Technical data sheet Flame Retardant Polystyrene Produced in Europe

# **Description**

POLYSTYRENE (PS) COMPOUNDS (CPDS) 818R is a high impact bromintated flame retardant polystyrene. A combination of high flow and high heat stability gives excellent processability and reduced cycle times PS CPDS 818R contains a significant level of recycled PS, collected according to the WEEE EU directive, and therefore reduces environmental impact via reduced CO<sub>2</sub> emissions and reduced energy and water consumption

# **Main Characteristics**

- ✓ Compliant with the European ECOLABEL (2009/300/EC)
- ✓ Contains post consumer recycled polystyrene
- ✓ DBDPE free, UL94 V0 @ 1.6 mm.
- ✓ High flow, High heat and Excellent UV stability



Covers for electrical equipment. TV covers. Office automation.

## **Properties**

Flammability rating	Method	Unit	Value
UL 94 V0 – Black		mm	1.6
Rheological			
Melt Flow index (200°C-5Kg)	ISO 1133H	g/10mn	10
Thermal			
Vicat softening point 50N (T° increase of 50°C/h)	ISO 306B50	°C	85
Mechanical			
Izod notched impact strength at 23°C	180/1A	KJ/m²	8.0
Tensile yield strength	ISO 527-2	MPa	25
Elongation at break	ISO 527-2	%	40
Flexural modulus	ISO 178	MPa	2300
Miscellaneous			
Density at 23°C	ISO 1183	g/cm³	< 1.13
Moulding shrinkage		%	0.4 - 0.7
Water absorption	ISO 62	%	<0.1

### **Processing conditions**

- Maximum melt temperature is 260°C.
- Under normal processing conditions, this grade is heat stable. However do not leave in barrel when moulding machine is idle. Always purge with clean natural PS, PP or any propriety purging compound.
- > Ensure all fumes are extracted at source.

### **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.

