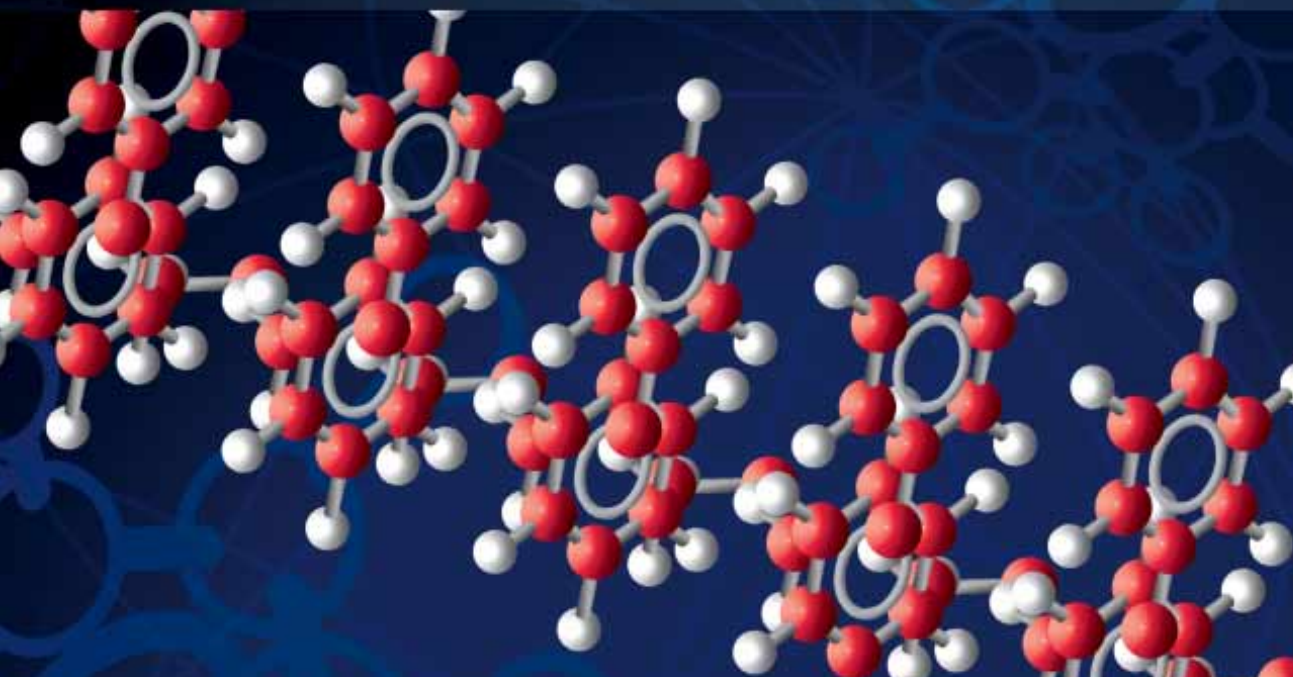


Polystyrene Compounds



Grades
and typical **applications**

TOTAL PETROCHEMICALS



Halogen Free Compounds

Typical Applications		References				Properties *					Consumer Electronics	
Consumer Electronics	Electrical Appliances	Office Automation	Flame Retardant Properties	Melt Flow Index	Density	Vicat Temperature	IZOD Impact Strength	Tensile Yield Strength	Elongation at break	Flexural Modulus	TV Covers Compliance	
											Class	g/10 min
•	•	•	UL 94	D-1238	D-792	D-1525	D-256	D-638	D-638	D-790	Flat TV LCD	CRT
•	•	•	V1 @ 2.5 mm	4	1.08	90	6	30	40	2400	•	•
•	•	•	V0 @ 3.0 mm	3	1.1	90	5	44	30	2300	•	•
•	•	•	V0 @ 2.5 mm	3	1.1	90	6	45	30	2300	•	•
•	•	•	V2 @ 1.6 mm	5	1.06	81	7	32	40	2500	•	•
•	•	•	V1 @ 3.0 mm	5	1.07	81 ⁽¹⁾	7	32	40	2400	•	•
•	•	•	V0 @ 3.0 mm	4	1.1	81	7	35	40	2300	•	•
•	•	•	V0 @ 3.0 mm	7	1.1	81	5	35	40	2300	•	•

Brominated “non-deca” Compounds

Typical Applications		References				Properties *					Consumer Electronics	
Consumer Electronics	Electrical Appliances	Office Automation	Flame Retardant Properties	Melt Flow Index	Density	Vicat Temperature	IZOD Impact Strength	Tensile Yield Strength	Elongation at break	Flexural Modulus	TV Covers Compliance	
											Class	g/10 min
•	•	•	UL 94	D-1238	D-792	D-1525	D-256	D-638	D-638	D-790	Flat TV LCD	CRT
•	•	•	V0 @ 1.6 mm	5	1.09	87	8	24	40	2300	•	•
•	•	•	V2 @ 1.6 mm	10	1.04	88	7	27	39	2400	•	•
•	•	•	V2 @ 1.6 mm	14	1.09	87	7.5	24	45	2400	•	•
•	•	•		6	1.04	90	7	27	39	2400	•	•

Alloys

Typical Applications		References				Properties *					Consumer Electronics	
Consumer Electronics	Electrical Appliances	Office Automation	Flame Retardant Properties	Melt Flow Index	Density	Vicat Temperature	IZOD Impact Strength (23/ -30°C)	Tensile Strength at break	Elongation at break	Flexural Modulus	TV Covers Compliance	
											Class	g/10 min
•	•	•	UL 94	D-1238	D-792	D-1525	D-256	D-638	D-638	D-790	Flat TV LCD	CRT
•	•	•	V0 @ 1.6 mm	4	1.02	76	40/20	22	80	1450	•	•
•	•	•	V0 @ 1.6 mm	5	1.00	63	37/15	20	100	1000	•	•

Other Compounds : Total Petrochemicals also develops coloured HIPS with or without anti-static agent.

Total Petrochemical and the Flame Retardant Polystyrene

The Total Petrochemicals range of Flame Retardant Polystyrene grades consists of a complete portfolio of materials designed to meet the current safety and environmental requirements of the consumer electronics sector. Based on a long experience of supplying Polystyrene materials to the television industry, Total Petrochemicals has developed a complete range of Polystyrene grades for this important application area. All products are formulated to be in accordance with Directive 2002/95/EC (the RoHS Directive). This contributes significantly to the safety of electronic equipment and thus, indirectly, can be used to improve safety at home; this with respect to all current environmental considerations in line with sustainable development policy.

Total Petrochemicals at a glance

Total Petrochemicals encompasses petrochemicals activities of Total, the fourth largest oil company worldwide. Its business includes base petrochemicals from steam crackers and certain refinery processing plants – olefins (ethylene and propylene), C4 fractions and aromatics (benzene, toluene, xylenes and styrene) –, as well as the commodity polymers derived from them (polyethylene, polypropylene, polystyrene and elastomers). Total Petrochemicals employs 7,000 persons in Europe, the United States, the Middle East and Asia. Its products are used in many consumer and industrial markets, including packaging, construction and automotive.

Information contained in this publication is true and accurate at the time of publication and to the best of our knowledge. The nominal values stated herein are obtained using laboratory test specimens. Before using one of the products mentioned herein, customers and other users should take all care in determining the suitability of such product for the intended use, and particularly the conformity with current regulations. Total Petrochemicals do not recommend its polystyrene resins for use in any application in direct or indirect contact with human body fluids and tissues. The Companies within Total Petrochemicals do not accept any liability whatsoever arising from the use of this information or the use, application or processing of any product described herein. No information contained in this publication can be considered as a suggestion to infringe patents. The Companies disclaim any liability that may be claimed for infringement or alleged infringement of patents.

General Information

Standard properties

All tests are carried out at 23°C unless otherwise stated. Mechanical properties are measured on injection moulded test specimens.

Mould shrinkage

Shrinkage of Total Petrochemicals Polystyrene is 0.4 - 0.7%

Bulk Density

Bulk density of all natural grades is approximately 0.6 g/cm³.

Food contact

The composition of PS Compounds grades sold for food contact applications conforms with the current regulations in the various European countries, and the U.S.A., for packaging designed for use in contact with foodstuffs. It remains the responsibility of the user to verify that the finished product also complies with these regulations.

Internet

All of the properties of the grades, in addition to processing data, can be found on our web site : www.totalpetrochemicals.com

* All properties are measured according the standard quality control procedures.



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