

Description

POLYSTYRENE (PS) COMPOUNDS (CPDS) 807 is a high impact flame retardant polystyrene for use in HGW applications. PS CPDS 807 can be supplied in both natural and coloured forms.

Main Characteristics

- ✓ DBDPE and Antimony Trioxide free
- ✓ Excellent UV stability
- ✓ Hot Glow Wire (HGW) rated to 960°C (IEC 695-2-1)
- ✓ High Flow

Applications

Fuses boxes, Electrical Housings.

Properties

Flammability rating	Method	Unit	Value
UL 94 V2 – All colors		mm	1.6
Hot Glow Wire	IEC 695-2-1	°C	960
Rheological			
Melt Flow index (200°C-5Kg)	ISO 1133H	g/10mn	14
Thermal			
Vicat softening point 50N (T° increase of 50°C/h)	ISO 306B50	°C	87
Mechanical			
Izod notched impact strength at 23°C	180/1A	KJ/m ²	7
Tensile yield strength	ISO 527-2	MPa	27
Tensile strength at break	ISO 527-2	MPa	25
Elongation at break	ISO 527-2	%	39
Flexural modulus	ISO 178	MPa	2400
Miscellaneous			
Density at 23°C	ISO 1183	g/cm ³	1.04
Moulding shrinkage		%	0.4 – 0.7
Water absorption	ISO 62	%	<0.1
Processing conditions			
<ul style="list-style-type: none"> ➤ Maximum melt temperature is 220°C. ➤ This product is heat and shear sensitive. Avoid prolonged residence time in the moulding machine. If possible, use low shear screw profile, and check ring assembly. ➤ Where possible only use tools with cold runner systems and chemically resistant tooling. ➤ Always purge machine into natural PS or PP, or propriety purging agent, when machine stops or finishes production. 			

General information

Standard properties: All tests carried out at 23°C unless stated otherwise. Mechanical properties are measured on injection moulded tests specimens.
Bulk density: bulk density of all natural grades is approximately 0.6 g/cm³.