

Zyntar® 7080

Data Sheet

Zyntar® Ignition Resistant Polystyrene

Zyntar® 7080 is a V-0 ignition resistant, easy flow, high impact polystyrene resin for injection molding.

Applications

Zyntar® 7080 is primarily designed for television cabinets, business equipment, and consumer electronics.

Typical Properties for Uncolored Products

	Test method ASTM	SI Unit	Value	English Unit	English Value
MECHANICAL PROPERTIES					
Tensile Stress at Yield	D 638	MPa	24	psi	3500
Tensile Stress at Break	D 638	MPa	20	psi	2900
Tensile Elongation	D 638	%	55	%	55
Flexural Modulus	D 790-1	MPa	2300	psi	330000
Notched Izod Impact Strength 23°C	D 256-A	J/m	107	ft-lbs/in	2.0
THERMAL PROPERTIES					
Vicat Softening Temperature	D 1525	°C	96	°F	205
Temp. of Deflection Under Load at 264 psi	D 648	°C	87	°F	189
PROCESSING					
Nominal Melt Flow Rate (200 °C, 5000g)	D 1238	g/10 min	13.0	g/10 min	13.0
Melt Temperature Range (Molding)	-	°C	200-240	°F	400-460
FLAMMABILITY					
UL (Solid) 1.5 mm All Color	94	class	V-0	Class	V-0
MISCELLANEOUS PROPERTIES					
Density	D 792	g/cm ³	1.18	g/cm ³	1.18
Water Absorption (Saturation in water at 23°C)		%	<0.15	%	<0.15
Moisture Absorpt. (23°C/50% r.h.)		%	<0.1	%	<0.1
Mold Shrinkage	D 955	%	0.3-0.7	%	0.3-0.7

Processing

Although Zyntar® 7080 can be processed by any method applicable to polystyrene-based plastics, it is best suited for injection molding. The melt temperature should not exceed 250 °C.

Handling and Safety

Zyntar® 7080 is not known to have any ill effect on workers in an adequately ventilated molding shop when it is processed by usual methods used for polystyrene-based plastics. During processing of Zyntar® 7080 small quantities of styrene monomer may be released into the atmosphere. At styrene vapor concentrations below 20 ppm no negative effects on health are expected. In our experience, the concentration of styrene does not exceed 1 ppm in well-ventilated workplaces - that is where five to eight air changes per hour are made.

Packaging and Samples

Zyntar® 7080 is supplied in pellet form. It has to be stored original containers in a cool, dry place. Avoid direct exposure to sunlight. Zyntar® 7080 can also be stored in silos. Samples are available on request.

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