100 mm/sec).

³ With 20% LDPE

⁴ With 40% LDPE

