

Producer: Equistar Chemicals / The United States (USA)

## HDPE L5005

**Applications** ALATHON L5005 is a high molecular weight high density copolymer that provides broad bimodal molecular weight distribution, high stiffness and good heat seal response and strength. Typical applications include merchandise bags, grocery sacks, trash can liners, produce bags and roll stock.

**Regulatory Status** L5005 meets the requirements of the Food and Drug Administration regulation 21 CFR 177.1520. This regulation allows the use of this olefin polymer in "...articles or components of articles intended for use in contact with food." Specific limitations or conditions of use may apply. Contact your Equistar sales representative for more information.

**Processing Techniques** Specific recommendations for processing L5005 can only be made when the processing conditions, equipment and end use are known. For further suggestions please contact your Equistar sales representative.

### Typical Data

PROPERTY	TEST	UNIT	TYPICAL VALUE
Melt Index	D 1238	g/10 min	0.057
Density	D 1505	g/cc	0.949
Total Energy Dart Drop	D 4272	ft-lbs/mil	2.05
Elmendorf Tear Strength, MD (TD)	D 1922	g	14 (35)
Tensile Strength @ Yield, MD (TD)	D 882	psi	3,800 (3,400)
Tensile Strength @ Break, MD (TD)	D 822	psi	8,500 (5,000)
Elongation @ Break, MD (TD)	D 882	%	300 (420)
Secant Modulus, MD (TD)	D 882	psi	115,000 (140,000)

\* Typical Values : not be construed as specifications.

### Typical Process Condition Ranges:

BUR=3.5-4.5:1; Neck Height=6-9 Die Diameters; Die Gap (nominal), in.=0.040-0.050;

Tower Height=Relatively Short; Output, Lb/Hr/In of Die Circumference=10-12;

Melt Temperature - 390-420°F (199-216°C)