

Edistir® N 3840

General Purpose Polystyrene

Versalis S.p.A.

Message:

General purpose polystyrene combining easy flow and medium heat. N 3840 belongs to Edistir® GPPS third generation.

Edistir® N 3840 is suggested in extrusion for glossy capping of HIPS sheets and for blending with HIPS or clear SBS for stiffer thermoformable sheets.

This grade exhibits excellent processability in injection moulding and it is recommended for complex and thin-wall parts and fast moulding cycles.

Thanks to N 3840, injected items will be more brilliant and neutral coloured in line with more sophisticated market needs.

Designation: Thermoplastics ISO 1622-PS,G,085-12.

Thermoformed disposable packaging and glossy sheets for industrial and fridge applications.

Injection of moulded beverage cups, containers for foods and cosmetics, toys, housewares, medical articles (Petri dishes).

General Information			
Features	Workability, good		
	Fast molding cycle		
	Good liquidity		
	Heat resistance, medium		
	Compliance of Food Exposure		
Uses	Packaging		
	Thin wall parts		
	Cup		
	Industrial application		
	Mixing		
	Household goods		
	Sheet		
	Container		
	Food container		
	Toys		
	Medical/nursing supplies		
Agency Ratings	Europe 10/1/2011 12:00:00 AM		
Processing Method	Thermoforming		
	Injection molding		
Physical	Nominal Value	Unit	Test Method
Density	1.05	g/cm ³	ISO 1183
Apparent Density	0.65	g/cm ³	ISO 60
Melt Mass-Flow Rate (MFR) (200°C/5.0 kg)	10	g/10 min	ISO 1133
Molding Shrinkage	0.30 - 0.60	%	ISO 294-4
Water Absorption (23°C, 24 hr)	< 0.10	%	ISO 62
Hardness	Nominal Value	Unit	Test Method

Rockwell Hardness (M-Scale)	80		ISO 2039-2
Mechanical	Nominal Value	Unit	Test Method
Tensile Modulus	3250	MPa	ISO 527-2/1
Tensile Stress (Break)	39.0	MPa	ISO 527-2/5
Tensile Strain (Break)	1.8	%	ISO 527-2/5
Flexural Stress ¹	69.0	MPa	ISO 178
Impact	Nominal Value	Unit	Test Method
Notched Izod Impact			ISO 180/1A
-30°C	1.5	kJ/m ²	ISO 180/1A
12°C	1.7	kJ/m ²	ISO 180/1A
Thermal	Nominal Value	Unit	Test Method
Deflection Temperature Under Load ² (1.8 MPa, Annealed)	84.0	°C	ASTM D648
Vicat Softening Temperature			
--	92.0	°C	ISO 306/A50
--	88.0	°C	ISO 306/B50
CLTE - Flow	7.0E-5	cm/cm/°C	ASTM D696
Thermal Conductivity	0.17	W/m/K	ISO 8302
Electrical	Nominal Value	Unit	Test Method
Surface Resistivity	> 1.5E+15	ohms	IEC 60093
Volume Resistivity	> 7.0E+15	ohms·cm	IEC 60093
Dielectric Strength	70	kV/mm	IEC 60243-1
Relative Permittivity (50 Hz)	2.50		IEC 60250
Dissipation Factor (50 Hz)	2.0E-4		IEC 60250
Comparative Tracking Index (Solution A)	375	V	IEC 60112
Flammability	Nominal Value	Unit	Test Method
Flame Rating (1.5 mm, ALL)	HB		UL 94
Glow Wire Ignition Temperature (1.6 mm)	650	°C	IEC 60695-2-13
Additional Information	Nominal Value		
Designation	Thermoplastics ISO 1622-PS,G,085-20		
Injection	Nominal Value	Unit	
Processing (Melt) Temp	200 - 250	°C	
Mold Temperature	10 - 50	°C	
Extrusion	Nominal Value	Unit	
Melt Temperature	210 - 240	°C	
NOTE			
1.	2.0 mm/min		
2.	120°C/hr		

The information and data on this page are provided by manufacturers and document providers. SHANGHAI SUSHENG assumes no legal liability. It is strongly recommended to verify all technical data with material suppliers before final material selection. All rights belong to the original authors. If any infringement occurs, please contact us immediately.

Susheng Import & Export Trading Co.,Ltd.

Tel: +86 21 5895 8519

Phone: +86 13424755533

Email: sales@su-jiao.com

No. 215, Lianhe North Road, Fengxian District, Shanghai, China

