



ISO 9001: 2000 - QUALITY ASSURANCE

Distributor & Fabricator of Engineered Plastic & Electrical Parts

HI-DENSITY POLYETHYLENE

Rollers, Bumpers, Spacers, Barriers

Wear Plates, Sleeves, Shims

Collars, Trays, Guides

Supports, Holders, Rails

Mechanical Properties

Specific Gravity	gm / cc			0.941 / 0.965
Tensile Strength	PSI	lengthwise		3100 - 5500
Compressive Strength	PSI	flatwise		2700 - 3600
Flexural Modulus	PSI			1.0 - 3.0
Hardness	Rockwell (R)			15 - 20
Water Absorption	%	24 hrs	0.125 th	< 0.01
Thermal Expansion, relative value only				11.0 - 12.0
Heat Resistance / Maximum Constant Operating Temp				250F
UV Exposure				crazes without Carbon-Black
Effect of	weak Acid			very resistant
	strong Acids			low to good resistance
	weak Alkalies			very resistant
	strong Alkalies			very resistant
	Organic Solvents			resistant < 80C

High-density polyethylene (HDPE) is a petroleum-based thermoplastic with a high strength-to-density ratio, low Coefficient of Friction, good Chemical- and Moisture Resistance values. It is popular in a variety of Industrial- and Commercial- applications due to it's versatility and availability in Extruded, Moulded, Machined and Blow-Moulded forms.

Values are based on typical Test Methods and Conditions and published for Reference purposes only