Technical Data Sheet

Icorene 1505 GRY 7796

Polyethylene, Crosslinked

Product Description

Icorene 1505 is a crosslinkable natural high density polyethylene specifically developed for rotational moulding.This grade is particularly suitable for use in applications requiring exceptional impact resistance at low temperature. toughness and excellent ESCR such as fuel tanks.The specially developed cross linking system used has lower odor than typical materials of this type and allows for perfect moulding of the part - free of pinholes.

Processing Method	Rotomolding
Attribute	Crosslinkable; Good Processability; High ESCR (Environmental Stress Cracking Resistance); High Impact Resistance; UV Resistant
Forms	Powder
Appearance	Natural Color; Unspecified Color
Additive	UV Stabilizer
Application	Industrial Containers

Typical Properties	Nominal Value	Units	Test Method
Physical			
Density	0.943	g/cm³	ASTM D1505
Mechanical			
Tensile Strength at Yield	21	MPa	ASTM D638
Environmental Stress Crack Resistance			
(Condition B, Rotational Molded, F50, 10% Igepal, 50 °C)	>1000	hr	ASTM D1693
(Condition B, Rotational Molded, F50, 100% Igepal, 50 °C)	>1000	hr	ASTM D1693
Flexural Modulus	700	MPa	ASTM D790
Tensile Elongation at Break	600	%	ASTM D638
Impact			
Drop Impact Resistance			
(-20 °C, Internal Method)	>255	J/cm	ASTM D4226
(-40 °C, Rotomoulding)	>320	J/cm	ARM
Hardness			
Durometer Hardness, (Shore D)	65		ASTM D2240
Thermal			
Vicat Softening Temperature, (A (10N), 50 °C/h)	127	°C	ISO 306
Deflection Temperature Under Load Unannealed (1.80 MPa)	43	°C	ISO 75-2/A