Technical Data Sheet

Polyman PS 604 NAT

Polystyrene, General Purpose

Product Description
high impact PS - compound

Processing Method	Injection Molding
Attribute	High Impact Resistance

Typical Properties	Nominal Value	Units	Test Method
Physical			
Melt Volume Flow Rate, (200 °C/5.0 kg)	10	cm³/10 min	ISO 1133
Density, (Method A)	1.03	g/cm³	ISO 1183
Mechanical			
Tensile Stress at Yield, (Type 1A, 50 mm/min)	25.0	MPa	ISO 527-2
Tensile Strain at Yield, (Type 1A, 50 mm/min)	3.0	%	ISO 527-2
Tensile Modulus, (1 mm/min, Type 1A)	2200	MPa	ISO 527-1
Impact			
Charpy Impact Strength - Notched, (23 °C, Type 1, Edgewise, Notch A)	6.0	kJ/m²	ISO 179
Charpy Impact Strength - Unnotched, (23 °C, Type 1, Edgewise)	65	kJ/m²	ISO 179
Thermal			
Vicat Softening Temperature			
(B (50N), 50 °C/h)	89.0	°C	ISO 306
(A (10N), 120 °C/h)	97.0	°C	ISO 306
Electrical			
Volume Resistivity	>1.0E+13	ohm*m	IEC 62631-3-1
Surface Resistivity	>1.0E+15	ohm	IEC 60093

Injection Parameters	Nominal Value	Units
Drying Time	2.0 to 3.0	hr
Drying Temperature	70 to 80	°C
Processing (Melt) Temp	200 to 250	°C
Mold Temperature	30 to 80	°C