

**GPPS1540**  
**GENERAL PURPOSE POLYSTYRENE**

**1) Product Description:** GPPS1540 is an easy flowing crystal polystyrene designed for extrusion or injection applications . In extrusion , it improves extruder output and thermoforming cycle times when mixed with a super high impact polystyrene such as HIPS7240. It is particularly suitable for glossy-layer co-extrusion.It does combine excellent fluidity with a higher softening point than GPPS1810/1811 grade.

**2) Applications:**

- Extrusion :Impact dilution; Gloss layer in co-extrusion; Anionic styrene butadiene copolymer dilution.
- Injection :Packaging articles; Medical applications, eg, Petri dishes; Office equipment; Pen barrels; Crisper boxes for refrigerators; Cups.

**3) Typical Data**

Property	Unit	Value	Test Method
MFI (200 <sup>o</sup> c/5kg )	g/10 min	11	ASTM D 1238
Styrene residual monomer	PPM	<500	CLGLABPSG004 (ATOFINA TEST METHOD)
Vicat softening point	oC	Min89.5	ASTM D 1525
Rockwell hardness	-	Scale L70	ASTM D 785
Tensile strength @ yeild	MPa		ASTM D 638
Tensile strength @ break	MPa	45	ASTM D 638
Elongation @ break	%	2	ASTM D 638
Flexural modulus	MPa	3000	ASTM D 790
Tensile modulus	-	3100	ASTM D 638
Refractive index	-	1.591	ISO Method
Water absorption	%	<0.1	ASTM D 570

Density of this grade is approximately : 1.04 gr/cm<sup>3</sup> Shrinkage of all grades in mould is approximately : (0.4-0.7%) (ASTM D 955) All tests are carried out at 23 °C unless otherwise stated. The above data are typical laboratory average . They are intended to serve as guides only.

**4)Processing Conditions :**

GPPS1540 can be processed under different conditions depending on machinery available and articles moulded. During processing of GPPS1540 small quantities of styrene monomer may be released into the atmosphere.

At styrene concentrations of 50 up to 100 PPM (TLV value for styrene monomer), no negative effects on health are expected.

Producer: Tabriz Petrochemical Co. Licensor: Total Packing: 25 Kg plastic bag