

TECHNICAL DATA SHEET

SP-S-3545U

Linear Low Density Polyethylene Powder for Rotational Molding

DESCRIPTION

GREENETHENE **SP-S-3545U** is a Low-Density Linear Polyethylene Resin (LLDPE) in powder form, additivated with antioxidants and UV stabilizers. It is suitable for Rotational Molding applications. Items produced by GREENETHENE **SP-S-3545U** have a very good balance between mechanical properties and ESCR resistance.

Typical Properties	Test Method	Unit		Value*	
Melt Flow Index (190 °C/2.16 Kg)	ASTM D1238	gm/10 min		5	
Density (23 °C)	ASTM D1505	gm/cm ³		0.935	
ESCR (F-50, 100% lgepal)	ASTM D1693	hr		>150	
Vicat Softening Point	ASTM D1525	°C		114	
Hardness	ASTM D2240	D		66	
UV Stability (ASTM G155)	ASTM D2565	Hrs		4000	
Elongation at Break	ASTM D638	%		600	
Notched Izod Impact Strength	ASTM D256	Kg.cm/cm	20	J/m	196
Tensile Strength at Yield	ASTM D638	Kg/cm ²	165	Mpa	16
Tensile Strength at Break	ASTM D638	Kg/cm ²	175	Mpa	17
ARM Low Temp Impact Strength (3.17mm)	ARM (- 40)	ft.lbs	70	J	95
Flexural Modulus	ASTM D790	Kg/cm ²	4300	Mpa	420

^{*}The above are typical properties and are not to be construed as specifications. Tests were done on natural, unpigmented resin. User is advised to make its own determination and assessment of the suitability of this product for its intended use. Synergy Polytek FZC make no warranty expressed or implied regarding the suitability of this product in application.

REGULATORY INFORMATION

GREENETHENE **SP-S-3545U** meets the requirement stipulated in standard **IS:10141:2001** on "Specification for Polyethylene for safe use in contact with foodstuff, pharmaceuticals & Drinking Water". It also conforms to standard **IS 12701:1996** – "Specification for Rotational Molded Polyethylene Water Storage Tanks.".

PROCESSING CONDITIONS

Recommended PIAT is 190-200 °C. Bags should be stored in dry/closed conditions at temp below 50 °C.

APPLICATIONS



Water Storage Tank

Pallets

Dustbins Milk Can

Garden Furniture

